



Department of Management Studies
Birla Institute of Technology, Mesra, Ranchi - 835215 (India)

4 Years Bachelor in Hotel Management (BHM)
Course Curriculum
(From Monsoon 2025)
As per NEP 2020



Department of Management Studies
Birla Institute of Technology, Mesra, Ranchi - 835215 (India)

Institute Vision

To become a Globally Recognized Academic Institution in consonance with the social, economic and ecological environment, striving continuously for excellence in education, research and technological service to the National needs.

Institute Mission

- To educate students at Undergraduate, Post Graduate Doctoral and Post-Doctoral levels to perform challenging engineering and managerial jobs in industry.
- To provide excellent research and development facilities to take up Ph.D. programmes and research projects.
- To develop effective teaching and learning skills and state of art research potential of the faculty.
- To build national capabilities in technology, education and research in emerging areas.
- To provide excellent technological services to satisfy the requirements of the industry and overall academic needs of society.

Department Vision

Department Mission

Program Educational Objectives (PEO)

1. To develop capability to understand the fundamentals of Hotel industry for analyzing the business problems with futuristic approach.
2. To foster a confident and competent graduate capable of solving real life practical Hotel Industry problems fulfilling the obligation towards society.
3. To inculcate an attitude for identifying and undertaking developmental work both in Industry as well as academic environment with emphasis on continuous learning enabling to excel in competitive participation at a global level.
4. To nurture and nourish effective communication and interpersonal skill to work in a team with a sense of ethics and moral responsibility for achieving goal.

Program Outcomes (PO)

A graduate shall

- a) Apply the fundamental knowledge of hotel operations and management to provide solution to different requirement arising in the hotel industry.
- b) Identify, formulate, research literature and analyse complex problem of Hotel Industry reaching substantiated conclusions using principles of hotel operations and management.
- c) Design solutions for **complex hotel industry problems** and design systems, components or processes that meet specified needs with appropriate consideration for public health and safety, cultural, societal, and environmental considerations.
- d) Conduct investigations of **complex hotel industry problems** including analysis and interpretation of data and synthesis of information to provide valid conclusions.
- e) Create, select and apply appropriate techniques, resources, and modern Hotel Industry tools, including prediction and modelling, to **complex hotel industry activities**, with an understanding of the limitations.
- f) Communicate effectively on **complex hotel industry activities** with the hospitality industry and with society at large, such as being able to comprehend and write effective reports and design documentation, make effective presentations, and give and receive clear instructions.
- g) Function effectively as an individual, and as a member or leader in diverse teams and in multi-disciplinary settings.
- h) Demonstrate understanding of the societal, health, safety, legal and cultural issues and the consequent responsibilities relevant to hotel industry practices.
- i) Understand and commit to professional ethics and responsibilities and norms of hotel industry practice.
- j) Understand the impact of hotel industry solutions in a societal context and demonstrate knowledge of and need for sustainable development.
- k) Demonstrate a knowledge and understanding of management and business practices, such as risk and change management, and understand their limitations.
- l) Recognize the need for and have the ability to engage in independent and life-long learning.



BIRLA INSTITUTE OF TECHNOLOGY-MESRA, RANCHI
COURSE STRUCTURE FOR
BACHELOR OF HOTEL MANAGEMENT as per NEP-2020
Course – Structure
w.e.f Academic Session 2025-26

Sem. I	Course Code	Course Category	Course Title	L	T	P	C
	THEORY						
	BH25101	DSC	Food Production Foundation - I	3	1	0	4
	BH25102	DSC	Food and Beverage Service Foundation - I	3	1	0	4
	BH25103	DSC	Room Division Foundation - I	3	0	0	3
	BH25104	DSC	Food Science and Nutrition	2	0	0	2
	BH25105	DSC	Hotel Accounting	3	0	0	3
	Lab						
	BH25106	DSC	Food Production Foundation Practical - I	0	0	3	1.5
	BH25107	DSC	Food and Beverage Service Foundation Practical - I	0	0	3	1.5
	BH25108	DSC	Room Division Foundation Practical - I	0	0	3	1.5
	HS24131	AECC	Communication Skill - I	0	0	3	1.5
	MC24101/2/3/4/5	VAC	PT & Games / NSS / NCC / CA / Entrepreneurship	0	0	2	1
	Total Credit			23			

Sem. II	Course Code	Course Category	Course Title	L	T	P	C
	THEORY						
	BH25109	DSC	Food Production Foundation - II	3	1	0	4
	BH25110	DSC	Food and Beverage Service Foundation - II	3	1	0	4
	BH25111	DSC	Room Division Foundation - II	3	0	0	3
	CE24101	MDC	Environmental Science	2	0	0	2
	BH25112	AECC	Application of Computer in Hospitality	3	0	0	3
	Lab						
	BH25113	DSC	Food Production Foundation Practical - II	0	0	3	1.5
	BH25114	DSC	Food and Beverage Service Foundation Practical - II	0	0	3	1.5
	BH25115	DSC	Room Division Foundation Practical - II	0	0	3	1.5
	BH25116	AECC	Application of Computer in Hospitality Lab	0	0	3	1.5
	MC24106/7/8/9/10	VAC	PT & Games / NSS / NCC / CA / Entrepreneurship	0	0	2	1
	Total Credit			23			

Sem. III	Course Code	Course Category	Course Title	L	T	P	C
	BH25201	DSC	Food Production Operation - I	3	0	0	3
	BH25202	DSC	Food and Beverage Service Operation - I	3	1	0	4
	BH25203	DSC	Accommodation Operation - I	3	0	0	3
	BH25204	DSC	Front Office Operation - I	3	0	0	3
	MN25102	VAC	Human Values & Professional Ethics	3	0	0	3
	Lab						
	BH25205	DSC	Food Production Operation Practical - I	0	0	3	1.5
	BH25206	DSC	Food and Beverage Service Operation Practical - I	0	0	3	1.5
	BH25207	DSC	Accommodation Operation Practical - I	0	0	3	1.5
	BH25208	DSC	Front Office Operation Practical - I	0	0	3	1.5
	MC24201/2/3/4/9	VAC	PT & Games / NSS / NCC / CA / Entrepreneurship	0	0	2	1
	Total Credit			23			

IV	Course Code	Course Category	Course Title	L	T	P	C
	BH25209	SEC-SB	Industrial Training (22 Weeks)				
			Food Production Operation - Industry Exposure	0	0	0	20
			Food and Beverage Service Operation - Industry Exposure	0	0	0	
			Accommodation Operation - Industry Exposure	0	0	0	
			Front Office Operation - Industry Exposure	0	0	0	
	Total Credit			20			

Sem. V	Course Code	Course Category	Course Title	L	T	P	C
		DSE	Program Elective - I *	3	0	0	3
	BH25301	DSC	Travel and Tourism Management	3	0	0	3
	BH25302	DSC	Event Management	3	0	0	3
	BH25303	DSC	Principles of Management	3	0	0	3
	HS24104	VAC	Indian Knowledge System	2	0	0	0
	HS25301	AECC	French	3	0	0	3
	Lab						
		DSE	Program Elective - II *	0	0	3	1.5
	HS24133	AECC	Communication Skill - II	0	0	3	1.5
	Total Credit			18			

Sem. VI	Course Code	Course Category	Course Title	L	T	P	C
		DSE	Program Elective - III*	3	0	0	3
	BH25312	DSC	Service Marketing	3	0	0	3

	BH25313	DSC	Customer Relationship Management	3	0	0	3
	BH25314	DSC	Legal Aspects of Hospitality Management	3	0	0	3
	BH25315	VAC	Introduction to AI in Hospitality	3	0	0	3
	LAB						
		DSE	Program Elective - IV*	0	0	3	1.5
	BH25316	AECC	PD Lab - I	0	0	3	1.5
Total Credit				18			

Sem. VII	Course Code	Course Category	Course Title	L	T	P	C
	BH25401	DSC	Research Methodology	3	0	0	3
	BH25402	DSC	Financial Management	3	0	0	3
	BH25403	DSC	Hotel Entrepreneurship	3	0	0	3
	BH25404	VAC	Facility Management	2	0	0	2
	BH25405	DSC	Human Resource Management	3	0	0	3
	LAB						
	BH25406	SEC-SB	Field Work and Workshop	0	0	18	6
Total Credit				20			

Sem. VIII	Course Code	Course Category	Course Title	L	T	P	C
	BH25407	DSC	Supply Chain Operation	3	0	0	3
	BH25408	DSC	Organizational Behaviour	3	0	0	3
	BH25409	DSC	Consumer Behaviour	3	0	0	3
	Lab						
	BH25410	SEC-SB	Project	0	0	18	6
Total Credit				15			
Grand Total Credit				160			

Exit Option after 1st Year for Certificate Program, students need to undergo 2 months Vocational Training

Months - Vocational Training						
Course Code	Course Category	Course Title	L	T	P	C
BH25117	SEC-SB	Vocational Training (8 Weeks)				
		Food Production Operation - Industry Exposure	0	0	0	6
		Food and Beverage Service Operation - Industry Exposure	0	0	0	
		Accommodation Operation - Industry Exposure	0	0	0	
		Front Office Operation - Industry Exposure	0	0	0	
Total Credit			6			

Exit Option after 2nd Year for Diploma Program, students need to clear 2 Vocational Skills Courses of 6 credit

Course Code	Course Category	Course Title	L	T	P	C
BH25210	SEC-SB	Vocational Course in Food Division Management	2	0	2	3
BH25211	SEC-SB	Vocational Course in Room Division Management	2	0	2	3
Total Credit			6			

Program Elective - I

Course Code	Course Category	Course Title	L	T	P	C
THEORY						
BH25304	DSE	Bakery and Confectionery Management	3	0	0	3
BH25305	DSE	Fundamentals of Alcoholic Beverage	3	0	0	3
BH25306	DSE	Accommodation Management - I	3	0	0	3
BH25307	DSE	Front Office Management - I	3	0	0	3

Program Elective - II

Lab						
BH25308	DSE	Bakery and Confectionery Management Lab	0	0	3	1.5
BH25309	DSE	Fundamentals of Alcoholic Beverage Lab	0	0	3	1.5
BH25310	DSE	Accommodation Management Lab - I	0	0	3	1.5
BH25311	DSE	Front Office Management Lab - I	0	0	3	1.5

Program Elective - III

Course Code	Course Category	Course Title	L	T	P	C
THEORY						
BH25317	DSE	International Cuisine	3	0	0	3
BH25318	DSE	Food and Beverage Control Management	3	0	0	3
BH25319	DSE	Accommodation Management - II	3	0	0	3
BH25320	DSE	Front Office Management - II	3	0	0	3

Program Elective - IV

LAB						
BH25321	DSE	International Cuisine Lab	0	0	3	1.5
BH25322	DSE	Food and Beverage Control Management Lab	0	0	3	1.5
BH25323	DSE	Accommodation Management Lab - II	0	0	3	1.5
BH25324	DSE	Front Office Management Lab - II	0	0	3	1.5

Acronyms Expanded

- AECC: Ability Enhancement Compulsory Course
- DSC (C): Discipline Specific Core (Course)
- SEC-SB: Skill Enhancement Course-Skill Based/
- VAC: Value Added Course
- MDC: Multidisciplinary Course
- DSE: Discipline Specific Elective
- L+T+P: Lecture + Tutorial + Practical (s)

1st Year Syllabus and Course Information Sheet

COURSE INFORMATION SHEET

Course code: BH25101
Course title: Food Production Foundation - I
Pre-requisite(s): NIL
Co- requisite(s): Food Production Foundation Practical - I
Credits: 4 L: 3 T: 1 P: 0

Class schedule per week: 04
Class: BHM
Semester / Level: First/ One
Branch: BHM
Name of Teacher: Pratima Ekka

Course Objectives

This course envisions to impart to students to:

1.	Understand the basic knowledge of working in a professional kitchen.
2.	Know the kitchen equipment, safety procedure, fuels, fire, firefighting and first aids.
3.	Understand the use of various ingredients in kitchen and their preparation
4.	Explain the use of different methods of cooking
5.	Understand the basic bakery preparations

Course Outcomes

After the completion of this course, students will be able to:

CO1	Describe the professional kitchen.
CO2	Classify kitchen equipment; conceptualize the safety procedure, fuels usages and precautions, fire, firefighting and first aids.
CO3	Classify Herbs, spices, cereals, pulses, fruits and vegetables and Milk & Milk product
CO4	Apply different methods of cooking
CO5	Explain the basic bakery preparations

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Kitchen Organization Culinary History, Introduction, Definition, and its importance; Personal & Kitchen Hygiene, Uniform, Protective clothing, Kitchen Layouts (Basic, Bulk and Show kitchens), Hierarchy of Kitchen Department, Classical Kitchen Brigade, Modern Staffing in various hotels, Duties & Responsibilities of various chefs in kitchen, their attributes; coordination of kitchen with other departments.	12
Module 2: Kitchen Equipment, Fuels & Safety Kitchen Equipment, Classification, Evaluation, Description, Usage, Upkeep and Storage, Kitchen Tools, Knives, Their Usage, Care & Maintenance, Workstations, Safety Procedures, Fuel – Types, Usage and Precautions. Fire - Introduction, Types and handling fires and usage of extinguishers; First Aid- Basic Burns, Scalds, Cuts. Basic Grooming requirements.	12
Module 3: Ingredients used in cooking Herbs & Spices, Cereals and Pulses, Fruits and Vegetables, and Salt, Sweeteners, Fat, Aims and Objectives of cooking. Raising Agents- introduction and usage. Egg Cookery- Introduction, Usage in Kitchen, Structure of Egg, Classification, Grading of Eggs, Types, Selection, Storage, frying, poaching, boiling, baking, omelet-types, en cocotte, scramble.	10
Module 4: Methods of Cooking Introduction, Definition, and its importance; Types- Baking, Broiling, Grilling, Frying, Steaming, Stewing, Poaching, Poeling, Roasting, Frying, Sautéing, Braising Cooking with Microwave, Ovens, Gas, Induction Plates and other such media. HACCP Standards and Professional Kitchens, Solar Cooking.	8
Module 5: Bakery and Confectionary Principles –Types of ovens used. Ingredients used in Bakery – Wheat and wheat products, flour-types, uses and storage, Different Methods of Bread Making, Bread Faults, Bread Improvers. Culinary Terms.	8

Textbooks:

1. Food Production Operations by Chef Parvinder S. Bali
2. Practical Professional Cookery by Cracknell and Kaufmann
3. Catering Management by Mohini Sethi & Surjeet Malhan

Reference Books:

1. Hygiene and Sanitation by S. Roday
2. Indian Food: A Historical Companion by Achaya KT
3. Food: A Culinary History by Jean-Louis Flandrin

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	3	2	3	3	2	2	3	2		3	3	3	2
CO2	3	2	3	2	1	2		2	1	2		3	3	3	2
CO3	3	2	3	2	1	2		2	3	2		3	3	3	2
CO4	3	2	3	2	1	3	3	2	1	2		3	3	3	2
CO5	3	2	3	2	1	2		2	1	2		3	3	3	2

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25102
Course title: Food and Beverage service Foundation - I
Pre-requisite(s): Nil
Co- requisite(s): Food and Beverage service Foundation Practical - I
Credits: 4 L:3 T:1 P:0
Class schedule per week: 04
Class: BHM
Semester / Level: First/One
Branch: BHM
Name of Teacher: Amit Saran

Course Objectives

This course enables the students:

A.	To know about Food and Beverage Industry.
B.	Understand Organisational structure of F&B department of different category of hotels.
C	Classify the role of various F&B Outlets and ancillary area.
D	Recognise the use of different types of F&B equipment used in hotel operation.
E	Learn various Food and Beverage service applied in hospitality industry.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Classify different food and beverage sector.
CO2	Describe organisational structure of different star category of hotels.
CO3	Know the difference between food and beverage outlets and ancillary areas in hotels.
CO4	Identify different equipment used in F&B Section in hotels.
CO5	Apply different food and beverage service methods.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: The Hotel & Catering Industry Introduction to the hotel industry & growth of hotel industry in India; Role of catering establishment in the travel/tourism industry; Types of F&B operations; Welfare catering- Industrial/Institutional/Transport such as air/road/rail/sea etc.; Structure of catering industry-a brief description of each.	8
Module 2: Departmental Organisation & Staffing Organisation of F&B department of hotel; Principal staff of various types of F&B operations; French terms related to F&B staff; Duties and responsibilities of F&B staff; Attributes of a waiter; Inter-departmental relationship (within F&B and other department).	10
Module 3: Food Service Areas Casual eateries, fine dining restaurants and café; Fast food; Speciality restaurant; Discotheque; Night club; Bar, Grill room; Room service; Coffee shop/cafeteria; Banquet service; Vending machine etc. Ancillary Departments Pantry/Food pickup area/Store/ Linen room/Kitchen Stewarding etc.	12
Module 4: F&B Service Equipment Familiarisation of cutlery/Crockery/Glassware/Flatware/Hollowware; Uses of equipment; Criteria for selections; Requirement of equipment, Quantities & types; All the equipment used in F&B service; Furniture/Linen/Disposables etc.	10
Module 5: Methods Of Service Mise-en scene & Mise-en-place; Types of service: Pre plated, Silver, Russian, French, Self-service, assisted service, Buffet service, Banquet service, Single point service, ODC.	10

Textbooks:

1. Food & Beverage service: Lillicrap & Cousins, ELBS
2. Food & Beverage service: Sudhir Andrews
3. Modern Restaurant service: Jhon Fuller, Hutchinson
4. Introduction F&B service: Brown, Heepner & Deegan

Reference books:

1. Food & Beverage training manual: Sudhir Andrews, Tata McGraw Hill
2. Food & Service management: Brian Varghese

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Mid Sem Examination Marks	25
End Sem Examination Marks	50
Assignment / Quiz (s)/Assessment	25

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	-	2	3	-	3	-	2	3	3	-	3	-	3	3	2
CO2	2	-	3	-	3	-	-	2	2	-	2	-	3	3	2
CO3	2	-	-	-	3	-	3	1	1	-	1	3	3	3	2
CO4	2	-	3	-	3	-	2	2	2	-	2	3	3	3	2
CO5	2	2	3	-	3	-	2	3	3	-	3	3	3	3	2

Mapping Between COs and Course Delivery (CD) methods

CD	Course Delivery methods	Course Outcome	Course Delivery

				Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1,CO2,CO3,CO4,CO5	CD1
CD2	Tutorials/Assignments		CO2,CO3,CO4	CD2
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets		CO1,CO2,CO3,CO4,CO5	CD8
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25103
Course title: Room Division Foundation -I
Pre-requisite(s): NIL
Co- requisite(s): Room Division Foundation Practical - I
Credits: 3 L: 3 T:0 P:0

Class schedule per week: 03
Class: BHM
Semester / Level: First/ One
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	Understand the fundamentals of hotels like size, category and classification.
2.	Design and create organizational structure of housekeeping and Front office dept. of various sizes of hotel.
3.	Differentiate between the types of rooms and clarify the basis of charging room tariff and different meal plans.
4.	Describe various hotel chains operating in India.
5.	Discuss Interdepartmental cooperation-room division and its importance.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Classify hotels based on size, category and location and understand the importance of Housekeeping and front office dept.
CO2	Create organization structure for housekeeping and Front office department of various sizes of hotel.
CO3	Explain different types of guestrooms and clarify the basis of charging room tariffs and different meal plans.
CO4	Explain various hotel chain operating in India.
CO5	Explain the importance of the Interdepartmental Cooperation-room division.

SYLLABUS

MODULE	(NO.OF LECTURE HOURS)
Module 1: Introduction to Room Division Hotel: Meaning, classification, size, category, location etc.; Room Division: Concept, Importance, classification, sections and sub- sections.; Housekeeping: Meaning, Role of housekeeping in hotel, its importance, different areas of the department, Layout of the department.; Front office: Role of Front office and its importance, Functions of F.O. dept.	8
Module 2: Organization of Housekeeping/Front office department Organization structure of housekeeping/ Front office dept. (Small, medium, large hotels), Duties and responsibilities of H.K./FO staff, Job description and Job specification, Personality traits of housekeeping/Front office personnel, Role of Housekeeping and Front office in guest satisfaction.	10
Module 3: Hotel Guestroom Importance of Guestrooms to a guest, Types of guestrooms, layout (single, double, suit, twin etc.), Guest room supplies and amenities, Guestroom status, Guest floor rules, Basic of charging-Check-in-check out, 24 hours, Types of Room rates (Special rates). Meal plans- (EP, BP, CP, AP, MAP etc.)	8
Module 4: Introduction to major Indian Hotel groups Welcome group, Oberoi group, Taj group, Ambassador, HCI, Leela group, Park hotels, Jaypee hotels.	8
Module 5: Intra and Inter departmental Coordination Interdepartmental coordination of housekeeping and front office with other departments and its importance. Role of room division in complaint handling.	6

Textbooks:

1. Andrews, Sudhir, *Hotel Housekeeping*, Tata McGraw Hill, 2009.
2. Raghubalan, G. *Hotel Housekeeping Operation and Management*, Oxford University press, 2007.
3. Bhatnagar, S.K., *Front Office Management*, Frank Bros. & Co. Ltd., 2013

Reference books:

1. Schneider, M. *The Professional Housekeeper*, Wiley, 1998
2. Jones, M. *Professional Management of Housekeeping operations*, Wiley, 2007
3. Branson, C, Lennox Margaret. *Hotel, Hostel & Hospital Housekeeping*, Hooder Education, 1988.
4. Kappa, Margret, Nitschke, Aleta. *Managing House Keeping Operation*, AHLA, 1997.
5. Allen, David. *Accommodation & Cleaning Services*, Vol I & Vol II, Hutchinson, 1983.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	05
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	2		3	1	1	1	1	2	3	2	3	2	3
CO2	3	3	2		3	3	1	1	1	2	1	2	3	3	3
CO3	3	3	3	2	3	2	1	2	3	3	3	3	2	3	3
CO4	3	2	2	1	2	1			2	3	2	2	3	1	1
CO5	3	3	2	1	3	3	2	1	2	2	2	2	3	2	2

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini projects/Projects	CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25104
Course title: Food Science & Nutrition
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 2 L:2 T: 0 P: 0

Class schedule per week: 02
Class: BHM
Semester / Level: First/One
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	Introduce to the basics of food composition, food groups, and physical/chemical characteristics of food.
2.	Understand human nutritional needs and dietary guidelines for health and wellness.
3.	Emphasize safe food handling, storage, and sanitation in foodservice operations.
4.	Introduce processing and preservation techniques to improve food safety, shelf life, and quality.
5.	Apply nutrition principles in meal planning and menu development in hospitality settings.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify and explain the composition and properties of different food groups and analyze the effects of physical and chemical changes on food in culinary operations.
CO2	Demonstrate an understanding of human nutritional needs, classify nutrients and their functions, and apply basic dietary guidelines to promote health and wellness.
CO3	Apply the principles of hygiene, sanitation, and food safety in kitchen and food service environments, in accordance with legal and regulatory standards such as FSSAI and HACCP.
CO4	Describe and evaluate various food processing and preservation methods, and assess their impact on nutritional value, shelf life, and quality relevant to hospitality settings.
CO5	Apply nutritional knowledge to plan balanced, health-conscious menus and design meals for diverse dietary needs, supporting wellness-oriented hospitality services.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Fundamentals of Food Science Introduction to Food Science: Definitions, scope, and relevance to hospitality.; Food Composition: Carbohydrates, proteins, fats, water, vitamins, minerals.; Food Groups & Balanced Diets: Classification, nutritional significance.; Physical Properties of Food: Texture, colour, flavour, density, viscosity.; Chemical Properties of Food: pH, enzymatic browning, Maillard reaction.; Food Additives & Preservatives: Types, functions, legal considerations.	6
Module 2: Principles of Nutrition Introduction to Nutrition: Definitions, role of nutrients, dietary recommendations.; Macronutrients: Carbohydrates, proteins, fats—functions and food sources.; Micronutrients: Vitamins and minerals—types, sources, deficiency diseases.; Water & Electrolytes: Functions, requirements, hydration in hospitality.; Energy Metabolism: BMR, energy balance, and energy-yielding nutrients.; Dietary Guidelines: ICMR recommendations, RDA, and MyPlate concept.	6
Module 3: Food Safety & Hygiene Food Hazards: Biological, chemical, and physical hazards in foods.; Personal Hygiene & Kitchen Sanitation: Standards and practices.; Food Spoilage & Contamination: Causes, signs, prevention.; Food Safety Regulations: FSSAI, HACCP, Codex Alimentarius.; Food Storage Principles: Dry, refrigerated, frozen—best practices.; Cleaning & Disinfection: Procedures, chemicals, and equipment used.	6
Module 4: Food Processing & Preservation Introduction to Food Processing: Objectives and classifications.; Thermal Processing: Pasteurization, sterilization, blanching.; Cold Preservation: Refrigeration, freezing, cryogenic methods.; Dehydration & Drying: Techniques and impact on food quality.; Fermentation & Pickling: Basics, health benefits, and uses.; Packaging & Labelling: Types, food-grade materials, legal requirements.	6
Module 5: Applied Nutrition in Hospitality Nutrition through Life Stages: Needs for children, adults, elderly.; Therapeutic Diets: Diabetic, low-sodium, high-protein diets, etc.; Menu Planning for Health: Calorie counting, portion control, nutrient balance.; Nutrition Labelling & Allergen Awareness: Importance in menu design.; Trends in Nutrition & Food: Superfoods, plant-based diets, functional foods.; Case Study on healthy hotel menus.	6

Textbooks:

1. Roday, S. *Food Science & Nutrition*, Oxford University Press, 2011
2. Suri, S. & Malhotra, A. *Food Science Nutrition and Safety*, Pearson, 2014

Reference Books:

1. Swaminathan, M. *Food & Nutrition*. Volume I&II, BAPPCO, 1991.

2. Mudambi, S.R. & Rao, S.M. *Food Science*, Wiley Eastern Limited, 1990
3. Mudambi, S.R. & Rajagopal, M.V. *Fundamentals of Foods and Nutrition*. Wiley Eastern Limited, 1988

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	1	2	1	1	1	2	2	1	1	2			
CO2	3	2	2	1	1	1	1	3	2	3	1	2			
CO3	3	2	2	2	2	2	2	3	3	3	2	2			
CO4	2	2	3	3	2	1	1	2	2	3	2	2			
CO5	3	3	3	2	2	3	2	3	2	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25105
Course title: Hotel Accountancy
Pre-requisite(s): NIL
Co-requisite(s): NIL
Credits: 3 L: 3 T: 0 P: 0
Class schedule per week: 03
Class: BHM
Semester/Level: First / One
Branch: BHM
Name of Teacher: Shelly Srivastava

Course Objectives

This course envisions to equip student with:

1.	Foundational understanding of accounting as an information system that supports business decision-making.
2.	Practical knowledge and skills in the preparation of primary and secondary books of accounting.
3.	Understanding of Bank Reconciliation Statement (BRS), identify the reasons for differences between the Cash Book and Passbook balances.
4.	Preparation of a Trial Balance, and develop skills in identifying, classifying, and rectifying accounting errors to ensure accuracy in financial records.
5.	Understanding the structure, purpose, and significance of Final Accounts in determining the financial performance and position of a business.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Explain the role of accounting as an information system and its importance in business decision-making processes.
CO2	Apply the Golden Rules of Accounting to accurately record financial transactions.
CO3	Analyse the reasons of differences and prepare BRS with rectification of errors.
CO4	Prepare a Trial Balance and detect common accounting errors.
CO5	Prepare the Trading Account, Profit and Loss Account, and Balance Sheet to determine a business's financial results and position.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Introduction Accounting as an information system, Principles of Accounting. Generally Accepted Accounting Principles (GAAP).	5
Module 2: Primary and Secondary Books of Accounting: Golden Rules of Accounting Journal: Definition, Format, Simple entries and compound entries. Ledger: Definition, Uses, Format, Posting. Subsidiary books of Accounting: Purchase Book, Sales Book, Cash Book- Two Column.	9
Module 3: Bank Reconciliation Statement Meaning, Reasons of differences in balance in Cash book and Passbook, Preparation of BRS.	8
Module 4: Trial Balance Meaning, preparation of trial balance, Errors and rectification of errors.	9
Module 5: Final Accounts and Balance Sheet Definition, Trading Account, Profit and loss Account, Balance Sheet.	9

Textbooks:

1. Hanif M. and Mukherjee A. -*Financial Accounting-1*, McGraw - Hill Education India Pvt.Ltd.4th Edition 2018.
2. Shukla M.C., Grewal T. S and Gupta S.C- *Advanced Accounts*, S. Chand & Co Ltd, NewDelhi.18th Edition 2010.
3. Maheshwari and Maheshwari-*Financial Accounting*, Vikas Publishing House. 6th Edition2018
4. Gupta R.L and Radhaswamy M- *Advanced Accountancy*, Sultan Chand, New Delhi 2014.
5. Basu A - *Financial Accounting*, TEE DEE Publication, Kolkata.2009.
6. Rawat D.S - *Student's Guide to Accounting Standard*, Taxmann, New Delhi. 33rd Edition2018

Gaps in the syllabus (to meet Industry/Profession requirements): Nil

POs met through Gaps in the Syllabus: -N/A

Topics beyond syllabus/Advanced topics/Design: -N/A

POs met through Topics beyond syllabus/Advanced topics/Design: -N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	2	2	2	1	1	2	2	1	3			
CO2	3	3	2	3	2	2	1	1	2	2	1	3			
CO3	3	2	3	2	2	2	1	1	1	2	1	3			
CO4	3	3	2	3	2	2	1	1	2	2	1	3			
CO5	3	3	3	3	2	2	1	1	2	2	1	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini projects/Projects	CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD8
CD6	Industrial/guest lectures		

CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25106
Course title: Food Production Foundation Practical – I
Pre-requisite(s): NIL
Co- requisite(s): Food Production Foundation - I
Credits: 1.5 L:0 T:0 P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: First / One
Branch: BHM
Name of Teacher: Pratima Ekka

Course Objectives

This course envisions to impart to students to:

1.	Knowledge of Professional Kitchen & familiarizing with Kitchen Equipment's, Fuels & Safety.
2.	Identify different cuts of vegetables.
3.	Develop the knowledge of various eggs preparations.
4.	Interpret the various cooking method & bakery preparation.
5.	Develop basic knowledge of breads making.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Describe the importance of professional kitchen & familiarizing with Kitchen Equipment's, Fuels & Safety.
CO2	Identify different cuts of vegetables & Basic Breads Preparation.
CO3	Develop the knowledge of various eggs preparations and basic cookies from bakery.
CO4	Apply different methods of cooking and gain the knowledge of using yeast in bakery product.
CO5	Develop classic bread preparations.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Introduction to Food Production & Bakery Department, Equipment's, Tools & their Uses, Safety in Kitchen & Bakery.	6
Module 2 Practice session for Cuts of Vegetables, Demonstration and Practical of Basic Breads (BAKERY)	6
Module 3 Demonstration & Practical of Basic Egg Preparation Demonstration and Practical- Bakery Swiss Roll (Yule Log) Doughnuts (BAKERY) Practical of Basic Egg Preparation Demonstration and Practical- Bakery-Butter cookies, Vanilla Buns, Jam Tart (BAKERY)	12
Module 4 Methods of Cooking: MOC- Sautéing Poulet sauté Chasseur, Glazed Carrot, Sautéed Garlic Potatoes, Crêpe with Sautéed banana & chocolate sauce, Caramelized Banana Walnut Muffin. (BAKERY) MOC - Stewing Stewed Lentil Vegetable Soup, Stewed Fruit with Custard Sauce Garlic Bread Rolls, Chocolate Sauce. (BAKERY) MOC- Baking French Onion Soup, Jacket Potatoes and Vegetable, French Baguette, Caramel Custard. (BAKERY)	18
Module 5 MOC- Boiling-Al Dente Minestrone Soup Spaghetti Chocolate Brownie (BAKERY) MOC- Deep Fried Corn Nuggets Banana Fritters, Churros (BAKERY) MOC- GRILLING /ROASTING Chicken Tikka, Hara Bhara Kebab, chutney Plain, Burger, (BAKERY)	18

Textbooks:

1. D.D., Mary, *Cooking Essentials for the New Professional Chef*. John Wiley and Sons, 1997.
1. Parvinder S Bali, *Food Production Operations*. Oxford University Press, 2014.
2. Philip E. Thangam, *Modern Cookery (Vol- I)*, Orient Longman, 1946.
3. R. Kinton & V. Cessarani, *Foundation Practical Cookery*, Hodder Education, 2009.
4. R.J. Kauffman & H. Cracknell, *Practical Professional Cookery*, Thomson, 1999.

Reference Books:

- The Theory of Catering- FOSKETT, D., and CESARANI, V, Book Power Hodder
- Theory of Cookery ARORA, K Frank Bros. & Co. Ltd.
- Professional Cooking. GISSLEN, W., John Wiley & Sons INC.
- La Rousse Gastronomique MONTAGNE, P. Hamlyn Octopus publishing group
- Modern Cookery I & II PHILIP, E Orient Longman 2009
- Classical cooking the modern way. Pauli, E. (1989a).
- The book of ingredients. Van Nostrand Reinhold. Gringson, J. (1967)

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment

1. Student Feedback on Faculty
2. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	3	1	3		2		2	1	2	3	3	2
CO2	3	3	3	3	3	3		3	3	2	1	3	3	3	1
CO3	3	3	3	2	2	3		2		2	1	3	3	3	1
CO4	3	3	3	3	3	3	2	3	3	2	1	3	3	3	1
CO5	3	3	3	3	2	3		2	3	2	1	3	3	3	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8, CD1
CD2	Tutorials/Assignments	CO2	CD5, CD8, CD1
CD3	Seminars	CO3	CD5, CD8, CD1
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25107
Course title: Food and Beverage service Foundation Practical - I
Pre-requisite(s): Nil
Co- requisite(s): Food and Beverage service Foundation - I
Credits: 1.5 L: T: P:3
Class schedule per week: 3
Class: BHM
Semester / Level: First/One
Branch: BHM
Name of Teacher: Amit Saran

Course Objectives

This course enables the students:

1	Recognise the use of different types of F&B equipment used in hotel operation.
2	Understand attributes of service staff and basic table service.
3	Learn different type of table service during service.
4	Gain the basic knowledge of up keeping and arrangements of dummy waiter in Food and Beverage Operations inside the restaurant.
5	Learn various methods of cleaning of silver in Food and Beverage service operation.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Classify different equipment used in food and beverage sector/operations
CO2	Apply different attributes during service and attending guests.
CO3	Know different type of table service during food and beverage operation.
CO4	Demonstrate different types of napkin folds and sideboard arrangements for service in a restaurant.
CO5	Explain the procedures of cleaning & polishing of silver, crockery, glassware used in a restaurant.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Topic to be covered: <ul style="list-style-type: none">Familiarization of restaurant equipmentRestaurant hygiene practice (Mise-en-place & mise-en-scene)	3
Module 2 Topic to be covered: <ul style="list-style-type: none">Basic etiquette of service staffService of waterLying & relaying of table linen	3
Module 3 Topic to be covered: <ul style="list-style-type: none">Tray/salver service methodUse of service gear during service	3
Module 4 Topic to be covered: <ul style="list-style-type: none">Folding serviette in various designArrangement of sideboards	3
Module 5 Topic to be covered: <ul style="list-style-type: none">Ash tray cleaning procedureMethod of cleaning and upkeep of silver	3

Textbooks:

- Food & Beverage service: Lillicrap & Cousins, ELBS
- Food & Beverage service: Sudhir Andrews
- Modern Restaurant service: Jhon Fuller, Hutchinson
- Introduction F&B service: Brown, Heepner & Deegan

Reference books:

- Food & Beverage training manual: Sudhir Andrews, Tata McGraw Hill
- Food & Service management: Brian Varghese
- Food & beverage management: Bernard Davis

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	-	2	3	-	3	-	2	3	3	-	3	-

2	2	-	3	-	3	-	-	2	2	-	2	-
3	2	-	-	-	3	-	3	1	1	-	1	3
4	2	-	3	-	3	-	2	2	2	-	2	3
5	2	2	3	-	3	-	2	3	3	-	3	3

Mapping Between COs and Course Delivery (CD) methods

CD	Course Delivery methods		Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1,CO2,CO3,CO4,CO5	CD1
CD2	Tutorials/Assignments		CO2,CO3,CO4	CD2
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets		CO1,CO2,CO3,CO4,CO5	CD8
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25108
Course title: Room Division Foundation Practical-1
Pre-requisite(s): NIL
Co- requisite(s): Room Division Foundation -1
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: First / One
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	Learn the layout of Housekeeping and Front office department.
2.	Understand organizational structure of housekeeping department.
3.	Know the layout of different types of guestrooms.
4.	Understand the different types of guest supplies and amenities provided in the rooms.
5.	Understand the organizational structure of Front office department for different size of hotel.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Design layout of Housekeeping and Front office department.
CO2	Create organizational structure of housekeeping department.
CO3	Design layout of different types of guestrooms.
CO4	Create a list of different types of guest supplies and amenities provided in the room.
CO5	Design organizational structure of Front office department for different sizes of Hotel.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Layout of HK and FO Department Designing the layout of the Housekeeping Designing the layout of the Front office department.	6
Module 2 Organizational structure of HK Creating organizational structure of Housekeeping/ department for small hotel and medium hotel Creating the organizational structure of Housekeeping. for large hotel	6
Module 3 Layout of guestrooms Drawing layout of Single room and Double room Layout of Suite room and Twin room	6
Module 4 Guest supplies and amenities Preparing list of guest supplies and amenities.	6
Module 5 Organizational structure of FO Creating organizational structure of Front office department for small hotel. Organizational structure of Front office department for medium size hotel. Organizational structure of Front office department for large size hotel.	6

Textbooks:

- 1 Andrews, Sudhir, *Hotel Housekeeping*, Tata McGraw Hill, 2009.
- 2 Raghubalan, G. *Hotel Housekeeping Operation and Management*, Oxford University press, 2007.
- 3 Bhatnagar, S.K., *Front Office Management*, Frank Bros. & Co. Ltd., 2013

Reference books:

1. Schneider, M. *The Professional Housekeeper*, Wiley, 1998
2. Jones, M. *Professional Management of Housekeeping operations*, Wiley, 2007
3. Branson, C, Lennox Margaret. *Hotel, Hostel & Hospital Housekeeping*, Hooter Education, 1988.
4. Kappa, Margret, Nitschke, Aleta. *Managing House Keeping Operation*, AHLA, 1997.
5. Allen, David. *Accommodation & Cleaning Services*, Vol I & Vol II, Hutchinson, 1983.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	1	2	1	2	2	3	2	2	3	3	2	2
CO2	3	3	3		2	3	1	2	3	2	1	3	3	2	3
CO3	3	3	3	2	2	2	1	2	3	1	1	3	3	2	2
CO4	3	3	3		3	1	3	3	2	3	2	3	3	3	2
CO5	3	3	2	1	2	3	2	2	2	1	2	3	3	2	2

Correlation Levels 1,2 or 3 as defined below:

- 1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO 1	CD5, CD8
CD2	Tutorials/Assignments	CO 2	CD5, CD8
CD3	Seminars	CO 3	CD5, CD8
CD4	Mini projects/Projects	CO 4	CD5, CD8
CD5	Laboratory experiments/teaching aids	CO 5	CD5, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: HS24131
Course title: Communication Skills I
Pre-requisite(s): Nil
Co- requisite(s): Nil
Credits: 1.5 L: 0 T:0 P: 3
Contact Hours: 35-40
Class schedule per week: 1
Class: UG/PG
Semester: I, II
Branch: UG/PG

Course Objective

Objective-1	To demonstrate the ability to listen to and comprehend complex speech in English, listen to explanations, descriptions, messages, news stories, opinions, solutions, etc.
Objective-2	To demonstrate the ability to speak effectively in English with peers, teachers and others, handle the various speaking situations in their academic and social sphere with confidence.
Objective-3	To demonstrate the ability to read and analyse functional texts confidently; apply critical thinking, analysis and problem-solving skills to the reading material.
Objective-4	To demonstrate the ability to write messages, personal accounts, critical reviews, short biographies, describe processes, write persuasive essays, etc.
Objective-5	To demonstrate a strong hold on functional grammar which helps them avoid common communication errors.

Course Outcomes

	Modules
CO-1	Communicate confidently in English with their peers and teachers in the immediate environment and with colleagues, clients, etc., in their future workplaces.
CO-2	Apply their learning of English to domain subjects and make presentations, posters, write research papers, lab reports, etc., with confidence.
CO-3	Handle communicative situations confidently in their academic life, such as conversations, discussions, interviews, presentations, seminars, webinars, etc.
CO-4	Prepare for their future workplaces and their requirements, such as handling team huddles, meetings, phone calls, client visits, field visits, inspections, etc.
CO-5	Apply critical thinking abilities to analyse problems, brainstorm solutions, handle situations that require persuasive skills, etc.

SYLLABUS

Module	Contents	BL
1	Effective Listening: The importance of listening: Listening for descriptions of people; listening for opinions; listening for complaints; Listening to people making, accepting, and declining requests; Listening to news stories; listening to messages and a podcast; Process of Listening, Types	1,2

	<p>of Listening, Barriers to Effective Listening, Listening at different managerial levels.</p> <p>Listening for information about living abroad; listening to opinions; Listening to complaints; Listening to environmental problems; listening for solutions; Listening to descriptions of important events; listening to regrets and explanations; Listening to explanations; listening for the best solution; Listening to past obstacles and how they were overcome; listening for people's goals for the future.</p>	
2	<p>Speaking with Confidence:</p> <p>Describing personalities; expressing likes and dislikes; agreeing and disagreeing; complaining; Talking about possible careers; describing jobs; deciding between two jobs; Making direct and indirect requests; accepting and declining requests; Narrating a story; describing events and experiences in the past; Talking about travelling abroad; expressing emotions; describing cultural expectations; giving advice; Describing problems; making complaints; explaining something that needs to be done.</p> <p>Identifying and describing problems; coming up with solutions; Asking about preferences; discussing different skills to be learned; talking about learning methods; talking about life skills; asking for and giving advice or suggestions; talking about things to be accomplished in the future; Describing milestones; describing turning points; describing regrets and hypothetical situations; Describing qualities for success; giving reasons for success; interviewing for a job; talking about ads and slogans; Drawing conclusions; offering explanations; Giving opinions for and against controversial topics; offering a different opinion; agreeing and disagreeing.</p>	2,3
3	<p>Art of Reading:</p> <p>Reading about unusual social networking sites; Reading about different types of workplaces; Reading about talking to friends about difficult topics; Types of Reading, Methods of Reading, Reading Comprehension.</p> <p>Reading about the reliability of online content; Reading about a problem with a ride-sharing service; Reading about a creative solution to a problem; Reading about different studying styles; Reading about young scientist; Reading about futurists and their predictions for the year 2050; Reading about conflict and advice on how to fix it; Reading about advertisements; Reading about unexplained events; Reading about a job role; Reading about plagiarism in the digital age.</p>	4
4	<p>Writing Skills:</p> <p>Writing a description of a good friend; Writing about two career choices; Writing a message with requests; Writing a personal account; Writing a pamphlet for tourists; Writing a critical online review; Writing a post on a community website; Writing about a skill; Writing a message of advice; Writing a biography; Writing a message of apology; Writing a TV or web commercial; Writing about a process; Writing a persuasive essay; Writing a personal statement for an application.</p>	4,5

5	Advanced Writing Skills: Art of condensation: Précis writing, Summary Abstract, Synopsis, Paraphrasing; Paragraph writing; Essay writing: Writing a persuasive essay; Writing a biography; Writing about a process; Writing a personal statement for an application; Writing a critical online review; Writing about a complicated situation; Report writing; Writing technical proposals.	4,5
----------	--	-----

Textbooks

1	<i>Interchange 5 edition Level 3</i> , Jack C. Richards, Jonathan Hull, Susan Proctor, Cambridge University Press. Components: Student's Book with online self-study (print/online bundle) CEFR level: B1
----------	---

Reference Books

1	Communication Skills (2015) IInd edition, Sanjay Kumar & Pushp Lata, Oxford University Press
2	Business Correspondence and Report Writing, (2020)VIth edition, R.C. Sharma, Krishna Mohan, Virendra Singh Nirban, McGraw Hill
3	Communication for Business, (2010) IVth edition, Shirley Taylor, V. Chandra, Pearson
4	Basic Business Communication-(2004). Lesikar I Flatley, McGraw Hill
5	Business Communication Today, (2017), Bovee, Thill and Chatterjee, Pearson

Direct Assessment

Tools	% Contribution of Assessment
End Semester Evaluation	100%

Mapping

Course Objective	Course Outcome				
	Module-1	Module-2	Module-3	Module-4	Module-5
1	H	H	M	M	M
2	H	M	M	M	M

3	H	H	M	M	L
4	H	M	H	H	M
5	H	H	M	L	H

H-3 M-2, L-1

COURSE INFORMATION SHEET

Course code: BH25109
Course title: Food production Foundation - II
Pre-requisite(s): NIL
Co- requisite(s): Food production Foundation Practical - II
Credits: 4 L:3 T: 1 P:0

Class schedule per week: 04
Class: BHM
Semester / Level: Second/One
Branch: BHM
Name of Teacher: PRATIMA EKKA

Course Objectives

This course envisions to impart to students to:

1.	Understand the basic commodities.
2.	Know about stocks, sauces, and soups
3.	Understand the Poultry and Meats cookery
4.	Understand the fish, rice, cereals & pulses cookery
5.	Understand the dough, pastes and batters used in bakery

Course Outcomes

After the completion of this course, students will be able to:

CO1	Gain knowledge of basic commodities.
CO2	Classify stocks, sauces, and soups
CO3	Explain the Poultry and Meats cookery
CO4	Examine the uses of fish and seafood in culinary creations, exploring the diverse applications of fish and seafood in cooking.
CO5	Assess the roles of ingredients used in bakery & different methods of cake making.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 BASIC COMMODITIES: Milk: Introduction, Processing of Milk, Pasteurization – Homogenization, Types of Milk – Skimmed and Condensed, Nutritive Value Cream: Introduction, Processing of Cream, Types of Cream Cheese: Introduction, Processing of Cheese, Types of Cheese, Classification of Cheese, Curing of Cheese, Uses of Cheese Butter: Introduction, Processing of Butter, Types of Butter	10
Module 2 Foundations of continental cookery Stocks -Definition of Stock, Types of Stock, Preparation of Stock, Storage of Stock, Uses of Stock, Care and Precautions, Quality of a Good Stock, Sauces - Classification of Sauces, Recipes for Mother Sauces, Derivatives, Thickening Agents, propriety sauces, making of good sauce, emerging trends, Soups -Definition, Classification with Examples, Basic recipes, Garnishes and Accompaniments, Salient Features, Care and precautions, trends in soup presentation	12
Module 3 Meat Fabrication Introduction, Slaughtering Process of Animals (Pre-slaughtering/ Slaughtering/ Post-Slaughtering), Beef / Veal , Introduction, Cuts with figure, Steaks, Doneness and Types of Steaks, Offal, Culinary uses, Quality Signs, Storage, Pork/ Suckling Pig, Introduction, Cuts with figure, Culinary Uses, Uses of Lard, Quality Signs, Storage, Mutton/ Lamb Introduction, Cuts with Figure, Culinary Uses, Quality Signs, Storage, Poultry & Games Introduction, Giblets, Culinary uses Storage	11
Module 4 FISH COOKERY: Introduction to fish cookery, Classification of fish with examples, Cuts of fish with menu examples, Popular Species of Fish, Selection for Purchasing of fish and shellfish, Storing Considerations, Classical Preparations of Fish, Common cooking methods used for sea food. RICE, CEREALS & PULSES: Introduction, Classification and identification, Cooking of rice, cereals and pulses, Varieties of rice and other cereals, Meaning and examples of Farinaceous Dishes, Pasta, Introduction, Origination, Definition, Types of Pasta, Various Pastas, Pasta Sauces, Faults in Pasta	10
Module 5 Bakery and Confectionary: Pastry and Simple Breads Short crust, Laminated, Choux, Puff - Recipes and methods of preparation, Differences, Uses of each pastry, Care to be taken while preparing pastry, Role of each ingredient, Temperature of baking pastry, Types of batters – cakes, pancakes.	6

Textbooks:

1. Arora, K, *Theory of Cookery*, Frank Brothers, 2008
2. Dubey, C, S, *Bakery & Confectionery*, Society of Indian Bakers, 2002
3. Philip E. Thangam, *Modern Cookery (Vol- I)*, Orient Longman, 1946.
4. R. Kinton & V. Cessarani, *Foundation Practical Cookery*, Hodder Education, 2009
5. Kinton, Ronald, Ceserani, Victor, *Theory of Catering*, Hodder Education, 200

Reference Books:

1. Le Rol A. Polsom, *The Professional Chef*. Oxford Publication, 2003.
2. R.J. Kauffman & H. Cracknell, *Practical Professional Cookery*, Thomson, 1999
3. M J Leto & W K H Bode, *Larder Chef*. Butterworth- Heinemann, 1969
4. Feinstein, Hale, Andrew, *Purchasing Selection and Procurement for the Hospitality Industry*, Wiley, 2016
5. Wayne Gislen, *Professional Cooking*. Le Cordon Bleu, 2002
6. Donovan Deirdre Mary, *Cooking Essentials for the New Professional Chef*, John Wiley, 1997.
7. Friberg Bo, *The Professional Pastry Chef, Fourth Edition*, Wiley & Sons, 2002

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Second Quiz	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	3	2	3	3	2	2	3	2		3	3	3	2
CO2	3	2	3	2	1	2		2	1	2		3	3	3	2
CO3	3	2	3	2	1	2		2	3	2		3	3	3	2

CO4	3	2	3	2	1	3	3	2	1	2		3	3	3	2
CO5	3	2	3	2	1	2		2	1	2		3	3	3	2

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25110
Course title : Food and Beverage service Foundation 1I
Pre-requisite(s): Nil
Co- requisite(s): Food and Beverage Service Foundation Practical - II
Credits: 4 L:3 T:1 P:0
Class schedule per week: 4
Class: BHM
Semester / Level: Second/One
Branch: BHM
Name of Teacher: Amit Saran

Course Objectives

This course enables the students:

A.	To know about room service in a hotel
B.	Understand types of meal and menu planning.
C	Apply French classical menu
D	Recognise the use of different control system used in hotel operation.
E	Learn different kind of non-alcoholic beverage.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Apply room service method and room service menu planning.
CO2	Describe types of menus and objective of menu planning.
CO3	Know about French classical menu with their cover, dishes and accompaniments.
CO4	Explain record keeping and control system applied in hotel.
CO5	Apply the service of different types of non-alcoholic beverage.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 ROOM SERVICE <ul style="list-style-type: none">• Introduction• General principles• Room service menu planning• Order taking & noting order• Telephone etiquette• Suggestive selling• Layout and set up of common meals	10
Module 2 MENU PLANNING AND TYPES OF MEAL <ul style="list-style-type: none">• Origin of menu• Objectives of menu planning• Types of menu-Ala carte, Table D' hote, Carte de jour, Plate de Jour• Special menu-Diet menu, Children menu, Low calories menu• Breakfast- English, American, Continental, Indian• Brunch, Lunch, Dinner, Supper, Hi tea, Low tea(Afternoon tea) etc.	10
Module 3 FRENCH CLASSICAL MENU <ul style="list-style-type: none">• Course of French classical menu• French names of dishes• Sequence of French classical menu• Examples from each course• Cover of each course• Accompaniments of each course	12
Module 4 CONTROL SYSTEM <ul style="list-style-type: none">• Manual bill control system-KOT• Single order sheet• Duplicate checking system• Triplicate checking system• Making guests bill	10

<ul style="list-style-type: none"> • Different kind of payment methods • Manual and electronic record keeping system 	
Module 5 NON-ALCOHOLIC BEVERAGE <ul style="list-style-type: none"> • Classification-Nourishing, stimulating and refreshing beverages • Tea-Origin and manufacture, types and brands • Coffee- Origin and manufacture, types and brands • Juices and soft drinks • Cocoa and malted beverages 	8

Textbooks:

- Food & Beverage service: Lillicrap & Cousins, ELBS
- Food & Beverage service: Sudhir Andrews
- Modern Restaurant service: Jhon Fuller, Hutchinson
- Introduction F&B service: Brown, Heepner & Deegan
- Profitable menu planning: John Drysale

Reference books:

- Food & Beverage training manual: Sudhir Andrews, Tata McGraw Hill
- Food & Service management: Brian Varghese
- The restaurant: Walker R. John
- Moder restaurant service: John fuller

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Mid Sem Examination Marks	25
End Sem Examination Marks	50
Assignment / Quiz (s)/Assessment	25

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	-	2	3	-	3	-	2	3	3	-	3	-
2	2	-	3	-	3	-	-	2	2	-	2	-
3	2	-	-	-	3	-	3	1	1	-	1	3
4	2	-	3	-	3	-	2	2	2	-	2	3
5	2	2	3	-	3	-	2	3	3	-	3	3

Mapping Between COs and Course Delivery (CD) methods

CD	Course Delivery methods	Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1,CO2,CO3,CO4,CO5	CD1
CD2	Tutorials/Assignments	CO3,CO4,CO5	CD2

CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets		CO1,CO2,CO3,CO4,CO5	CD8
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25111
Course title: Room Division Foundation -II
Pre-requisite(s): NIL
Co- requisite(s): Room Division Foundation Practical -II
Credits: 3 L: 3 T: P:
Class schedule per week: 03
Class: BHM
Semester / Level: Second/ One
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	Understand the concept of cleaning science, various types of cleaning equipment methods applied in cleaning.
2.	Classify various types of cleaning agents and procedure of using them.
3.	Know the cleaning of guestrooms and public areas.
4.	Evaluate the procedure of star rating in Hotel.
5.	Examine the role of Front office department in guest life cycle

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify various cleaning equipment and standard cleaning procedure to be followed.
CO2	Identify various cleaning agents and procedures to be followed for using the cleaning agents.
CO3	Demonstrate the cleaning of Guestroom and public area.
CO4	Evaluate the process of giving the star category to hotels.
CO5	Explain the role of the Front office department in the guest life cycle.

SYLLABUS

MODULE	(NO.OF LECTURE HOURS)
Module – I Cleaning Organization: Introduction, Reasons of cleaning, Standard of cleaning, Principles of cleaning. Types of soil, Nature of soil. Methods of cleaning: manual, mechanical. Cleaning equipment: Manual and mechanical. Care, storage and upkeep of cleaning equipment. Characteristics and selection of good cleaning equipment	8
Module – II Cleaning Agents: Definition, Function, Importance and Types of cleaning agent. Water: Sources, Types, effects, Method of softening water. Detergents: Composition, Types and action of detergents. Abrasives, Reagents, Organic solvent, disinfectants & Bleaches. Polishes, floor sealers, Floor strippers, carpet cleaners. Selection, storage of cleaning agents.	8
Module – III Cleaning of Guestrooms/ public areas: Daily cleaning of rooms (occupied, departure, vacant, VIP, under repair etc.), Periodic /spring cleaning/special cleaning, Evening service/second service. Public Area cleaning: Lobby, Restaurant, Bar, Corridor, Banquet Hall, Swimming pool, offices etc.	8
Module – IV Requirement to be a star category hotel: Role of HRACC, FHRAI, Fees and format of application, Criteria for Approval, A and B class city requirements. Norms for Heritage Hotel	8
Module – V Front Office Operations: The guest cycle: Pre-Arrival, Arrival, Occupancy, Departure, Post Departure; Front office systems: Non-Automated, Semi Automated, Fully Automated; Front Office Process, Front office forms, the front desk, Front office equipment, Property Management Systems.	8

Textbooks:

1. Andrews, Sudhir, *Hotel Housekeeping*, Tata McGraw Hill, 2009.
2. Raghubalan, G. *Hotel Housekeeping Operation and Management*, Oxford University press, 2007.
3. Bhatnagar, S.K., *Front Office Management*, Frank Bros. & Co. Ltd., 2013.

Reference books:

1. Schneider, M. *The Professional Housekeeper*, Wiley, 1998

2. Jones, M. *Professional Management of Housekeeping operations*, Wiley, 2007
3. Branson, C, Lennox Margaret. *Hotel, Hostel & Hospital Housekeeping*, Hoooder Education, 1988.
4. Kappa, Margret, Nitschke, Aleta. *Managing House Keeping Operation*, AHILA, 1997.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	2	3	2	1	3	1	1	1	2	3	3	2	3
CO2	3	3	2	3	3	3	2	1	-	2	1	3	3	3	2
CO3	3	3	3	1	2	2	2	-	1	3	2	2	3	3	3
CO4	3	3	3	3	3	3	1	3	2	2	2	1	3	2	3
CO5	3	3	2	1	3	2	1	2	2	3	2	3	3	3	3

Correlation Levels 1,2 or 3 as defined below:

- 1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini projects/Projects	CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25112
Course title: Application of Computers in Hospitality
Pre-requisite(s) NIL
Co-requisite(s): Application of Computers in Hospitality Lab
Credits: 3 L:3 T: P:
Class schedule per week: 03
Class: BHM
Semester/Level: Second /One
Branch: BHM
Name of Teacher: Nishikant Kumar

Course Objectives

This course envisions to impart to students to:

1.	Understand the working of computer and its various functions.
2.	Explain the working of MS Office.
3.	Understand the meaning of Internet and its applications.
4.	Apprised with the significance of social media applications and Hospitality.
5.	Understand the trend of emerging technologies in Hospitality Industry.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Understand the basic function of computer parts.
CO2	Demonstrate the working in MS Office (Word Processor, Excel, Power Point etc)
CO3	Understand the uses of Internet and its applications in Hotel and other hospitality industry.
CO4	Utilize the technologies used for social media applications.
CO5	Explore emerging trends like AI, IoT, and automation in hospitality, analyze data for decision-making in hospitality businesses

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to Computers Knowing computer: What is Computer, Basic Applications of Computer; Components of Computer System, Central Processing Unit (CPU), VDU, Keyboard and Mouse, Other input/output Devices, generation of computers, programming languages, Computer Memory, Concepts of Hardware and Software; Concept of Computing, Data and Information.	8
Module 2 Understanding Word Processing, Spreadsheet, Power Point Word Processing Basics; Opening and Closing of documents; Text creation and Manipulation; Formatting of text; Customizing the Word Application, Document Views, Table handling; Spell check, language setting and thesaurus; Printing of word document, Mail merge. Basics of Spreadsheet; Manipulation of cells; Workbook, Worksheet, Formatting in excel, Advanced formatting in Excel, Printing worksheets, Formulas and Functions; Editing of Spread Sheet, graph, switch between worksheets. Basics of presentation software; Creating Presentation; Preparation and Presentation of Slides; Slide Show; Taking printouts of presentation / handouts. Using Master slide and various theme. Functions of mouse over and mouse click. Inserting various media – Image, video, audio. Insert and modify table and chart. Insert and edit animation and slide transition.	10
Module 3 Introduction to Internet, WWW and Web Browsers Basic of Computer networks; LAN, WAN; Concept of Internet; Applications of Internet; connecting to internet; What is ISP; Knowing the Internet; World Wide Web; Web Browsing software, Search Engines; Understanding URL; Domain name; IP Address; Using e-governance website, e mail, introduction to e-Commerce.	8
Module 4 Introduction to Social Media Its role in Hospitality Promotion, Face book–Creating Pages and Profiles, Merits/Demerits of social media, LinkedIn, Instagram, Twitter and Other Social Media Applications. The role of social media in digital marketing, Advantages and disadvantages of social media in hospitality industry, Ethics in social media.	6
Module 5 Emerging Trends in Hospitality Industry Artificial Intelligence (AI) and chatbots	8

Internet of Things (IoT) in Smart Hotels
Virtual Reality (VR) and Augmented Reality (AR) for guest experiences, Online Review System and its impact. Benefits of AI and ML applications in Hospitality Industry.

Textbooks:

1. Jaiswal, S, *Fundamental of Information Technology*, Galgotia Publications Pvt. Ltd., 1999.
2. Seal, Pratim Partho, *Computers in Hotel*, Oxford Publication, 2013.
3. Jain, Satish, Geetha, M, *MS Office 2010 Training Guide*, BPB Publication, 2010.

Reference books:

1. Kumar, Bittu, *Microsoft Office 2010*, V&S Publisher, 2013.
2. Hospitality Information Systems and E-Commerce" by David L. Kasavana & John J. Cahill

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Second Quiz	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	1	3	1	3	1	1	3			2	1	2	2
CO2	1	1	3	2	2	3	1	1	2	1	1	3	2	2	1
CO3	1	1	3	2	2	3	1	1	2	1	1	3	2	2	1
CO4	1	1	3	2	2	3	1	1	2	1	1	3	3	2	1
CO5	2	2	3	2	2	3	1	1	2	1	1	3	2	1	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: CE24101

Course title: ENVIRONMENTAL SCIENCE Pre-requisite(s): NA

Co- requisite(s): NA

**Credits: L:2 T:0 P:0 Class schedule per
week: 02 Class: B.Tech**

Semester / Level: 03/01 Branch: All

Name of Teacher:

Course Objectives

This course enables the students:

1	To develop basic knowledge of ecological principles and their applications in environment. (K ₁ ,K ₂)
2	To identify the structure and composition of the spheres of the earth, the only planet sustaining life. (K ₁ ,K ₂)
3	To analyse, how the environment is getting contaminated and probable control mechanisms for them. (K ₁ ,K ₂)
4	To generate awareness and become a sensitive citizen towards the changing environment. (K ₁ ,K ₂)

Course Outcomes

After the completion of this course, students will be:

1	Able to explain the structure and function of ecosystems and their importance in the holistic environment. (K ₁ ,K ₂)
2	Able to identify the sources, causes, impacts and control of air pollution. (K ₁ ,K ₂)
3	Able to distinguish the various types of water pollution happening in the environment and understand about their effects and potential control mechanisms. (K ₁ ,K ₂)
4	Able to judge the importance of soil, causes of contamination and need of solid waste management. (K ₁ ,K ₂)
5	Able to predict the sources of radiation hazards and pros and cons of noise pollution. (K ₁ ,K ₂)

SYLLABUS

Module 1. Ecosystem and Environment

Concepts of Ecology and Environmental science, ecosystem: structure, function and services, Biogeochemical cycles, energy and nutrient flow, ecosystem management, fate of environmental pollutants, environmental status and reports on climate change.

Module 2: Air Pollution

Structure and composition of unpolluted atmosphere, classification of air pollution sources, types of air pollutants, effects of air pollution, monitoring of air pollution, control methods and equipment for air pollution control, vehicular emissions and control, indoor air pollution, air pollution episodes and case studies.

Module 3: Water Pollution

Water Resource; Water Pollution: types and Sources of Pollutants; effects of water pollution; Water quality monitoring, various water quality indices, water and wastewater treatment: primary, secondary and tertiary treatment, advanced treatments (nitrate and phosphate removal); Sludge treatment and disposal.

Module 4: Soil Pollution and Solid Waste Management

Lithosphere – composition, soil properties, soil pollution, ecological & health effects, Municipal solid waste management – classification of solid wastes, MSW characteristics, collection, storage, transport and disposal methods, sanitary landfills, technologies for processing of MSW: incineration, composting, pyrolysis.

Module 5: Noise pollution & Radioactive pollution

Noise pollution: introduction, sources: Point, line and area sources; outdoor and indoor noise propagation, Effects of noise on health, criteria noise standards and limit values, Noise measurement techniques and analysis, prevention of noise pollution; Radioactive pollution: introduction, sources, classification, health and safety aspects, Hazards associated with nuclear reactors and disposal of spent fuel rods-safe guards from exposure to radiations, international regulation, Management of radioactive wastes.

Textbooks

1. A, K. De. (3rd Ed). 2008. Environmental Chemistry. New Age Publications India Ltd.
2. R. Rajagopalan. 2016. Environmental Studies: From Crisis to Future by, 3rd edition, Oxford University Press.
3. Eugene P. Odum. 1971. Fundamentals of Ecology (3rd ed.) -. WB Saunders Company, Philadelphia.
4. C. N. Sawyer, P. L. McCarty and G. F. Parkin. 2002. Chemistry for Environmental Engineering and Science. John Henry Press.
5. S.C. Santra. 2011. Environmental Science. New Central Book Agency.

Reference Books

1. D.W. Conell. Basic Concepts of Environmental Chemistry, CRC Press.
2. Peavy, H.S, Rowe, D.R, Tchobanoglous, G. Environmental Engineering, Mc-Graw - Hill International

3. G.M. Masters & Wendell Ela. 1991. Introduction to Environmental Engineering and Science, PHI Publishers.

Gaps in the syllabus (to meet Industry/Profession requirements) POs met through Gaps in the Syllabus

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design

Course Delivery methods	
Lecture by use of boards/LCD projectors/OHP projectors	✓
Tutorials/Assignments	✓
Seminars	✓
Mini projects/Projects	✓
Laboratory experiments/teaching aids	✓
Industrial/guest lectures	✓
Industrial visits/in-plant training	✓
Self- learning such as use of NPTEL materials and internets	✓
Simulation	✓

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Mid Sem Examination Marks	25
End Sem Examination Marks	50
Quiz (s) (1 & 2)	10+10
Teacher's assessment	5

Assessment Components	CO1	CO2	CO3	CO4	CO5
Mid sem exam	✓	✓	✓		
End Sem Examination Marks	✓	✓	✓	✓	✓
Quiz 1	✓	✓			
Quiz 2			✓	✓	✓
Assignment	✓	✓	✓	✓	✓

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping of Course Outcomes onto Graduate Attributes

Course Outcome #	Program outcomes												Program specific outcomes		
	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3
1		1	3			1	3						1		
2		1	3			1	3						1		
3		1	3			1	3						1		
4		1	3			1	3						1		
5		1	3			1	3						1		

Mapping Between COs and Course Delivery (CD) methods			
CD	Course Delivery methods	Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD2, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25113
Course title: Food Production Practical – II

Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 1.5 L: T: P: 3

Class schedule per week: 03
Class: BHM
Semester / Level: Second/ One
Branch: BHM
Name of Teacher: Pratima Ekka

Course Objectives

This course envisions to impart to students to:

1.	Knowledge of dairy products in culinary preparations for the catering industry
2.	Identify different sauces, stock, and soup preparations
3.	Develop the knowledge of different types of meat and its preparations.
4.	Interpret the various Fish & Shellfish. And its preparations
5.	Develop basic knowledge of breads making

Course Outcomes

After the completion of this course, students will be able to:

CO1	Understand the significance of key dairy products in culinary preparations for the catering industry
CO2	Describe different sauces, stock, and soup preparations
CO3	Explain about different types of meat and its preparations.
CO4	Identify cuts of Fish & Shellfish. And its preparations.
CO5	Develop basic knowledge of breads, cakes and pancake making.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Demonstration of milk derivatives such as buttermilk, butter, cream, curd, yogurt, ice cream, milk pudding, and milkshakes. Vegetable Puff, Cheese Straws, Palmier. (BAKERY)	6
Module 2 Demonstration & Practical of Stocks. Choux Pastry, Genoise Sponge (BAKERY) Demonstration of Mother Sauces & Emulsified Mother Sauces. Baked Spinach Quiche, Diplomat Pudding (BAKERY)	12
Module 3 Demonstration and Practical - Types of Soups Demonstration and Practical Bakery- Types of cakes (BAKERY) Demonstration and Practical of International Soups Marble Cake (BAKERY)	12
Module 4 Demonstration of Cuts of Poultry Danish Pastry (Croissants, Fruit Danish, Pinwheel) (BAKERY) Demonstration of Cuts of Fish & Shellfish. And its preparations Instruct on the preparation of simple cookies, types, uses, and common faults. (BAKERY) Demonstration of Cut of meat (Mutton) And its preparations, Croissants, Apple Pie, (BAKERY)	18
Module 5 Basic Indian: Rice Preparation Boiled Rice – Draining Method, Boiled Rice – Absorption method, Pulao /Tehri, Biryani Khichdi, Nankhatai, Melting moments. (BAKERY) Preparation of Farinaceous. Fresh/Dry Pasta. Introduce cakes and pancakes. (BAKERY)	12

Textbooks:

1. D.D., Mary, *Cooking Essentials for the New Professional Chef*. John Wiley and Sons, 1997.
2. Parvinder S Bali, *Food Production Operations*. Oxford University Press, 2014.
3. Philip E. Thangam, *Modern Cookery (Vol- I)*, Orient Longman, 1946.
4. R. Kinton & V. Cessarani, *Foundation Practical Cookery*, Hodder Education, 2009.

5. R.J. Kauffman & H. Cracknell, *Practical Professional Cookery*, Thomson, 1999.

Reference Books:

1. The Theory of Catering- FOSKETT, D., and CESARANI, V ,Book Power Hodder
2. Theory of Cookery ARORA, K Frank Bros. & Co. Ltd.
3. Professional Cooking. GISSLEN, W., John Wiley & Sons INC.
4. La Rousse Gastronomique MONTAGNE, P. Hamlyn Octopus publishing group
5. Modern Cookery I & II PHILIP, E Orient Longman 2009
6. Classical cooking the modern way. Pauli, E. (1989a).
7. The book of ingredients. Van Nostrand Reinhold. Gringson, J. (1967)

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment

1. Student Feedback on Faculty
2. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	3	1	3		2		2	1	2	3	3	2
CO2	3	3	3	3	3	3		3	3	2	1	3	3	3	1
CO3	3	3	3	2	2	3		2		2	1	3	3	3	1
CO4	3	3	3	3	3	3	2	3	3	2	1	3	3	3	1
CO5	3	3	3	3	2	3		2	3	2	1	3	3	3	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8, CD1
CD2	Tutorials/Assignments	CO2	CD5, CD8, CD1
CD3	Seminars	CO3	CD5, CD8, CD1
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25114
Course title: Food and Beverage service Foundation Practical - II
Pre-requisite(s): Nil
Co- requisite(s): NIL
Credits: 1.5 L: T: P:3
Class schedule per week: 3
Class: BHM
Semester / Level: Second/One
Branch: BHM
Name of Teacher: Amit Saran

Course Objectives

This course enables the students:

A.	Know about room service and menu planning
B.	Know types of menus and objective of menu planning
C	Learn restaurant operations and French classical menu
D	Understand bill making process & control system
E	Understand service of Tea/Coffee & other non-alcoholic beverage

Course Outcomes

After the completion of this course, students will be able to:

CO1	Setting up room service trolley
CO2	Design menu
CO3	Demonstrate practical ability to carry out restaurant activities
CO4	Use of form and format of KOT & bill making
CO5	Demonstrate practical ability for the preparation & service of tea/coffee tray

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Topic to be covered: <ul style="list-style-type: none">• Receiving guests call/Telephone etiquette• Room service trolley arrangement	3
Module 2 Topic to be covered: <ul style="list-style-type: none">• Ala carte and Table d'hote cover• Breakfast table setup (English, American, Continental, Indian)	3
Module 3 Topic to be covered: <ul style="list-style-type: none">• Sequence of service• Cover and accompaniments of each course	3
Module 4 Topic to be covered: <ul style="list-style-type: none">• Form/Format of KOT• Making of guest bill	3
Module 5 Topic to be covered: <ul style="list-style-type: none">• Tea/Coffee preparation and service• Other non-alcoholic beverage (Lassie, Milkshake, Squash, bourn vita, Juices etc.)	3

Textbooks:

1. Food & Beverage service: Lillicrap & Cousins, ELBS
2. Food & Beverage service: Sudhir Andrews
3. Modern Restaurant service: Jhon Fuller, Hutchinson
4. Introduction F&B service: Brown, Heepner & Deegan

Reference books:

1. Food & Beverage training manual: Sudhir Andrews, Tata McGraw Hill
2. Food & Service management: Brian Varghese
3. Food & beverage management: Bernard Davis

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	-	2	3	-	3	-	2	3	3	-	3	-
2	2	-	3	-	3	-	-	2	2	-	2	-
3	2	-	-	-	3	-	3	1	1	-	1	3
4	2	-	3	-	3	-	2	2	2	-	2	3
5	2	2	3	-	3	-	2	3	3	-	3	3

Mapping Between COs and Course Delivery (CD) methods

CD	Course Delivery methods		Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1,CO2,CO3,CO4,CO5	CD1
CD2	Tutorials/Assignments		CO2,CO3,CO4	CD2
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets		CO1,CO2,CO3,CO4,CO5	CD8
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25115
Course title: Room Division Foundation Practical-II
Pre-requisite(s): NIL
Co- requisite(s): Room Division Foundation II
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Second/ One
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	Understand and use different types of cleaning equipment.
2.	Examine and use different types of cleaning agents.
3.	Plan the process of bathroom and guestroom cleaning.
4.	Develop skill for public area cleaning.
5.	Demonstrate how to deal with different situations in day-to-day hotel operations.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify and use different types of cleaning equipment.
CO2	Apply different types of cleaning agents in the cleaning process.
CO3	Explain the guestroom cleaning.
CO4	Explain the process of public area cleaning.
CO5	Demonstrate the different situation handling processes in hotel operations.

SYLLABUS

MODULE	(NO.OF PRACTICAL HOURS)
Module 1 Introduction to Manual & Mechanical equipment Familiarization with Manual & Mechanical cleaning equipment. Identification of cleaning equipment. Functions of cleaning equipment.	6
Module 2 Introduction to Cleaning agents Identification of cleaning agents. Application of different types of cleaning agents.	6
Module 3 Cleaning guestrooms Guestrooms cleaning. Bathroom cleaning.	6
Module 4 Public area cleaning Public area cleaning (lobby, lounge, elevator, restaurants, coffee shops, staircase, corridor, banquet hall, swimming pool etc.)	6
Module 5 Dealing with Special situation Entering a guest room, reporting maintenance, Lost and found, DND, service refused, scanty baggage, damage in the room, handling guest requests etc.	6

Textbooks:

1. Andrews, Sudhir, *Hotel Housekeeping*, Tata McGraw Hill, 2009.
2. Raghubalan, G. *Hotel Housekeeping Operation and Management*, Oxford University press, 2007.

Reference books:

1. Schneider, M. *The Professional Housekeeper*, Wiley, 1998.
2. Jones, M. *Professional Management of Housekeeping operations*, Wiley, 2007.
3. Branson, C, Lennox Margaret. *Hotel, Hostel & Hospital Housekeeping*, Hooder Education, 1988.
4. Kappa, Margret, Nitschke, Aleta. *Managing House Keeping Operation*, AHLA, 1997.
5. Allen, David. *Accommodation & Cleaning Services*, Vol I & Vol II, Hutchinson, 1983.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	2	1	2	1	3	2	2	2	2	3	3	3	3
CO2	3	3	3		2	3	2	2		3	1	3	3	3	3
CO3	3	3	3	2	2	2	2	2	3	2	1	3	3	3	3
CO4	3	3	3		3	1	1	1	2		2	3	3	3	2
CO5	3	3	3	2	3	3	1	2	2	3	3	3	3	3	2

Correlation Levels 1,2 or 3 as defined below:

- 1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD5, CD8
CD2	Tutorials/Assignments	CO2	CD5, CD8
CD3	Seminars	CO3	CD5, CD8
CD4	Mini projects/Projects	CO4	CD5, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD5, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25116
Course title: Application of Computer in Hospitality Lab
Pre-requisite(s) NIL
Co-requisite(s): Application of Computer in Hospitality
Credits: 1.5 L: 0 T: 0 P:3
Class schedule per week: 03
Class: BHM
Semester/Level: Second/ One
Branch: BHM
Name of Teacher: Nishikant Kumar

Course Objectives

This course envisions to impart to students to:

1.	Introduce students to fundamental computer operations and software used in the hospitality industry.
2.	Enhance skills in Microsoft Office (Word, Excel, and PowerPoint) for hospitality documentation and reporting.
3.	Familiarize students with internet applications, email etiquette, and cybersecurity best practices in hospitality.
4.	To develop proficiency in using hospitality-specific applications like handling the various of social media tools & applications in context with Hospitality Industry.
5.	Familiarize students to the trend of emerging technologies in Hospitality Industry.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Understand the basic function of computer parts.
CO2	Demonstrate the working in MS Office (Word Processor, Excel, Power Point etc)
CO3	Understand the uses of Internet and its applications in hotel and other hospitality industry.
CO4	Demonstrate the technologies used for social media applications.
CO5	Explore emerging trends like AI, IoT, and automation in hospitality, analyse data for decision-making in hospitality businesses

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to Computer Introduction to various Hardware of computer Introduction to various software of computers.	6
Module 2 Understanding Word Processing, Spreadsheet, Power Point Introduction to Word Processing and its basic feature, Advance feature of Word Processing, Introduction to Spreadsheet and its basic feature, Advance feature of Spreadsheet, Formulas used in Spreadsheet, Introduction to Power point and its basic feature, Advance feature of Power point, Preparation of Professional Power points.	6
Module 3 Introduction to Internet, WWW and Web Browsers Introduction to Internet and its basic feature E – mail, Website: E Commerce sites, Introduction to World Wide Web, Web Browser, URL, Search Engines, Email.	6
Module 4 Introduction to Social Media Role in Hospitality Promotion, Facebook – Creating Pages and Profiles, Merits/Demerits of social media, Linked In, Twitter and Other Social Media Applications.	6
Module 5 Emerging Trends in Hospitality Industry Uses of artificial intelligence (AI) and chatbots, Cybersecurity & Data Privacy in Hospitality, Protecting guest data, Internet of Things (IoT) in Smart Hotels Virtual Reality (VR) and Augmented Reality (AR) for guest experiences, Online Review System and its impact. Preventing cyber threats in hospitality IT systems.	6

Textbooks:

1. Jaiswal, S, *Fundamental of Information Technology*, Galgotia Publications Pvt. Ltd., 1999.
2. Seal, Pratim Partho, *Computers in Hotel*, Oxford Publication, 2013.
3. Jain, Satish, Geetha, M, *MS Office 2010 Training Guide*, BPB Publication, 2010.

Reference books:

1. Kumar, Bittu, *Microsoft Office 2010*, V&S Publisher, 2013.
2. Hospitality Information Systems and E-Commerce" by David L. Kasavana & John J. Cahill

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	1	3	1	3	1	1	3			2	1	2	2
CO2	1	1	3	2	2	3	1	1	2	1	1	3	2	2	1
CO3	1	1	3	2	2	3	1	1	2	1	1	3	2	2	1
CO4	1	1	3	2	2	3	1	1	2	1	1	3	3	2	1
CO5	2	2	3	2	2	3	1	1	2	1	1	3	2	1	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8
CD2	Tutorials/Assignments	CO2	CD5, CD8

CD3	Seminars	CO3	CD5, CD8
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

2nd Year Syllabus and Course Information Sheet

COURSE INFORMATION SHEET

Course code: BH25201
Course title: Food Production Operation
Pre-requisite(s): NIL
Co- requisite(s): Food Production Operation Practical
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Third/Two
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	To introduce to the cultural, historical, and technical foundations of Indian cooking and its evolving food philosophies.
2.	To familiarize with the identification, usage, and blending techniques of spices, herbs, masalas, and pastes in Indian cuisine.
3.	To impart knowledge about key cooking agents and the foundational gravies that form the base of Indian curries across regions.
4.	To explore the diversity of Indian regional cuisines, highlighting their unique ingredients, techniques, and cultural significance.
5.	To introduce to traditional Indian cooking styles and techniques, including methods of rice, tandoor, dum cooking, and sweet preparations.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Recognize and apply traditional Indian cooking techniques, tools, and regional influences in a contemporary culinary context.
CO2	Identify, store, and apply various Indian spices, masalas, and pastes effectively in culinary preparations.
CO3	Identify essential cooking agents and prepare a variety of basic and regional Indian gravies.
CO4	Identify and differentiate between major regional Indian cuisines and prepare representative dishes.
CO5	Demonstrate various Indian cooking styles and prepare traditional dishes using appropriate techniques.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Introduction to Indian Cooking Introduction, Philosophy of Indian Food, Influence of the Invaders and Travelers on Indian Cuisine, Regional and Religious Influence on Indian Cuisine, Equipment Used in Indian Cuisine, Techniques Employed in Indian Cooking, Concepts of Slow Food and Organic Food	6
Module 2: Condiments, Herbs and Spices, Masalas and Pastes Used in Indian Cuisine Introduction, Spices Used in Indian Cooking, Various Ways of Using the Spices, Storage and Usage Tips for Spices, Blending of Spices and Concept of Masalas, Concept of Dry and Wet Masalas, Pastes Used in Indian Cooking	6
Module 3: Understanding Commodities and Basic Indian Gravies Introduction, Souring Agents Used in Indian Cooking, Coloring Agents Used in Indian Cooking, Thickening Agents Used in Indian Cooking, Tenderizing Agents Used in Indian Cooking, Flavoring and Aromatic Agents Used in Indian Cooking, Spicing Agents Used in Indian Cooking, Gravies and Curries, Regional Gravies, Preparation of Gravy	9
Module 4: Regional Cuisines of India Introduction, Andhra Pradesh-Hyderabadi, Awadh, Bengal, Goa, Kashmir, Kerala, Maharashtra, Parsi, Punjab, Rajasthan, Tamil Nadu	11
Module 5: Indian Cooking Styles Introduction, Dum Cooking, Tandoor Cooking, Rice Cooking, Introduction to Indian Sweets, Traditional Home-style Cooking	8

Textbooks:

1. Bali, P.S. *Food Production Operations*, Oxford University Press, 2014
2. Bali, P.S. *Quantity Food Production Operations and Indian Cuisine*, Oxford University Press, 2014

Reference Books:

1. Dubey, K.G. *The Indian Cuisine*. PHI, 2011.
2. Philip, T.E. *Modern Cookery*, Volume I & II, Orient BlackSwan, 2011
3. Reshii, M.H. *The Flavour of Spice*. Hachette India, 2017

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	2	1	3	1	1	2	1	1	1	2			
CO2	3	2	1	1	3	1	1	2	1	1	1	2			
CO3	3	3	2	2	3	1	1	2	1	1	1	2			
CO4	3	2	2	1	2	2	1	3	1	2	1	2			
CO5	3	1	3	1	3	1	2	2	2	2	1	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD4, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25202
Course title: Food and Beverage Service Operation
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 4 L:3 T: 1 P: 0

Class schedule per week: 04
Class: BHM
Semester / Level: Third / Two
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Introduce students to the history, definition, and classification of alcoholic beverages.
2.	Impart knowledge on the production, storage, and service of beer and other fermented beverages.
3.	Familiarize students with the characteristics and service procedures of still, sparkling, fortified, and aromatized wines.
4.	Develop a comprehensive understanding of the global wine industry with a focus on European wine-producing countries.
5.	Equip students with practical knowledge about beverage handling, service standards, and responsible consumption practices.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify and categorize different types of alcoholic beverages.
CO2	Describe the production processes, classifications, service techniques, and storage methods for beer, cider, perry, and sake.
CO3	Explain the methods of wine production, differentiate among wine types, and outline appropriate service and storage procedures.
CO4	Analyze the major wine-producing regions of Europe and distinguish their characteristic wine types and styles.
CO5	Demonstrate foundational knowledge of alcoholic beverages in practical service and hospitality contexts.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Introduction to Alcoholic Beverages and Beer Alcoholic Beverage: Introduction & definition, Classification, A brief description of each type of alcoholic beverage. Beer: Introduction & definition, Types of beer, Production of each type, Storage, Service of Bottled, canned & draught beer.	8
Module 2: Other Fermented & Brewed Beverages Sake: Introduction; Production; Types; Storage & Service. Cider: Introduction; Production; Types; Storage & Service. Perry: Introduction; Production; Types; Storage & Service.	8
Module 3: Still & Sparkling Wines Still & Sparkling Wine: Introduction; Definition; Classification; Production; Storage; Service and Brand names of each category.	8
Module 4: Fortified & Aromatized Wines Fortified Wine: Port wine, Sherry, Madeira, Marsala- Introduction; Definition; Classification; Production; Storage; Service and Brand names of each category. Aromatized wine: Introduction; Definition; Classification; Production; Storage; Service and Brand names of each category.	8
Module 5: Wines of Europe Wine of France: Introduction, The various categories, Principal wine regions of France. Wine of Germany: Introduction, The various categories, Principal wine regions of Germany. Wine of Italy: Introduction, The various categories, Principal wine regions of Italy.	8

Textbooks:

1. Singaravelavan R. Food & Beverage Services, Oxford Publications, 2011.
2. Jana A & Srivastava P. United Colours of Alcohol, TRIDENT, 2015.

Reference Books:

1. Albert W.A. Schmid & Lalogan John P. The Beverage Manager's Guide to Wines, Beers and Spirits, Pearson. 2011.
2. Sudhir A. Food & Beverage Service: A Training Manual, McGraw Hill Education. Second Edition.
3. Christian C. The Complete Encyclopaedia of Wine, Rebo Publishers. 2004-Second Edition

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design –

N/A Course Outcome (CO) Attainment Assessment tools &

Evaluation procedure Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	-	-	2	-	3	1	1	3	-	2	2	2			
CO2	-	-	2	-	3	1	1	3	-	2	3	2			
CO3	-	-	2	-	3	1	2	3	1	2	3	2			
CO4	-	-	2	-	3	1	2	3	1	3	3	2			
CO5	-	-	2	-	3	1	1	3	1	3	3	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25203
Course title: ACCOMMODATION OPERATION
Pre-requisite(s): Nil
Co- requisite(s): Accommodation Operation Practical 1
Credits: L:3 T:1 P:0
Class schedule per week: 3
Class: BHM
Semester / Level: Third/ Two
Branch: BHM
Name of Teacher: SANJIV KUMAR SRIVASTAVA

Course Objectives

This course enables the students:

A.	To understand the principles of cleaning.
B.	To acknowledge care and cleaning of different surfaces.
C.	To learn about various routine systems and records maintained in the department.
D.	To develop knowledge about Laundry Operations.
E.	To understand the operational activities of linen and uniform rooms.

Course Outcomes

After the completion of this course, students will be able to:

1.	Explain the basic types and methods of cleaning.
2.	Describe care and cleaning of various surfaces.
3.	Identify routine systems and various records used in operation.
4.	Explain laundry operations.
5	Describe operational activities of linen and uniform rooms.

Syllabus

MODULE	(NO. OF LECTURE HRS.)
Module 1 FLOWER ARRANGEMENT Introduction: Importance & use in hotels, Guidelines for flower arrangement, Basic ingredients: mechanics, equipment, containers, plant material, bases. Care and conditioning of flowers, Principles of flower arrangement, Elements of flower arrangement, Types of flower arrangement based on angle, space, type of plant material, on the effect: Formal, Semi formal, Informal, Modern/abstract/free style.	8
Module 2 PEST CONTROL Importance, definition of pest, Types of Pests, Pest control goals. Common pests and their control, integrated pest management, Methods of pest control: natural, applied, biological, Cultural, Mechanical/physical, Sanitation, Chemical control, Avoiding the harmful effects of Pest control, Waste disposal.	8
Module 3 ROUTINE SYSTEMS AND RECORDS OF HOUSE KEEPING DEPARTMENT Reporting Staff, scheduling, Room Occupancy Report, Guest Room Inspection, Entering Checklists, Floor Register, Work Orders, Log Sheet, Lost and Found Register, Maid's Cart, Housekeeper's Report, Handover Records, Guest's Special Requests Register, Record of Special Cleaning, Call Register, VIP Lists, Leave application procedure and Gate Pass procedure.	8
Module 4 LAUNDRY OPERATION Commercial and On-site Laundry, Flow process of OPL, Planning & Layout of OPL, Stages in the Wash Cycle, Laundry Equipment and Machines, Laundry Agents, Dry Cleaning, Guest Laundry/Valet service, Stain removal.	8
Module 5 LINEN & UNIFORMS Activities of the Linen Room, Layout and equipment in the Linen Room, Selection criteria for various linen items & fabrics, Calculation of Linen requirements, Linen control-procedures and records, Stocktaking-procedures and records, discarded linen, uniform: Advantages of providing uniforms to staff, Issuing and exchange of uniforms; type of uniforms, Selection and designing of uniforms, calculating Uniform requirement.	8

Textbooks:

1. S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGraw Hill, 2008.
2. G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd ed, New Delhi: Oxford university press, 2014.
3. S.K. Kaushal and S.N. Kaushal, *Accommodation Operation and Management*. 1st ed, New Delhi: Frank Bros. & Co, 2006

Reference books:

1. M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.
2. Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
3. Joan C. Branson and M. Lennox, *Hotel, Hostel & Hospital Housekeeping*. 5th ed, London: Hodder Arnold, 1988.
4. M. Kappa and A. Nitschke, *Managing House Keeping Operation*. 3rd ed, Lansing Mich: American Hotel and Lodging, Educational Institute, 2008

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure**Direct Assessment**

<u>Assessment Tool</u>	<u>% Contribution during CO Assessment</u>
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	1	2	1	3	3	3	3	1	3	3	2			
CO2	3	2	2	2	2	1	3	1	3	2	3	2			
CO3	3	2	2	2	2	3	1	3	2	3	3	2			
CO4	3	2	2	2	3	2	3	2	1	2	3	2			
CO5	3	1	2	2	3	2	3	1	2	2	2	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25204
Course title: Front Office Operation
Pre-requisite(s): NIL
Co- requisite(s): Front Office Operation Practical
Credits: 3 L: 3 T:0 P:0

Class schedule per week:3

Class: BHM

Semester/Level: Third/Two

Branch: BHM

Name of Teacher: Praveen Srivastava

Course Objectives

This course envisions to impart to students to:

1.	Explain guest services and basic front office functions and responsibilities that allow staff to meet guest standards.
2.	Understand how a front office department in a small, medium and large hotel may be organized along with various meal plans being followed in these hotels.
3.	Examine the role of Front office department in guest life cycle
4.	Understand why an efficient communication system is needed to operate within the front office.
5.	Explain various types of meal plans.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Understand the origin and the nature of Hospitality Industry.
CO2	Explain the operation of Front Office department in a hotel.
CO3	Explain the role of Front office department in the guest life cycle.
CO4	Design different types of meal plan and explain different types of communication.
CO5	Identify different types of meal plan

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 The Hospitality Industry Introduction, Origin of Hospitality Industry, Nature of Hospitality Industry. History and development of Hotel Industry, Defining the term hotel, Types of hotels, Target Market, Classifying hotels, levels of service, Ownership and affiliation	8
Module 2 Front Office Department Front office operations, staffing, scheduling, work shifts, job specifications & job descriptions of Front office personnel, The Front desk: Functional Organization, Telecommunication.	8
Module 3 Front Office Operations The guest cycle: Pre-Arrival, Arrival, Occupancy, Departure, Post Departure; Front office systems: Non-Automated, Semi Automated, Fully Automated; Front Office Process, Front office forms, the front desk, Front office equipment, Property Management Systems.	8
Module 4 Communication and Meal Plans Communication, verbal communication, non- verbal communication, written communication, general office practice, additional tasks.	8
Module 5 Meal Plan Meal plans - Types, needs and use of such plans, Types of guests - FIT, Business travelers, GIT, Special Interest Tours, domestic, foreign.	8

Textbooks:

1. Kasavana & Brooks, *Managing Front Office Operations*, AHL&A, 2001
2. S.K.Bhatnagar, *Front Office Management*, Frank Bros. & Co. , 2006

Reference Books:

1. Colin Dix & Chirs Baird, *Front office operations*, Pearson, 2006.
2. James Bardi, *Hotel Front office management*, John Wiley & Sons, 2011.
3. Sudhir Andrews, *Front Office: A Training Manual*, Tata McGraw Hill, 2011
4. Raymond S Schmidgall, *Hospitality Industry Managerial accounting*, AHLA, 2006
5. Michael Kasavana and Cahell, *Managing computers in hospitality industry*, AHLA, 1996

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	1		1		1	1	2	3	2	3	2	1
CO2	3	3	3	3	3	3		1	3	2	1	3	3	2	3
CO3	3	3	3	2		2		2	3	3	3	2	3	2	3
CO4	3	3	3	3	3	3	2	3	2	3	2	3	3	2	2
CO5	3	3	1	2	3	2		1	2	3	3	2	3	2	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: MN25102

Course title: Human Values & Professional Ethics

Nature of course: Lecture

Pre-requisite(s): NIL

Co- requisite(s): NIL

Credits: 2 L:2 T:0 P:0

Class schedule per week: 02

Class: BBA

Semester / Level: V 1

Branch: Management (BBA)

Name of Teacher:

COURSE OBJECTIVE:

This course enables the students:

A	Create awareness about the concepts of Human Values and its types, Morality, Ethics and virtues, Value Education
B	Harmony as a concept, Harmony the self and the body, Concept of coexistence of the self and the body,
C	Harmony of Family and Nature. The basics for respect and the issues it encompasses.
D	Concept of Professional ethics and the issues related to it.
E	Global issues in Professional Ethics. Business Ethics concept, Concept of Corporate Governance, Ethical issues in different spheres of Business and commerce.

COURSE OUTCOME:

After completion of this course the students will be able to:

I	Understand the concepts of Human Values, Morality, Ethics and Virtues. Also should be aware of the concept and process of Value education.
2	To explain the concept of Harmony and its relationship with self and the body, and also, the concept of co-existence.
3	Understand the concepts of Harmony of Family and Nature. The basics for respect and the issues it encompasses.
4	To explain the concept of Professional ethics and the issues related to it.
5	Understand the Global issues in Professional Ethics. Business Ethics concept, Concept of Corporate Governance, Ethical issues in different spheres of Business and commerce.

Syllabus:

Module-1 (11 lectures)

Meaning of Human Values, Types of Human Values, Meaning of Morality, Human Values and Ethics, Concept of Civic Virtue- Respect for others, living peacefully, Caring, sharing, honesty, courage, cooperation, commitment, empathy, spirituality.

Value Education-Concept, Need for value education, The content and process of value education, Self exploration as a way of Value education, Happiness and Prosperity as parts of value education.

Module-2 (? lectures)

Harmony in the Human being, Human being is more than just the body, Harmony of the self with the body, understanding myself as Coexistence of the self and the body, Understanding needs of the self and the needs of the body.

Module -3 (8 lectures)

Harmony in the family and society, Harmony in the Nature, Family as a basic unit of Human Interaction and values in relationships, The basics for respect and today's crisis: Affection, Care, Guidance, Reverence, Glory, Gratitude, and love.

Module-4 (8 lectures)

Concept of Professional Ethics, Value based life and Profession, Professional Ethics and right understanding, competence in professional ethics, Issues in Professional ethics- the current scenario in the society.

Module-5 (5 lectures)

Global issues in Professional Ethics with examples, Business Ethics concept, Concept of Corporate Governance, Ethics in Manufacturing and Marketing, Media Ethics, Concept of Intellectual Property rights and the role of ethics and values.

Textbooks:

1. A. N. Tripathy, Human Values, New Age International Publishers, 2003
2. Bajpai. B.L, Indian Ethos and Modern Management, New Royal Book Co, Reprinted, 2004

Reference Books:

1. Professional Ethics; R. Subramanian, Oxford University Press, 2015

Gaps in the Syllabus (to meet Industry/Profession requirements) Pos met through Gaps in the Syllabus

Topics beyond syllabus/Advanced topics/Design

Pos met through Topics beyond syllabus/Advanced topics/Design

Course Delivery methods
Lecture by use of boards/LCD projectors
Tutorials/Assignments
Seminars /Group Discussions by the students
Industrial/guest lectures
Self- learning such as uses of NPTEL materials and internets
Case Study

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Second Quiz	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student Feedback on course outcome
2. Student Feedback on Faculty

Mapping Between Cos and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1,CD8
CD2	Tutorials/Assignments	CO2	CD1,CD8and CD9
CD3	Seminars	CO3	CD1,CD2and <i>CDS</i>
CD4	Group Discussions	CO4	CD1,CD5,CD8andCD9
CD5	Case Study	CO5	CD1,CD2and CD9
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as uses of NPTEL Materials and Internet		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25205
Course title: Food Production Operation Practical
Pre-requisite(s): NIL
Co- requisite(s): Food Production Operation
Credits: 1.5 L:0 T: 0 P: 3

Class schedule per week: 03
Class: BHM
Semester / Level: Third/Two
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	To introduce to the rich culinary traditions, techniques, and signature dishes of Awadhi, Kashmiri, and Punjabi cuisines within North Indian cooking.
2.	To familiarize with the diverse flavors, ingredients, and cooking methods of South Indian cuisines from Andhra Pradesh-Hyderabadi, Kerala, and Tamil Nadu.
3.	To explore the culinary traditions, techniques, and key ingredients of Bengali cuisine from East India.
4.	To provide an understanding of the distinctive culinary styles and specialties of Goan, Maharashtrian, Parsi, and Rajasthani cuisines.
5.	To acquaint students with the core techniques of dum cooking, tandoor cooking, and traditional Indian sweet-making.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify, prepare, and present key regional dishes from Awadh, Kashmir, and Punjab with an understanding of their cultural and historical significance.
CO2	Prepare and present authentic South Indian dishes while understanding the regional variations and culinary heritage of each state.
CO3	Prepare and present traditional Bengali dishes with an understanding of their cultural and seasonal significance.
CO4	Demonstrate skills in preparing regional West Indian dishes while appreciating their cultural diversity and traditional cooking practices.
CO5	Proficiently apply dum and tandoor methods and produce authentic Indian sweets with attention to texture, flavor, and presentation.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: North Indian Cooking Awadh, Kashmir, Punjab	9
Module 2: South Indian Cuisine Andhra Pradesh-Hyderabadi, Kerala, Tamil Nadu	9
Module 3: East Indian Cuisine Bengal	3
Module 4: West Indian Cuisines Goa, Maharashtra, Parsi, Rajasthan	12
Module 5: Indian Cooking Styles Dum Cooking, Tandoor Cooking, Indian Sweets	12

Textbooks:

1. Bali, P.S. *Food Production Operations*, Oxford University Press, 2014
2. Bali, P.S. *Quantity Food Production Operations and Indian Cuisine*, Oxford University Press, 2014

Reference Books:

1. Dubey, K.G. *The Indian Cuisine*. PHI, 2011.
2. Philip, T.E. *Modern Cookery*, Volume I & II, Orient BlackSwan, 2011
3. Reshii, M.H. *The Flavour of Spice*. Hachette India, 2017

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz 1	10
Lab Quiz 2	10
Progressive Lab Performance	30
Lab Viva	20
End Semester Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	2	1	1	2	2	3	1	1	1	2			
CO2	3	2	2	1	1	2	2	3	1	1	1	2			
CO3	3	2	2	1	1	2	2	3	1	1	1	2			
CO4	3	2	2	1	1	2	2	3	1	1	1	2			
CO5	3	2	3	2	3	2	2	2	1	1	2	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5
CD2	Tutorials/Assignments	CO2	CD5
CD3	Seminars	CO3	CD5
CD4	Mini Projects/Projects	CO4	CD5
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25206
Course title: Food and Beverage Service Operation Practical
Pre-requisite(s): NIL
Co- requisite(s): Food and Beverage Service Operation
Credits: 1.5 L:0 T: 0 P: 3

Class schedule per week: 03
Class: BHM
Semester / Level: Third/Two
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Learn the skill of taking beverage order.
2.	Learn the skill of serving beer, cider, perry and sake.
3.	Learn the way of interpreting various types of wine bottle's label.
4.	Learn the skill of serving various types of wine.
5.	Learn skill of setting up table as per menu.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Demonstrate ability in taking order for beverages.
CO2	Demonstrate practical ability in the service of beer, cider, perry, sake.
CO3	Demonstrate practical ability in the service of different types of still & fortified wine.
CO4	Demonstrate practical ability in the service of different types of sparkling wine.
CO5	Demonstrate practical ability to set up a table in a professional manner for table d'hôte menu.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module – I Taking an Order for Beverages.	3
Module- II Service of Bottled beer, Canned beer & Draught beer.	6
Module – III Opening technique of wine bottle Still wine, Sparkling wine, Aromatized & fortified wine. Service of Wine White wine, Red wine, Rose wine.	9
Module- IV Service of Sparkling wine & Champagne. Service of Fortified wine and Aromatized wine.	6
Module - V Set up a table with Prepared Menu with wines.	6

Textbooks:

1. Singaravelavan R. *Food & Beverage Services*, Oxford Publications, 2011
2. Jana A & Srivastava P. *United Colours of Alcohol*, TRIDENT, 2015

Reference books:

1. Albert W.A. Schmid & Lalogan John P. *The Beverage Manager's Guide to Wines, Beers and Spirits*, Pearson. 2011
2. Sudhir A. *Food & Beverage Service: A Training Manual*, McGraw Hill Education. Second Edition

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz 1	10
Lab Quiz 2	10
Progressive Lab Performance	30
Lab Viva	20
End Semester Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	2	2	1	3		1	2	2	2	2			
CO2	3	2	2	2	1	2		1		2	1	2			
CO3	3	2	2	2	1	2		1		2	1	2			
CO4	3	2	2	2	1	2		1		2	1	2			
CO5	3	2	2	2	1	1		1		2	2	2			

Correlation Levels 1, 2 or 3 as defined below:

(Medium)

1: Slight (Low)

2: Moderate

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8. CD9
CD2	Tutorials/Assignments	CO2	CD5, CD8
CD3	Seminars	CO3	CD5, CD8
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25207
Course title: Accommodation Operation Practical
Pre-requisite(s): NIL
Co- requisite(s): Accommodation Operation
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Third/ Second
Branch: BHM
Name of Teacher: SANJIV KUMAR SRIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Understand the concept of making flower arrangement.
2.	Learn about different types of pests.
3.	Understand daily routine system and records maintained in the department.
4.	Describe laundry operations.
5.	Develop knowledge about linen and uniform rooms activities and operational process.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Create different styles of flower arrangement.
CO2	Explain different types of Pests and their methods of control.
CO3	Identify various routine systems and records maintained.
CO4	Explain laundry operational activities.
CO5	Plan linen and uniform room activities.

SYLLABUS

MODULE	(NO.OF PRACTICAL HOURS)
Module 1 Flower Arrangement Lab 1. Identification of flower arrangement tools and equipment. Lab 2. Flower arrangement (line, horizontal, mass, angle based, Ikebana, free style). Lab 3. Flower arrangement (line, horizontal, mass, angle based, Ikebana, free style).	9
Module 2 Pest Control Lab 4. Identification of different types of Pest and methods of eradication.	3
Module 3 Maintaining Reports and Records Lab 5. Room occupancy report, Checklist, Floor register, Work/ maintenance order, Lost and found register. Lab 6. Guest special request register, Record of special cleaning, Call register, VIP list, Floor linen book/ register.	6
Module 4 Laundry Layout and Operation Lab 7. Designing laundry layout. Lab 8. Washing linens and uniforms.	6
Module 5 Linen and Uniform Inventory Lab 9. Linen and uniform inventory Lab 10. Handling room linen/ guest supplies, maintaining register Lab 11. Calculating par stock.	9

Textbooks:

1. S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGraw Hill, 2008.
2. G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd ed, New Delhi: Oxford university press, 2014.
3. S.K. Kaushal and S.N. Kaushal, *Accommodation Operation and Management*. 1st ed, New Delhi: Frank Bros. & Co, 2006

Reference books:

1. M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.
2. Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
3. Joan C. Branson and M. Lennox, *Hotel, Hostel & Hospital Housekeeping*. 5th ed, London: Hodder Arnold, 1988.
4. M. Kappa and A. Nitschke, *Managing House Keeping Operation*. 3rd ed, Lansing Mich: American Hotel and Lodging, Educational Institute, 2008

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz 1	10
Lab Quiz 2	10
Progressive Lab Performance	30
Lab Viva	20
End Semester Evaluation	30

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	3	2	1	2	2	3	2	2	3			
CO2	3	3	3	1	2	3	2	2	3	2	1	3			
CO3	3	3	3	3	2	2	2	2	3	1	1	3			
CO4	3	3	3	2	3	1	1	3	2	3	2	3			
CO5	3	3	2	1	2	3	2	2	2	1	2	3			

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO 1	CD5, CD8
CD2	Tutorials/Assignments	CO 2	CD5, CD8
CD3	Seminars	CO 3	CD5, CD8
CD4	Mini projects/Projects	CO 4	CD5, CD8
CD5	Laboratory experiments/teaching aids	CO 5	CD5, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25208
Course title: Front Office Operation Practical
Pre-requisite(s): NIL
Co- requisite(s): Front Office Operation
Credits: 1.5 L: T: P: 3

Class schedule per week: 03
Class: BHM
Semester / Level: Third / Two
Branch: BHM
Name of Teacher: Praveen Srivastava

Course Objectives

This course envisions to impart to students to:

1.	Understand the geographical location of various countries.
2.	Understand grooming standard required in the hospitality industry.
3.	Explain the requirement of effective verbal communication in hospitality industry.
4.	Explain the requirement of effective non-verbal communication in the hospitality industry.
5.	Understand the use of forms and formats required in the hospitality industry.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Understand geographical location of various continents and countries, its capital, flag and airlines.
CO2	Illustrate various grooming standards and arrival activities of Front Office Department.
CO3	Illustrate verbal communication skills required in the Front Office Department of a Hotel.
CO4	Illustrate non-verbal communication skills required in Front Office Department of a Hotel.
CO5	Prepare various forms and formats needed in Front Office Department.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Knowing the world Understanding different continents and division of world. Preparation and study of countries and capitals, currencies and airlines Preparation and study of flags and chart.	9
Module 2 Front office department and its operation Identification of equipment, work structure and stationery of Front Office. Basic manners and grooming standards required for Front Office operation. Role play of Pre-Arrival and Arrival activities.	9
Module 3 Communication Skill - Verbal Understanding the importance of Communication skills – verbal, Presentation and public speaking. Telecommunication skills telephonic situation handling	6
Module 4 Communication Skill – Non-Verbal Understanding the importance of Communication skills – Non-verbal. Facial expressions, the tone and pitch of the voice. Gestures, Body language (kinesics) and the physical distance between the communicators (proxemics).	9
Module 5 Forms and Formats Preparation of various Forms and Formats used in Front Office Department. Preparation of various Formats used in Front Office Department.	6

Textbooks:

1. Kasavana & Brooks, *Managing Front Office Operations*, AHL&A, 2001
2. Meenakshi Ramand and Prakash Singh, *Business Communication*, Oxford Publication, 2012.

Reference Books:

1. Vishwamohan, *English for Hotel Industry*, Pearson Publication, 2013

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz 1	10
Lab Quiz 2	10
Progressive Lab Performance	30
Lab Viva	20
End Semester Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	1	1	1	1					1	2	1	1	1	
CO2	3	3	1	1	1		1			1	2	2	3	3	2
CO3	3	3	3	3	3	3	2	3	2	3	2	3	3	2	2
CO4	3	3	3	3	3	3	2	3	2	3	2	3	3	2	2
CO5	2	3	1	12	1				1	1	2		1	3	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8
CD2	Tutorials/Assignments	CO2	CD5, CD8, CD9
CD3	Seminars	CO3	CD5, CD8
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25209
Course title: Industrial Training
Pre-requisite(s) NIL
Co-requisite(s): NIL
Credits: 20 L: T: P:
Training schedule: 22 weeks
Class: BHM
Semester/Level Fourth/Two
Branch: BHM
Name of Teacher: Gautam Shandilya

Course Objectives

This course enables the students to:

1.	Gain the practical knowledge and skills with systems, standards, and practices of hotel industry.
2.	Train, motivate, develop and build the confidence in the practical work of hotel operations in all four core areas.

Course Outcomes

After the completion of this course, students will be able to:

1.	Identify their key operational areas of interest.
2.	Illustrate the first-hand practical knowledge on their areas of interest.
3.	Demonstrate the ability to work in a professional and commercial hotel
4.	Enhance employability skills with their requisite knowledge, skills, attitude and practical experience.

Syllabus

Module 1 Front Office

Areas to be covered:

Reservation, Reception, Bell-desk, Cashier, Business centre, Airport rep etc.

Module 2 Housekeeping

Areas to be covered:

Floors, Public area, Linen / Laundry / Uniform Room, Housekeeping Desk, Florist and Housekeeping Stores.

Module 3 Food Production

Areas to be covered:

Main Kitchen, Garde Manger, Butchery, Bakery, Restaurant kitchen/ Stores - layout of kitchens - brand names of equipment used.

Module 4 Food and Beverage Service

Areas to be covered:

Room Service, Coffee Shop, Banquets, Bar, Specialty Restaurants.

Module 5 Sales Maintenance and Human Resource

Areas to be covered:

Sales strategies, working of maintenance department, process of recruitment and training.

Gaps in the syllabus (to meet Industry/Profession requirements): Nil

POs met through Gaps in the Syllabus: N/A

Topics beyond syllabus/Advanced topics/Design: N/A

POs met through Topics beyond syllabus/Advanced topics/Design: N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Progressive Evaluation	50
End Sem Evaluation	50

Indirect Assessment

1. Student Feedback on Hotel
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	3	3	3	3	3	3	3	3	3	3	3	3
2	3	3	3	3	3	3	3	3	3	3	3	3
3	3	3	3	3	3	3	3	3	3	3	3	3
4	3	3	3	3	3	3	3	3	3	3	3	3

Mapping Between COs and Course Delivery (CD) methods			
CD	Course Delivery methods	Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		
CD2	Tutorials/Assignments		
CD3	Seminars		
CD4	Mini projects/Projects		
CD5	Laboratory experiments/teaching aids		
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training	CO1, CO2, CO3, CO4	CD 7, CD 8
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

Lecture wise Lesson Planning Details.

Industrial visits/in-plant training in hotel as per the schedule given by the Hotel.

3rd Year Syllabus and Course Information Sheet

COURSE INFORMATION SHEET

Course code: BH25301
Course title: Travel and Tourism Management
Pre-requisite(s): NIL
Co-requisite(s): NIL
Credits: 3 L: 3 T: P:
Class schedule per week: 03
Class: BHM
Semester/Level: Fifth/Three
Branch: BHM
Name of Teacher: Nishikant Kumar

Course Objectives

This course envisions to impart to students to:

1	Understand the structure, scope, and significance of the travel and tourism industry.
2	Gain insights into the socio-cultural, environmental, and economic impacts of tourism.
3	Develop managerial and operational skills relevant to tourism businesses.
4	Learn about Indian tourism policy, major tourist attractions, and travel regulations.
5	Apply marketing and customer service strategies in tourism management.

Course Outcomes

After the completion of this course, students will be to:

1.	Explain the meaning and nature of tourism. Conceptualize the various forms & types of tourism along with its important constituents.
2.	Illustrate the aspects of socio-cultural, environmental, and economic impacts of tourism.
3.	Create the insight on tourism products.
4.	Apply the managerial functions of various tourism and travel formalities.
5.	Conceptualize the significance of marketing and various strategies of tourism and identify the trends on tourism.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to Travel and Tourism Industry Definition, meaning, and concept of tourism, Types of tourism: Leisure, business, adventure, religious, medical, eco-tourism, Components of tourism: Transport, accommodation, attractions, services, Role of public and private sector in tourism development. Global and Indian tourism statistics, Growth and importance of tourism in the Indian economy.	8
Module 2 Indian Tourism – Policies, Products & Destinations Ministry of Tourism and its initiatives (e.g., Swadesh Darshan, PRASAD, Dekho Apna Desh), Key tourism products in India: Heritage, pilgrimage, wildlife, hill stations, backwaters, wellness, Major destinations: Rajasthan, Goa, Kerala, Himachal Pradesh, Northeast, Tamil Nadu, etc., Promotion of domestic and international tourism, Role of Incredible India campaign.	8
Module 3 Travel Agency Operations and Tour Planning Functions and types of travel agencies, Tour operator vs. travel agent, Tour planning process: Itinerary preparation, costing, documentation (visa, passport, insurance), Online travel portals (MakeMyTrip, Yatra, Goibibo, etc.), Customer relationship management in travel agencies.	8
Module 4 Marketing and Customer Service in Tourism Principles of marketing in tourism, Digital marketing: SEO, social media, content marketing, Branding of destinations and tourism products, Customer expectations and service delivery. Handling complaints and feedback mechanisms, Role of technology in enhancing customer experience.	8
Module 5 Sustainable Tourism and Emerging Trends Concept of sustainable tourism. Socio-cultural, environmental, and economic impacts of tourism, Responsible tourism and community-based tourism, Challenges in tourism: Overtourism, infrastructure, seasonality, Future trends: Smart tourism, AI chatbots, AR/VR experiences, mobile apps.	8

Textbooks:

- Sunetra Roday, Tourism – Operations and Management, Oxford Publications, 2010.
- John R. Walker, Introduction to Hospitality Management, 2/e Pearson Education, 2008.

Reference books:

- Page, Stephen J. Tourism Management: Managing for Change. Routledge
- Kotler, P., Armstrong, G. Principles of Marketing. Pearson Education
- Cooper, A., Fletcher, J., Fyall, A., Gilbert, D., & Wanhill, S. Tourism: Principles and Practice. Pearson Education
- Mohinder Chand, Travel Agency and Tour Operation- An introductory Text, Anmol Publishers, 2010.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure**Direct Assessment**

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	2	2	3	2	2	3	2	2	1	2	3			
CO2	2	2	2	2	2	1	2	2	2	2	2	2			
CO3	2	1	1	2	2	2	2	2	3	2	1	3			
CO4	1	2	1	2	2	2	1	1	2	1	2	2			
CO5	3	2	2	2	3	1	2	2	2	2	3	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25302
Course title: Event Management
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	Explain the structure, scope and economics of the global & Indian events industry.
2.	Equip with systematic planning, budgeting and design tools for diverse event types.
3.	Develop operational capability in logistics, vendor & crowd management suited to hospitality venues.
4.	Apply marketing, sponsorship and digital-media techniques to maximize event reach and ROI.
5.	Manage legal, risk, sustainability and legacy issues while aligning events with hospitality brand goals.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Analyze the feasibility of prospective events and prepare a concise proposal.
CO2	Design detailed action plans including timelines, budgets, floor-plans and contingency matrices.
CO3	Execute & monitor on-site operations using standard documentation (BEOs, checklists, run-sheets).
CO4	Evaluate event performance through financial, experiential and sustainability metrics.
CO5	Recommend improvements aligned with stakeholder objectives and emerging industry trends.

SYLLABUS

Module	(NO. OF LECTURE HOURS)
Module 1: Events Industry & Typologies Evolution, classification of events; MICE sector; social, cultural & mega-events; stakeholders; economic & socio-cultural impacts; role of hotels & resorts as venues.	6
Module 2: Event Ideation, Concept & Design Creative process; theme development; story-boarding; event feasibility; goal & SMART objective setting; budgeting (zero-based & cost-plus); proposal writing; pitching to clients; site selection and venue contracts.	9
Module 3: Operations & Logistics Work-breakdown structures; Gantt & network scheduling; vendor sourcing & negotiation; equipment & technical production (AV, lighting, staging); catering service considerations; manpower planning; crowd flow, queue management; green room & artist hospitality; run-sheet creation.	9
Module 4: Marketing, Sponsorship & Finance Market segmentation; integrated marketing communications; digital & social media campaigns; ticketing & pricing models; sponsorship tiers & activation; ROI calculation; post-event financial reconciliation; CSR and community engagement.	8
Module 5: Risk, Safety, Sustainability & Emerging Trends Legal framework (licenses, permits, IP & music rights); risk assessment & mitigation; safety & security protocols; insurance; emergency & crisis planning; sustainable event standards (ISO 20121); carbon foot printing; technology trends—hybrid/virtual events, AI-driven personalization, immersive tech; career pathways.	9

Textbooks:

1. Dowson, R., Albert, B. & Lomax, D. *Event planning and management: Principles, planning and practice*. Kogan Page Publishers, 2022.

Reference Books:

1. Bladen, C., Kennell, J., Abson, E. & Wilde, N. *Events management: An introduction*. Routledge. 2022.
2. Smith, A. & Judith M. *Events and Sustainability*. 2022.
3. Silvers, J.R., *Risk management for meetings and events*. Routledge. 2009.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment

Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	3	2	2	1	2	1	1	1	2	2	1			
CO2	3	2	3	2	3	2	2	2	1	2	3	1			
CO3	3	2	2	3	3	3	3	3	2	2	2	1			
CO4	2	3	1	3	2	2	1	2	2	3	3	2			
CO5	2	2	3	2	2	3	2	2	2	3	2	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25303
Course title: Principles of Management
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: SANJIV KUMAR SRIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Introduction to the concepts of Management.
2.	Understand the concept, process and principles of Planning and Organizing.
3.	Learn about Staffing and Directing.
4.	Acknowledge about the concept and effective ways of Controlling and Coordinating.
5.	Understand the nature and significance of Motivation and Leadership.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Apply the concept of Management.
CO2	Identify the principles of Planning and Organizing.
CO3	Apply the concept of Staffing and Directing.
CO4	Describe effective ways of Controlling and Coordinating.
CO5	Identify the basic concepts of Motivation and Leadership.

SYLLABUS

MODULE	(NO. OF LECTUR E HOURS)
Module 1 Introduction to Management Definition, Functions, Process, Scope and Significance of Management. Nature of Management, Levels of Management, Managerial Roles. Difference between Management and Administration. Evolution of Management Thoughts: Classical Approaches, Scientific Management, Administrative Management, Human Relations Movement and Contemporary Approaches: Quantitative Management, Contingency Theory.	8
Module 2 Planning and Organizing Meaning and Definition, Nature, Scope, Objective and Significance of Planning, Steps of Planning, Types of Plans, Management by Objective, Organizing: Meaning and Definition, Characteristics, Process, Need and Importance, Principles, Span of Management. Organizational Structure – Line Organization, Line and Staff relationship, Informal Organization – Meaning, Characteristics, Importance, Limitations, Difference between Formal and Informal Organization. Authority, Delegation and Decentralization.	8
Module 3 Staffing and Directing Staffing – Meaning, Nature, Importance, Staffing Process – Manpower Planning, Recruitment, Selection, Orientation and Placement, Training, Remuneration, Performance Appraisal, Promotion and Transfer. Directing: Definition, Nature, Need and Importance, Principles of Directing. Supervision – Role and Functions of a Supervisor, Effective Supervision, Communication Process, Channels and Barriers, Effective Communication.	8
Module 4 Controlling and Coordinating Controlling – Meaning, Features, Importance, Control Process, Characteristics of an Effective Control System, Types of Control. Tool of control – Business Budgeting, Management Accounting, Management Reports, PERT and CPM, Control techniques. Co-ordination – Characteristics, Importance, Essentials, Types, Obstacles and Needs. Principles of Coordination, Types of Coordination. Techniques of Coordination.	8
Module 5 Motivation and Leadership Motivation: Concept, Importance, Need of motivation, Theories – Classical and Modern, Financial and Non-Financial Motivation, Positive and Negative Motivation. Leadership: Definition, Meaning, Importance of leadership, Characteristics of an effective leader. Leadership vs Management, Process of Leadership, Theories, and Leadership Styles.	8

Textbooks:

1. Durai, P. (2015). Principles of Management, Text and Cases. New Delhi: Pearson Education.
2. Principles and Practice of Management – L.M. Prasad – Sulthan Chand and Sons, New Delhi – 2.
3. Koontz, H. (2010). Essentials of Management. New Delhi: Tata McGraw-Hill Education.

Reference Books:

1. Robbins, S.P. & Decenzo, D. A. (2014). Fundamentals of Management: Essential Concepts and Applications. New Delhi: Pearson Education.
2. Stoner, Freeman & Gilbert Jr. (2009). Management. New Delhi: Prentice Hall.
3. Principles of Management – T. Ramasamy (Himalaya Publishing Cony)

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	1	2	2	2	2	1	3	2	1	2			
CO2	3	2	2	1	2	3	2	2	3	2	1	2			
CO3	3	2	2	2	3	2	2	1	3	2	2	2			
CO4	3	1	3	2	3	2	2	1	3	2	2	2			
CO5	3	1	3	2	2	2	3	1	3	2	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course Code: HS 24104
Course Title: Introduction to Indian Knowledge Systems
Pre-requisite(s): Nil
Co- requisite(s): Nil
Credits: 0 L: 2 T: 0 P: 0
Class schedule per week: 2
Class: UG/PG
Semester / Level: I
Branch: All
Name of Teacher: Mrinal Kumar Pathak

COURSE OBJECTIVES

This course envisions imparting students to:

1.	Help students comprehend the foundational components and frameworks of Indian Knowledge Systems.
2.	Promote appreciation for the holistic and integrative approach of Indian sciences and philosophical thought.
3.	Enable recognition of India's contributions in mathematics, astronomy, medicine, arts, and other disciplines.
4.	Encourage learners to connect ancient Indian wisdom with contemporary academic and practical applications.
5.	Cultivate a critical and analytical mindset toward Indian classical texts and practices.

COURSE OUTCOMES (COs)

After the completion of this course, students will be able to:

CO1	Understand the fundamental components of Indian Knowledge Systems.
CO2	Appreciate the holistic and integrative approach of Indian sciences and philosophies.
CO3	Recognize the influence of IKS in various domains such as mathematics, astronomy, medicine, and arts.
CO4	Correlate ancient Indian principles with modern knowledge frameworks.
CO5	Engage with Indian texts and practices with a critical and analytical mindset

SYLLABUS

MODULE	(NO. OF LECTURE /PRACTICAL Hours)
Module I: Introduction to Indian Knowledge Systems Definition and scope of IKS; Importance and relevance of IKS; Interdisciplinary nature; Overview of knowledge fields: language, logic, science, art, and philosophy.	4
Module – II An overview of Indian Philosophical Systems Vedas, Up Vedas, Upanishads ; Concepts of knowledge, consciousness, and reality.	6
Module – III An Overview of Science, Mathematics, Medicine and Life Sciences in IKS Ancient Indian mathematics, contributions of Aryabhata, Bhaskara; Astronomy and observational traditions. An Overview to Ayurveda; Notions of health and disease; Ecology and sustainability in Indian traditions; Yoga and mental health.	8
Module – IV Arts, Architecture, and Literature: An Introduction Indian aesthetics – Rasa theory, Music and dance traditions, Literary contributions and epics, Indian architecture (overview of Vedic, IVC and Buddhist Architecture and symbolism)	6
Module – V Contemporary significance of Indian Knowledge Systems An overview of the contemporary significance of Indian Knowledge Systems, focusing on their integration into modern education, advancements in science and technology, and relevance in policymaking	6

TEXTBOOKS:

1. Mahadevan, B., Bhat Vinayak Rajat, Nagendra Pavan RN. (2022), Introduction to Indian Knowledge System: Concepts and Applications, PHI Learning Private Ltd.
2. Mukul Chandra Bora, Foundations of Bharatiya Knowledge System, Khanna Book Publishing

REFERENCE BOOKS:

1. Baladev Upadhyaya, Samskrta Śāstrom ka Itihās, Chowkhambha, Varanasi, 2010.

2. D. M. Bose, S. N. Sen, and B. V. Subbarayappa, Eds., A Concise History of Science in India, 2nd Ed., Universities Press, Hyderabad, 2010.
3. Astāngahrdaya, Vol. I, Sūtrasthāna and Śārīrasthāna, Translated by K. R. Srikantha Murthy, Krishnadas Academy, Varanasi, 1991.
4. Dharampal, The Beautiful Tree: Indian Indigenous Education in the Eighteenth Century, Dharampal Classics Series, Rashtrottthana Sahitya, Bengaluru, 2021.
5. J. K. Bajaj and M. D. Srinivas, Indian Economy, and Polity in Eighteenth-century Chengalpattu, Centre for Policy Studies, Chennai, 1995.

Gaps in the syllabus (to meet Industry/Profession requirements):

POs met through Gaps in the Syllabus:

Topics beyond syllabus/Advanced topics/Design:

POs met through Topics beyond syllabus/Advanced topics/Design:

Course Delivery Methods:

CD1	Lecture by use of boards/LCD projectors/OHP projectors	✓
CD2	Assignments/Seminars	✓
CD3	Laboratory experiments/teaching aids	✓
CD4	Industrial/guest lectures	
CD5	Visit to historical places	
CD6	Self- learning, such as the use of NPTEL materials and the internet	✓
CD7	Simulation	

DIRECT ASSESSMENT

Assessment Tool	% Contribution during CO Assessment
Continuous Internal Assessment	50
End Semester exams	50

Continuous Internal Assessment	% Distribution
Day-to-day performance & assignments	30
Quiz 1 (we propose an assignment)	10
Quiz 2 (we propose an assignment)	10

End Semester Examination	% Distribution
Examination: Submission of reports	35
Viva- Voce	15

Assessment Components	CO1	CO2	CO 3	CO 4	CO 5
Continuous Internal Assessment	✓	✓	✓	✓	✓
Examination: Submission of reports	✓	✓	✓	✓	✓

MAPPING BETWEEN COURSE OUTCOMES AND COURSE DELIVERY METHOD

Course Outcomes	Course Delivery Method
CO 1	CD2, CD 3
CO 2	CD 3, CD 6
CO 3	CD 1, CD 2
CO 4	CD 3, CD6
CO 5	CD 2, CD3, CD6

COURSE INFORMATION SHEET

Course code: HS25301
Course title: French
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	Familiarize with French phonology and everyday courtesies used in hotel lobbies.
2.	Equip to manage core front-office tasks in French.
3.	Enable confident French usage in F&B outlets for menu explanation and order taking.
4.	Build skills for courteous guest assistance and complaint management in French.
5.	Prepare for written correspondence and spoken presentations required in international hospitality.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Pronounce French accurately and handle simple lobby greetings and identity checks.
CO2	Perform reservation, check-in and telephone interactions using correct basic structures.
CO3	Explain menus, suggest pairings and process food-and-beverage orders in functional French.
CO4	Guide guests, offer solutions and respond to complaints professionally while respecting French etiquette.
CO5	Draft clear professional emails/CVs and deliver short hospitality-oriented presentations in French.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Foundations & Phonetics French alphabet & sounds; Greeting, introducing, thanking, farewells; Numbers 0-100, days, months, time expressions; Definite/indefinite articles, gender, basic verbs être/avoir	8
Module 2: Front-Office Communication Reservation vocabulary & phrases; Check-in / check-out dialogues; Taking phone enquiries, spelling names, giving room rates; Simple interrogatives & negation	8
Module 3: Restaurant & Beverage Service Menu terminology for courses, cooking styles & wines; Taking orders, recommending dishes, allergy queries; Numbers above 100, fractions & prices; Partitive articles, vouloir/prendre	8
Module 4: Guest Relations & Problem Handling Giving directions inside/outside hotel; Polite offers & advice (pouvoir/devoir); Handling complaints, service recovery phrases; Cultural etiquette & small talk topics	8
Module 5: Professional Writing & Presentation Email writing: confirmation, apology, feedback follow-up; Basic CV & covering letter for internships abroad; Short oral presentations (hotel features, tour packages); Role-play assessment & revision	8

Textbooks:

1. Bhattacharya, S. *French for Hotel Management & Tourism Industry*. Frank Bros. & Co. (publishers) Ltd. 2014.

Reference Books/Materials:

1. Authentic hotel forms, French wine lists, tourist brochures, podcasts

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	-	-	-	-	3	1	2	1	-	-	2			
CO2	3	1	-	1	1	3	2	2	1	-	1	2			
CO3	3	-	-	1	1	3	2	2	1	-	1	2			
CO4	3	1	-	1	1	3	2	3	1	-	1	2			
CO5	2	-	-	-	1	3	3	2	1	-	2	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25304
Course title: Bakery and Confectionary Management
Pre-requisite(s): NIL
Co- requisite(s): Bakery and Confectionary Management Practical
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	Introduce to the core principles and science behind bakery ingredients and processes.
2.	Develop understanding and skills in the preparation of various traditional and artisan breads.
3.	Have knowledge and hands-on training in cake and pastry preparation methods.
4.	Explore sugar cookery techniques and chocolate-based confectionery production.
5.	familiarize with bakery setup, production planning, costing, and quality control.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify key ingredients and explain their functional roles in baked products.
CO2	Produce different bread types using appropriate techniques and identify common baking faults.
CO3	Prepare standard cakes, pastries, and layered desserts with appropriate mixing and baking methods.
CO4	Create basic sugar confections and chocolate products, including tempered and molded items.
CO5	Design bakery operations, manage resources, and ensure quality standards in a commercial setup.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Fundamentals of Bakery Science History and evolution of baking; Classification and functions of bakery ingredients (flour, leavening agents, sugar, eggs, fats, liquids, salt); Ingredient handling and scaling; Principles of baking (mixing methods, fermentation, proofing, baking temperatures and times); Basic sponge and dough techniques; Role of gluten and its development; Faults and remedies in bakery products	8
Module 2: Breads and Artisan Baking Types of breads: lean, enriched, sourdough; White bread, multigrain bread, focaccia, baguette; Bread improvers and additives; Dough fermentation and proofing control; Shaping and scoring techniques; Crust and crumb development; Commercial bread production process	8
Module 3: Cakes, Pastries and Gateaux Classification of cakes: shortened, foam, pound, chiffon; Cake mixing methods (creaming, whisking, all-in-one, flour-batter); Basic sponge cake, choux pastry, shortcrust tart; Faults in cake making and corrective measures; Pastry types: shortcrust, puff, choux, filo; Introduction to gateaux and tortes; Layered gateaux with fillings and icing	8
Module 4: Confectionery and Sugar Work Sugar cookery stages (thread, soft ball, hard ball, crack, caramel); Types of confections: fudge, fondant, toffee, nougat, marshmallow, pralines; Fudge, truffles, toffee; Tempering of chocolate; Chocolate-based products and decoration; Chocolate garnishes and centre-filled chocolates; Introduction to decorative sugar work (pulled, blown sugar)	8
Module 5: Bakery Operations and Management Layout of a bakery unit and equipment planning; Procurement and inventory management; Quality assurance and HACCP in bakery production; Costing and pricing of baked products; Menu planning and display techniques; Waste management and sustainability in bakeries	8

Textbooks:

1. Friberg, B. *The advanced professional pastry chef*. John Wiley & Sons, 2003.
2. Gisslen W. *Professional baking*. Wiley, 2019.

Reference Books:

1. Gisslen, W. *Professional Baking, Student Workbook*. Wiley, 2000.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	1	2	2	1	1	1	1	1	1	2			
CO2	3	3	2	2	3	1	1	1	2	1	2	2			
CO3	3	2	3	2	3	1	1	1	2	2	2	2			
CO4	3	3	2	3	3	2	1	1	2	2	2	3			
CO5	2	3	3	2	2	3	2	2	3	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25305
Course title: Fundamentals of Alcoholic Beverage
Pre-requisite(s): NIL
Co- requisite(s): Fundamentals of Alcoholic Beverage Lab
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Classify distilled beverage.
2.	Gain a basic understanding of proof system of distilled beverage.
3.	Learn the production, service & storage various types of distilled beverage.
4.	To gain basic understanding of bar lay-out and bar design.
5.	To gain knowledge to operate a bar within legal requirement governing the sale of alcoholic beverages.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Differentiate between Pot & Patent still distillation method.
CO2	Calculate alcoholic strength of various alcoholic beverages in different scales.
CO3	Explain the production process, types, service and storage procedure of distilled beverage.
CO4	Demonstrate knowledge of liqueurs, aperitifs and cocktails.
CO5	Design bar and operate within legal requirements governing the sale of alcoholic beverages

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction of Distilled Beverage Introduction & Definition, Production of distilled beverage, Pot still distillation method, Patent still distillation method, Proof: Different scales.	8
Module 2 Spirits Production, classification, brand names & service of: Whisky, Rum, Gin, Vodka, Brandy, Tequila.	8
Module 3 Liqueurs & Aperitifs Liqueur: Definition & history, Production method, Classification, Service. Aperitif: Introduction & definition, Types & Service.	8
Module 4 Cocktails Definition & history, Classification, Cocktail bar equipment, Components of cocktail, Methods of making cocktail, Preparation & service.	8
Module 5 Bar Introduction, Types, Layout, Equipment used, Bar Licenses, Staffing, Job Description, Job Specification.	8

Textbooks:

1. Singaravelavan R. *Food & Beverage Services*, Oxford Publications, 2011
2. Jana A & Srivastava P. *United Colours of Alcohol*, TRIDENT, 2015

Reference books:

1. Lillicrap Dennis R., *Food & Beverage Service*, Hodder Arnold Publication, 2006.
2. Albert W.A. Schmid & Lalogan John P. *The Beverage Manager's Guide to Wines, Beers and Spirits*, Pearson. 2011
3. Prasad, Vara, Krishna R. Gopi, *Food & Beverage: F&B Simplified*, Pearson, 2013.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment

Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	2	1	2	1		1	1	1	1	2			
CO2	3	3	2	1	2	1	2	1		1		2			
CO3	3	3	2	2	2	2	1	2	1	2	2	2			
CO4	3	3	2	2	2	2	1	2	1	2	2	2			
CO5	3	3	2	2	2	2	2	2	2	3	1	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25306
Course title: Accommodation Management-I
Pre-requisite(s): NIL
Co- requisite(s): Accommodation Management Practical - I
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 02
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: SANJIV KUMAR SRIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Understand planning and operational process of housekeeping department.
2.	Learn about the concept of contract cleaning, its type and various methods of pricing.
3.	Introduce the concept and art of interior design.
4.	Understand the concept of interior decorations.
5.	Develop awareness and importance of safety and security in hotels.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Explain the planning and operational process of the housekeeping department.
CO2	Apply the concept of contract cleaning, its type and various methods of pricing.
CO3	Describe the concept and art of interior design.
CO4	Explain the concept of interior decorations.
CO5	Identify the safety and security concerns of a hotels.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Planning Housekeeping Operation Introduction, Planning process. Division of work document, Area inventory list, Frequency scheduling, Performance standards, Productivity standard, determining staff strength, Recruiting, Selecting, Hiring, Orienting, and Training, Equipment & operating supply inventory level, Determining Par Levels, Work Schedules.	8
Module 2 Contract Cleaning Definition, Importance, Situation for deciding contract services, Contract services in H.K., Types of contracts, Guidelines of hiring contract services, contract specification, Pricing contract. Advantage & disadvantages of contract cleaning services.	8
Module 3 Interior design Importance, definition, types, objective. Principle of design: Harmony, Rhythm, Balance, Proportion, Emphasis. Elements of design: Line, Form, Color, texture. Designing guest rooms for the physically challenged. Planning trends in hotels.	8
Module 4 Interior Decoration Concept and importance, Color: dimension, warm & cool color, advance & receding color, color wheel, color scheme, Planning color scheme. Lighting: Importance, Types, methods & lighting plans. Floor covering, selection, types, characteristics, Wall coverings.	8
Module 5 Housekeeping Safety and Security Introduction, Three E's of safety, Safety management program. Safety awareness & accident prevention, Basic guidelines for prevention of accident, procedure followed in case of accident. Fire prevention and firefighting: Classification, Fire warning system, Firefighting equipment, fire emergency. First aid: Principles of first aid, first aid box, first aid procedure, first aid for common situation. Keys: Importance, types of keys and their control. Dealing with bomb threats, Terrorism- steps & prevention. Guest & Employee theft.	8

Textbooks:

- 1 S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGraw Hill, 2008.
- 2 G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd ed, New Delhi: Oxford university press, 2014.
- 3 S.K. Kaushal and S.N. Kaushal, *Accommodation Operation and Management*. 1st ed, New Delhi: Frank Bros. & Co, 2006.

Reference Books:

- 1 M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.
- 2 Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
- 3 Joan C. Branson and M. Lennox, *Hotel, Hostel & Hospital Housekeeping*. 5th ed, London: Hodder Arnold, 1988.
- 4 M. Kappa and A. Nitschke, *Managing House Keeping Operation*. 3rd ed, Lansing Mich: American Hotel and Lodging, Educational Institute, 2008.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcome s (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	2	3	2	2	2	1	2	2	3			
CO2	3	3	3	2	3	2	3	3	2	3	1	2			
CO3	3	3	3	2	3	1	2	3	3	3	3	3			
CO4	3	3	3	2	3	2	2	3	3	3	3	3			
CO5	3	3	2	2	3	3	1	3	3	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25307
Course title: Front office Management -1
Pre-requisite(s): NIL
Co- requisite(s): Front office Management Practical-1
Credits: 3 L: 3 T: P:

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	Understand the security function
2.	Explain the operational reports of a hotel.
3.	Explain the process of developing the Front Office department's budget.
4.	Understand the process of data generation in Hotel Industry.
5.	Understand the process of human resource recruitment.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Develop security function for a hotel for protection of funds.
CO2	Evaluate various operational reports of a hotel.
CO3	Design the budget of the hotel front office department.
CO4	Rearrange the data for revenue generation and report formation in front office.
CO5	Create the human resource recruitment process for a hotel.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Front Office Security Functions Role of Front Office in Hotel Security, check in: use of metal detectors, validations, scanty baggage handling, Keys control: ELS (Electronic Cards), Handling Grand Master / Master key, lost & found & damaged keys, use of key cards, Guest & staff movement & access control, Protection of funds, safe deposit boxes.	8
Module 2 Planning and Evaluating Operations Evaluating Front Office Operations – Daily operation report, occupancy ratios, room revenue analysis, Hotel income statement, room division income statement, rooms division budget report, Operating ratio, Ratio Standard.	10
Module 3 Budgeting Definition, kind of budget, advantage of budget control, limitation of budget, Operating expense budget, Cost of sale budget, Selling and distribution cost budget, Labor cost budget, Overhead cost budget, front office budget.	8
Module 4 Management of Data Generating Front office subsystems Overview of front office data subsystem, Management of interfaced subsystem – telephone, recordable locks, pay per view service, in room vending Management of non-interfaced subsystems – telephone, internet access, pay per view, in room vending, guest laundry.	8
Module 5 Managing Human Resource Recruiting: Internal recruitment, External Recruitment. Selecting: Selection Tool, Evaluating Applicants. Interviewing. Hiring: Job Offer, Processing personnel records, Orientation, Skill Training, Staff Motivation: Training, Cross-Training, Recognition, Incentive program, performance appraisals.	6

Textbooks:

- 1.Kasavana & Brooks, Managing Front Office Operations, AHL&A, 2001
- 2.S.K. Bhatnagar, Front Office Management, Frank Bros. & Co. , 2006
- 3.Robert H Woods, Jack D Ninemeier, Professional Front office Management, Pearson, 2006.

Reference books:

1. Colin Dix & Chirs Baird, Front office operations, Pearson, 2006
2. James Bardi, Hotel Front office management, John Wiley & Sons, 2011

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	05
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	3	2	3	1	1		1	2	2	1	2	2	2	1
CO2	2	1	2	1	1	2	1	2		1	1	2	2	2	1
CO3	1	2	3	1	3	1	3	2		1		3	2	1	1
CO4	1	2	3	1	3	1	3	2		1		3	2	1	1
CO5	1	2	2	1	2	2	1	2	1	3	3	2	1	2	2

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini projects/Projects	CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25308
Course title: Bakery and Confectionary Management Practical
Pre-requisite(s): NIL
Co- requisite(s): Bakery and Confectionary Management
Credits: 1.5 L: T: 0 P: 3

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	Have hands-on training in preparing bakery and confectionery products.
2.	Enhance technical proficiency in bread, cake, pastry, and confectionery preparation.
3.	Develop students' skills in presentation, hygiene, and commercial production standards.
4.	Integrate theoretical knowledge with real-time practical execution in a kitchen environment.
5.	Evaluate quality, texture, and sensory attributes of baked goods.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Demonstrate correct weighing, mixing, and handling techniques for basic bakery ingredients.
CO2	Prepare and evaluate various types of breads, including artisan and international varieties.
CO3	Produce a variety of cakes and pastries using appropriate baking and decorating techniques.
CO4	Create confections like chocolates, fudges, and toffees, maintaining hygiene and consistency.
CO5	Apply bakery production planning, display, and storage techniques suitable for commercial settings.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Bread Preparation of plain and enriched dough breads (white bread, milk bread, whole wheat) International breads: focaccia, baguette, brioche Quick breads and tea cakes: banana bread, muffins, scones	9
Cake Sponge cake: plain, chocolate, marble (whisking and creaming methods) Pound cake, butter cake, cupcakes	6
Pastry work Short crust pastry: tarts and pies Puff pastry: vol-au-vent, palmiers Choux pastry: éclairs, profiteroles	9
Gateaux Layered gateaux with icing and fillings: black forest, truffle cake	6
Sugar and Chocolate work Basic sugar confections: fudge, marshmallow, toffee Sugar syrups, caramel work, decorative garnishes Chocolate tempering and molding: truffles, center-filled chocolates	9

Textbooks:

3. Friberg, B. *The advanced professional pastry chef*. John Wiley & Sons, 2003.
4. Gisslen W. *Professional baking*. Wiley, 2019.

Reference Books:

2. Gisslen, W. *Professional Baking, Student Workbook*. Wiley, 2000.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design –

N/A Course Outcome (CO) Attainment

Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	1	1	3	2	1	1	2	1	1	2			
CO2	3	3	2	2	3	1	1	1	2	2	1	2			
CO3	3	2	3	2	3	2	1	1	2	2	2	2			
CO4	3	2	2	2	3	2	1	1	2	2	2	2			
CO5	2	3	3	2	2	3	2	2	3	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5
CD2	Tutorials/Assignments	CO2	CD5
CD3	Seminars	CO3	CD5
CD4	Mini Projects/Projects	CO4	CD5
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25309
Course title: Fundamentals of Alcoholic Beverage Lab
Pre-requisite(s): NIL
Co- requisite(s): Fundamentals of Alcoholic Beverage
Credits: 1.5 L:0 T: 0 P: 3

Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Get the technical know-how of distilled beverage service.
2.	Learn the skill of making and serving various types of classic cocktails and mocktails.
3.	Learn the skill of making various types of liquor coffee and serving various types of liqueur and liquor coffee.
4.	Get the technical know-how of dispense bar set up and understand dispense bar operation.
5.	Effectively communicate with the guests.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Demonstrate practical ability to prepare, present & serve a range of distilled beverages.
CO2	Demonstrate practical ability to prepare, present & serve a range of cocktails and mocktails.
CO3	Demonstrate practical ability to prepare, present & serve a range of liqueur and liquor coffee.
CO4	Demonstrate ability to set-up and operate dispense bar.
CO5	Apply social and communication skills in order to respond to the needs of the guests.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Service of Whisky, Rum, Gin, Vodka, Brandy, Tequila.	6
Module 2 Service of aperitifs & popular liqueur. Service of liquor coffee (Irish Coffee; Monk Coffee; Russian Coffee; Highland Coffee etc.)	6
Module 3 Bar Set-up and operations.	6
Module 4 Cocktail/ Mocktail Preparation, presentation and service.	6
Module 5 Social Skills & handling guest complaints.	6

Textbooks:

1. Singaravelavan R. *Food & Beverage Services*, Oxford Publications, 2011
2. Jana A & Srivastava P. *United Colours of Alcohol*, TRIDENT, 2015

Reference books:

1. Albert W.A. Schmid & Lalogan John P. *The Beverage Manager's Guide to Wines, Beers and Spirits*, Pearson. 2011
2. Sudhir A. *Food & Beverage Service: A Training Manual*, McGraw Hill Education. Second Edition.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	2	2	2		1		3	2	3			
CO2	3	3	3	2	2	2		1		3	2	3			
CO3	3	3	3	2	2	2		1		3	2	3			
CO4	3	3	3	3	2	3		2	2	2	1	3			
CO5	3	3	3	1	2	3		2	1	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8. CD9
CD2	Tutorials/Assignments	CO2	CD5, CD8
CD3	Seminars	CO3	CD5, CD8
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25310
Course title: Accommodation Management Lab - I
Pre-requisite(s): NIL
Co- requisite(s): Accommodation Management - I
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/ Three
Branch: BHM
Name of Teacher: SANJIV KUMAR SIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Understand various work documents.
2.	Learn about contract cleaning.
3.	Understand Guest room interior designing.
4.	Acknowledge the concept of interior decorations.
5.	Develop knowledge about advertisement.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Plan various work documents.
CO2	Develop contract specification and pricing a contract.
CO3	Identify various elements and principles of interior design.
CO4	Apply the concept of interior decoration.
CO5	Designing advertisement for recruitment.

SYLLABUS

MODULE	(NO.OF PRACTICAL HOURS)
Module 1 Documentation Lab 1. Preparing area inventory list. Lab 2. Designing various work documents: Designing sample frequency schedule and performance standard for cleaning, Productivity standard.	9
Module 2 Dealing Contract Lab 3. Preparing contract specification. Lab 4. Pricing contract.	6
Module 3 Guest Room Designing Lab 5. Three-dimensional model of rooms. Lab 6. Designing guest rooms for physically challenged people, Single lady.	9
Module 4 Decoration Lab 7. Theme decoration.	6
Module 5 Designing Advertisement Lab 8. Designing advertisement for recruitment.	3

Textbooks:

- 1 S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGraw Hill, 2008.
- 2 G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd ed, New Delhi: Oxford university press, 2014.
- 3 S.K. Kaushal and S.N. Kaushal, *Accommodation Operation and Management*. 1st ed, New Delhi: Frank Bros. & Co, 2006

Reference books:

- 1 M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.
- 2 Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
- 3 Joan C. Branson and M. Lennox, *Hotel, Hostel & Hospital Housekeeping*. 5th ed, London: Hodder Arnold, 1988.
- 4 M. Kappa and A. Nitschke, *Managing House Keeping Operation*. 3rd ed, Lansing Mich: American Hotel and Lodging, Educational Institute, 2008

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment –

2. Student's Feedback on Course Outcome

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	1	2	1	3	2	3	2	2	3			
CO2	3	3	3	2	2	3	2	2	3	2	1	3			
CO3	3	3	3	2	2	2	3	2	3	1	1	3			
CO4	3	3	3	2	3	1	1	3	2	3	2	3			
CO5	3	3	2	3	2	3	2	2	2	1	2	3			

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO 1	CD5, CD8
CD2	Tutorials/Assignments	CO 2	CD5, CD8
CD3	Seminars	CO 3	CD5, CD8
CD4	Mini projects/Projects	CO 4	CD5, CD8
CD5	Laboratory experiments/teaching aids	CO 5	CD5, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25311
Course title: Front office Management Lab-1
Pre-requisite(s): NIL
Co- requisite(s): Front office Management - 1
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Fifth/Three
Branch: BHM
Name of Teacher: Pranjali Kumar

Course Objectives

This course envisions to impart to students to:

1.	Explain the check-out and settlement procedures.
2.	Understand basic hotel accounting procedures ranging from posting accounts to
3.	conducting cash and check transactions at the front desk
4.	Explain the process of Audit in Hotel.
5.	Understand procedures for handling complaints.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Illustrate the steps involved in check out and settlement process of a hotel guest.
CO2	Understand the importance of cash handling and credit control.
CO3	Perform the front office audit.
CO4	Handle the common complaints of guest arising in the hotel.
CO5	Explain policies and procedures needed to establish and monitor guest credit limits.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Front Office cash / Checkout and Settlement Role play of guest Check-out.	6
Module 2 Front Office Accounting Preparation of guest folio. Filling up, accounting and totaling guest folios - Semi automated. Filling up, accounting and totaling guest folios - Fully Automated Calculating various occupancy percentages Making discount grid	6
Module 3 The Front office audit Preparing and filling up of forms and format related to Front Office Audit. Computer application for cashiering, night audit and front office accounting. Preparation of transcript and night auditor's sales.	6
Module 4 Guest complaint handling / Problem solving Role play of handling Guest complaints handling.	6
Module 5 Credit Control Role play of control measures during Check-in Role play of prevention of skipper	6

Textbooks:

1. Kasavana & Brooks, *Managing Front Office Operations*, AHL&A, 2001
2. S.K. Bhatnagar, *Front Office Management*, Frank Bros. & Co. , 2006

Reference books:

1. Colin Dix & Chirs Baird, *Front office operations*, Pearson, 2006
2. James Bardi, *Hotel Front office management*, John Wiley & Sons, 2011

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A Course

Outcome (CO) Attainment Assessment tools & Evaluation procedure Direct

Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	1	2	1	2	2	3	2	2	3	3	2	2
CO2	3	3	3		2	3	1	2	3	2	1	3	3	2	3
CO3	3	3	3	2	2	2	1	2	3	1	1	3	3	2	2
CO4	3	3	3		3	1	3	3	2	3	2	3	3	3	2
CO5	3	3	2	1	2	3	2	2	2	1	2	3	3	2	2

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO 1	CD5, CD8
CD2	Tutorials/Assignments	CO 2	CD5, CD8
CD3	Seminars	CO 3	CD5, CD8
CD4	Mini projects/Projects	CO 4	CD5, CD8
CD5	Laboratory experiments/teaching aids	CO 5	CD5, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: HS24133

Course title: Communication Skills II

Pre-requisite(s): Nil

Co- requisite(s): Nil

Credits: L: 0 T:0 P: 3

Contact Hours: 35-40

Class schedule per week: 1

Class: UG/PG

Semester: II,V,VI

Branch: All

Course Objective

Objective-1	To analyze and demonstrate writing and speaking processes through invention, organization, drafting, revision, editing, and presentation.
Objective-2	To understand the importance of specifying audience and purpose and to select appropriate communication choices.
Objective-3	To interpret and appropriately apply modes of expression, i.e., descriptive, expositive, narrative, scientific, and self-expressive, in written, visual, and oral communication.
Objective-4	Participate effectively in groups emphasizing listening, critical and reflective thinking, and responding.
Objective-5	To develop the ability to research and write a documented paper and/or to give an oral presentation.

Course Outcomes

	Modules
CO-1	Apply business communication strategies and principles to prepare effective communication for domestic and international business situations.
CO-2	Utilize analytical and problem-solving skills appropriate to business communication.
CO-3	Participate in team activities that lead to the development of collaborative work skills.
CO-4	Select appropriate organizational formats and channels used in developing and presenting business messages.
CO-5	Communicate via electronic mail, Internet, and other technologies and deliver an effective oral business presentation.

SYLLABUS

Module	Contents	BL
1	Building Business Vocabulary: Vocabulary related to company culture, Phrasal verbs Board, bottom line, revenues, etc.; Words related to leadership skills: founder, etc.; Types of management; Abbreviations; Meeting related vocabulary; Vocabulary related to submitting tenders; Pricing Dedicated, resources, etc.; Verb–noun collocations; Linking words and phrases Existing, identify, etc.; Brand-building, etc.; Types of advertising Households, etc.; Synonyms for increase and decrease; Solicit, risk-averse, etc.; Phrasal verbs and expressions like go bust, stock price, etc.; Vocabulary from profit-and-loss account; and balance sheet; Theatre vocabulary Break down, running costs, etc; Bank charges, bookkeeping, etc.; Formal expressions; Types of workers; Ways of working; Phrases for negotiating; Benefits, premise, etc.; Adverbial phrases; Acquisitions, year on year, etc.; Adjectives and adverbs of frequency; Discourse markers for short talks.	2,3
2	Listening at the Workplace: Listening to descriptions of company culture; Listening to a talk on leaders and managers; Advice for communicating effectively with colleagues; Listening to a talk on Customer Relationship Management; Listening to a presentation; Listening to a talk on effectiveness of advertising; Listening to a talk on sales activities; Listening to a sales pitch; Listening to a sales forecast; Listening to a business conversation; Listening to people talk about their jobs; Listening to interviews with production managers; Listening to staff complaints and demands; Listening to a talk on risk in business.	3
3	Oral communication at the workplace: Describing company culture; Talking about good leaders; Communicating in meetings; Discussing customer-supplier relationships; Presenting information from charts; Presenting from a text; Cost-effective advertising; How to advertise software; Using the Internet for advertising; Finding out about work problems; Making a sales pitch; Negotiation, problems and advice; Talk: teleworking, etc.; Talking about your present job; Describing charts; Presentations on productivity; Negotiating an agreement; Describing the company you work for; Useful hints for making presentations; Making a presentation; Discussion on staff retention, market share, etc.	3,4
4	Reading for Business: Reading internal messages (memo, email, note, notice); Reading a summary of action points; Reading a business forecast; Reading articles on Customer Relationship Management; Reading about how a company prepares tenders; Reading a proposal;	5

	Reading extracts on measuring the impact of advertising; Reading a brief sales report; Reading a productivity report; Reading a memo from a CEO; Reading a business letter.	
5	Business Correspondence: Replying to messages; Writing and replying to a memo, email or notice; A proposal for investigating new markets; A report on advertisers and target audiences; A sales report based on a chart; Report on a sales event for a product launch; A proposal for sponsoring an arts or sports event; Letter complaining about late payment; Email summarising results of negotiation; Short report on stress and absenteeism; Report on changes to company organization; Memo summarising agreement; Proposal to give your company a more ethical image; Letter to prospective customers; Letter expressing interest in business approach.	5

Textbooks

1	Empower, Second Edition, Students book, C1 advanced (2010), Adrian Doff, Craig Thaine, Herbert Puchta, Jeff Stranks, Peter Lewis-Jones, Cambridge University Press and Assessment.
----------	--

Reference Books

1	Communication Skills (2015) IInd edition, Sanjay Kumar & Pushp Lata, Oxford University Press
2	Business Correspondence and Report Writing, (2020)VIth edition, R.C. Sharma, Krishna Mohan, Virendra Singh Nirban, McGraw Hill
3	Communication for Business, (2010) IVth edition, Shirley Taylor, V. Chandra, Pearson
4	Basic Business Communication-(2004). Lesikar I Flatley, McGraw Hill
5	Business Communication Today, (2017), Bovee, Thill and Chatterjee, Pearson

Direct Assessment

Tools	% Contribution of Assessment
End-semester Evaluation	100%

Mapping

Course Objective	Course Outcome				
	Module-1	Module-2	Module-3	Module-4	Module-5
1	H	H	H	H	H
2	M	M	H	H	M
3	M	H	L	H	H
4	H	H	H	M	H
5	H	H	H	H	H

COURSE INFORMATION SHEET

Course code: BH25312
Course title: Service Marketing
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Introduce the fundamental concepts of services and service marketing.
2.	Understand the differences between the marketing of goods and services.
3.	Analyze the extended marketing mix (7Ps) in the service context.
4.	Develop an understanding of service quality, customer satisfaction, and service recovery.
5.	Apply strategies for service delivery, relationship marketing, and service innovation in real-life business scenarios.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Explain the characteristics and classification of services and their implications in marketing.
CO2	Evaluate and apply the 7Ps of marketing in service industries.
CO3	Analyze consumer behavior and expectations in service encounters.
CO4	Design service delivery strategies, including service blueprinting and customer relationship management.
CO5	Apply service quality frameworks like SERVQUAL to assess and improve customer satisfaction.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Introduction to Services and Service Marketing Definition, nature, and characteristics of services (intangibility, inseparability, variability, perishability). Classification of services (based on degree of tangibility, people vs. possession processing). Growth of the service sector – global and Indian context. Differences between goods and services marketing. The Service Marketing Triangle. Customer expectations and perceptions of services.	8
Module 2: The 7Ps of Service Marketing Product (Service Design, Core & Augmented Services). Pricing strategies in services (Cost-based, Value-based, Competition-based). Place (Service distribution, Role of intermediaries, E-services). Promotion (Integrated marketing communication, Advertising, Personal selling). People (Employee behavior, Internal marketing, Service culture). Process (Service blueprinting, Standardization vs. customization). Physical evidence (Servicescapes, Tangibilizing the intangible).	8
Module 3: Consumer Behavior in Services Customer decision-making process in services. Factors influencing service purchase. Customer expectations and zone of tolerance. Customer satisfaction and delight. Managing customer relationships. Service encounters and the moment of truth.	8
Module 4: Managing Service Quality and Service Recovery Concept of service quality. SERVQUAL Model: Reliability, Assurance, Tangibles, Empathy, Responsiveness. GAP Model of service quality. Measuring service quality. Service failure and recovery strategies. Handling complaints and empowering front-line employees.	8
Module 5: Trends and Strategies in Service Marketing Role of technology in service delivery. Self-service technologies and automation. Managing demand and capacity in services. Relationship marketing in services. Ethics and sustainability in services. Innovations and challenges in the global service sector.	8

Textbooks:

1. Lovelock, C., & Wirtz, J. (2020). Services marketing: People, technology, strategy (8th ed.). Pearson Education.
2. Zeithaml, V. A., Bitner, M. J., Gremler, D. D., & Ajay, P. (2020). Services marketing: Integrating customer focus across the firm (7th ed., Indian edition). McGraw-Hill Education.
3. Hoffman, K. D., & Bateson, J. E. G. (2016). Services marketing: Concepts, strategies, & cases (5th ed.). Cengage Learning.

Reference Books:

1. Gronoos, Christian (2009), Service Management & Marketing Customer Management in Service Competition; Wiley India, 3rd Edition
2. Rao, K Rama Mohana (2011), Services Marketing; Pearson Education India, 2nd Edition

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure**Direct Assessment**

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	-	-	2	-	3	1	1	3	-	2	2	2			
CO2	-	-	2	-	3	1	1	3	-	2	3	2			
CO3	-	-	2	-	3	1	2	3	1	2	3	2			
CO4	-	-	2	-	3	1	2	3	1	3	3	2			
CO5	-	-	2	-	3	1	1	3	1	3	3	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25313
Course title: Customer Relationship Management
Pre-requisite(s): Nil
Co- requisite(s): Nil
Credits: 03
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth / Three
Branch: BHM
Name of Teacher: Praveen Srivastava

Course Objectives

This course enables the students:

A	To understand the organizational need, benefits and process of creating long-term value for individual customers
B	To understand the technological and human issues relating to implementation of Customer Relationship Management in the organizations
C	To apply the CRM and understand the advantages it provides.
D	To implement the CRM techniques and technology help to meet marketing, sales, and service goals throughout the customer life cycle stages.
E	To design customer relationship management strategies by understanding customers' preferences for the long-term sustainability of the Organizations.

Course Outcomes

After the completion of this course, students will be able to:

1.	Explain the meaning and application of CRM
2.	Elaborate on the benefits of CRM and CRM process
3.	Understand the importance of Consumer Behaviour
4.	Explain various CRM technological tools
5.	Implement CRM in Service industry

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Customer Relationship Management Introduction, Meaning and Definition of CRM, Importance of CRM, Concept and Growth of Relationship Marketing, Scope of Relationship Marketing, Relationship Pyramid, Dynamics of Customer Supplier Relationships, Concept of Lifetime Customer and Customer Loyalty, Benefits and difficulties of CRM.	8
Module 2 CRM Process Introduction, Customer Development Process, customer Retention, Customer satisfaction, Importance of customer retention, Customer Retention Strategies, Customer Lifetime Value, types of Relationship Management.	8
Module 3 Consumer Behaviour Defining Consumer behaviour, Nature and scope of consumer behaviour, Production concept, product concept, selling concept, marketing concept, societal marketing concept, customer concept, Holistic Marketing concept.	8
Module 4 Technological Tools for CRM and Implementation Data Mining for CRM, Changing Patterns of e-CRM Solutions in the Future; Organizational Framework for Deploying Customer Relationship; measuring profitability CRM implementation –set by step process.	8
Module 5 CRM in service Customer Relationship Management in service industry in India. Relevance of CRM for Hotel Industry; Supply-Demand Mismatches and their impact on CRM; The Past, Present and Future of CRM.	8

Textbooks:

1. Peelan, E. (2005). Customer Relationship Management. Pearson Education. ISBN: 978-0273681779.
2. Jagdish N Sheth, Parvatiyar Atul, G Shainesh, Customer Relationship Management: Emerging Concepts, Tools and Applications, 1st Edition, Tata McGraw Hill, June 2008

Reference books:

1. Ken, B. (2000). Customer Relationship Management: The Handbook of Key Customer Relationship Management. Prentice Hall. ISBN: 9780273650317
2. Greenberg, P. (2001). CRM at the speed of light: Capturing and keeping customers in Internet real time. Elsevier. ISBN: 0072127821
3. Judith W. Kincaid, Customer Relationship Management Getting It Right, Pearson Education
4. H.Peeru Mohamed , A Sagadevan, Custmer Relationship Management, A Step by Step Approach, Vikas Publishing House
5. Customer Centricity –Focus on right customer for strategic advantage, by Peter Fader, Wharton Digital Press, 2012

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus -N/A

Topics beyond syllabus/Advanced topics/Design -N/A

POs met through Topics beyond syllabus/Advanced topics/Design -N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Mid Sem Examination Marks	50
End Sem Examination Marks	25
Quiz	10
Assignment	10
Teacher's Assessment	5

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	-	-	2	-	3	1	1	3	-	2	2	2
2	-	-	2	-	3	1	1	3	-	2	3	2
3	-	-	2	-	3	1	2	3	1	2	3	2
4	-	-	2	-	3	1	2	3	1	3	3	2
5	-	-	2	-	3	1	1	3	1	3	3	2

Mapping Between COs and Course Delivery (CD) methods

CD	Course Delivery methods	Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8

CD4	Mini projects/Projects		CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids		CO5	CD1, CD8
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets			
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25314
Course title: Legal Aspects of Hospitality Management
Pre-requisite(s): NIL
Co-requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester/Level: Sixth/Three
Branch: BHM
Name of Teacher: AMIT SARAN

Course Objectives

This course envisions to impart to students to:

1.	Introduction of basic laws and legal sources related to hotel industry.
2.	Understand different laws of contract.
3.	Emphasize on law of legislation related to hotel establishment.
4.	Introduction of employment laws related to employees.
5.	Apply law of hygiene, sanitation and adulteration with consumer and environment protection.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Understand the definition of law and its implications.
CO2	Describe law of contract in various business sectors/industry.
CO3	Apply the principles of various laws of legislation in the hospitality industry.
CO4	Apply different employment related laws in industry.
CO5	Understand and explain consumer protection act related to Law of hygiene, sanitation and adulteration.

SYLLABUS

MOD ULE	(NO. OF LECTUR E HOURS)
Module 1: Introduction and legal sources <ul style="list-style-type: none">• What is Law?• Need for the knowledge of law• Sources of Indian Law• Classification of Law• List of license and permits required for operating hotel/restaurant.	8
Module 2: Law of contract <ul style="list-style-type: none">• Definition of contract• Nature and kind of contract• Essential of contract• Offer of contracts• Acceptance and consideration of contract.	8
Module 3: Law of legislation <ul style="list-style-type: none">• Hotel establishment act• Food legislation• Liquor legislation and information about basic licenses• Industrial legislation• Procedure for procurement, renewal, suspension and termination of license	8
Module 4: Employment laws <ul style="list-style-type: none">• Payment of wages act• Industrial dispute act,1947• Apprentice act,1961• Provident fund act,1952• Trade union act,1926	8
Module 5: Consumer and environment protection act <ul style="list-style-type: none">• Consumer protection act,1986• Food safety & standards authority of India (FSSAI)• Environment protection act,1986• Law of hygiene, sanitation and adulteration	8

Textbooks: Hotel Business Laws, Dr. Amit Saran
Hotel Law, Amitabh Devendra
Business Law, A singh,

Reference Books: Business Laws, B.K Goyal and K Jain
Legal aspects of business, A Pathak

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	1	2	1	1	1	2	2	1	1	2			
CO2	3	2	2	1	1	1	1	3	2	3	1	2			
CO3	3	2	2	2	2	2	2	3	3	3	2	2			
CO4	2	2	3	3	2	1	1	2	2	3	2	2			
CO5	3	3	3	2	2	3	2	3	2	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight(Low)

2: Moderate(Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25315
Course title: Introduction to AI in Hospitality
Pre-requisite(s): NIL
Co-requisite(s): NIL
Credits: 3 L: 3 T: P:
Class schedule per week: 03
Class: BHM
Semester/Level: Sixth/Three
Branch: BHM
Name of Teacher: Nishikant Kumar

Course Objectives

This course envisions to impart to students to:

1	Understand the fundamentals of AI and its relevance in the hospitality sector.
2	Explore various AI applications used in front-office, housekeeping, F&B, and marketing functions.
3	Analyse the impact of AI on guest experience, employee roles, and operational efficiency.
4	Evaluate ethical, legal, and cultural issues associated with AI in hospitality.
5	Apply AI concepts to solve hospitality business problems using Indian case studies.

Course Outcomes

After the completion of this course, students will be to:

1.	Define and explain key AI technologies relevant to hospitality.
2.	Identify AI-based tools used in different departments of a hotel/resort.
3.	Analyse the benefits and challenges of AI adoption in hospitality operations.
4.	Evaluate the ethical implications of AI in guest interactions and workforce dynamics.
5.	Develop innovative AI-driven solutions for hospitality-related problems.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to AI and Its Relevance in Hospitality Definition and evolution of AI, Types of AI: Narrow vs. General AI, AI technologies: Machine Learning, NLP, Computer Vision, Robotics, Role of AI in transforming the hospitality industry, AI adoption trends in Indian hospitality: Case of OYO, MakeMyTrip, etc., Benefits and limitations of AI in hospitality.	8
Module 2 AI Applications in Front Office and Guest Services Chatbots and virtual assistants for reservations and concierge services, AI-powered check-in/check-out kiosks, Facial recognition for guest identification and security, Personalized guest profiles and preferences, Predictive analytics for room pricing and occupancy. Case Study: Use of AI at Marriott Hotels, Taj Group, ITC Maurya or The Lalit Group.	8
Module 3 AI in Food & Beverage and Housekeeping Operations AI in menu personalization and recipe optimization, Smart kitchens and robotic food preparation, Demand forecasting for F&B inventory using AI, AI-enabled cleaning robots and maintenance scheduling, Waste reduction through AI monitoring systems. Case Study: AI use in Zomato, Swiggy/Uber Eats for delivery optimization.	8
Module 4 Marketing, Revenue Management, and CRM Using AI AI-Based Customer Segmentation, Dynamic pricing models and revenue optimization, AI in digital marketing: Targeted ads, SEO, social media analytics Sentiment analysis from online reviews and feedback, Chatbots for customer support and complaint resolution. Case Study: AI in Booking.com or Goibibo for price prediction.	8
Module 5 Ethical, Social, and Future Implications of AI in Hospitality Data privacy and GDPR compliance in AI systems, Job displacement vs. upskilling in the AI era, Bias in AI decision-making (e.g., pricing discrimination), Sustainable tourism and AI for energy optimization, Emerging trends: Virtual hotel tours, room previews, and destination marketing, AR-enabled concierge services, in-room entertainment, Concept of virtual hotels and resorts, AI voice assistants (e.g., Alexa for Hospitality, Google Assistant), Preparing for an AI-driven future in Indian hospitality.	8

Textbooks:

- Sharda, R., Delen, D., & Turban, E. (2020). Business Intelligence, Analytics, and Data Science: A Managerial Perspective. Pearson Education.
- Gretzel, U., Sigala, M., Xiang, Z., & Koo, C. (2019). Special Issue on Artificial Intelligence in Tourism and Hospitality. Journal of Travel Research.
- Kotler, P., & Keller, K. L. (2016). Marketing Management. Pearson Education.

Reference books:

1. Rajendran, S. (2021). Technology in Hospitality and Tourism. Himalaya Publishing House.
2. Reports from McKinsey, Deloitte, and World Economic Forum on AI in hospitality
3. Whitepapers from OYO, MakeMyTrip, Google Cloud AI for Hospitality

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	2	3	3	2	2	3	2	2	2	2	3			
CO2	2	3	2	2	2	1	2	2	2	2	2	2			
CO3	2	2	2	3	3	3	2	2	3	3	1	3			
CO4	1	3	1	2	2	2	1	1	2	3	2	2			
CO5	3	2	2	2	3	2	3	2	3	2	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25316
Course title: Personality Development Lab
Pre-requisite(s): NIL
Co-requisite(s): NIL
Credits: 1.5 L: T: P:3
Class schedule per week: 03
Class: BHM
Semester/Level: Sixth/Three
Branch: BHM
Name of Teacher: Nishikant Kumar

Course Objectives

This course envisions to impart to students to:

1	Develop self-awareness and emotional intelligence.
2	Improve verbal and non-verbal communication skills.
3	Enhance confidence through grooming, body language, and public speaking.
4	Understand the importance of ethics, values, and professionalism.
5	Apply personality development techniques in real-life situations.

Course Outcomes

After the completion of this course, students will be to:

1.	Demonstrate self-awareness and emotional regulation
2.	Communicate effectively in diverse settings
3.	Deliver confident and structured oral presentations
4.	Exhibit appropriate professional etiquette and image
5.	Apply values, ethics, and planning in personal and career development

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Self-Awareness and Emotional Intelligence Concept of self-image and self-esteem, Components of emotional intelligence (self-awareness, self-regulation, motivation, empathy, social skills), Managing stress and anxiety, Building confidence and positive thinking, Mindfulness and meditation techniques.	6
Module 2 Communication Skills Barriers to effective communication, Active listening and feedback techniques, Group discussion strategies and participation, Non-verbal communication: Body language, gestures, eye contact, Interpersonal communication and conflict resolution.	9
Module 3 Public Speaking and Presentation Skills Importance of public speaking in personal and professional life, Preparing and structuring a presentation, Voice modulation, diction, and articulation, Overcoming stage fear and nervous habits Using visual aids effectively.	9
Module 4 Etiquette, Grooming, and Professional Image Personal grooming standards Workplace dress code and cultural sensitivity, Digital etiquette: Email writing, phone manners, video calls, Body language in formal and informal settings, Cultural diversity and inclusive behavior.	6
Module 3 Values, Ethics, and Career Planning Role of values and ethics in personal and professional life, Time management and goal setting (SMART goals), Decision-making and problem-solving skills, Introduction to career planning and SWOT analysis, Resume preparation and interview skills.	6

Textbooks:

1. Rao, V.S.P. Personality Development and Soft Skills. Oxford University Press
2. Bhatia, Sangeeta. Soft Skills: An Activity-Based Approach. Pearson Education
3. Thakur, R.K. Communication Skills and Personality Development. Ramesh Publishing House

Reference books:

1. Kumar, Sanjay & Singh, Santosh. Personality Development and Value Education. PHI Learning
2. Sinha, Arun K. Personality Development: A Holistic Approach. Himalaya Publishing House

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab Quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	-	2	3	3	2	2	3	2	2	2	2	3			
CO2	-	-	-	-	-	3	-	-	3	2	3	2			
CO3	-	-	-	-	-	3	-	-	3	3	-	3			
CO4	-	-	-	-	-	2	-	-	3	3	3	2			
CO5	-	-	-	-	-	2	-	-	3	2	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods				
CD	Course Delivery methods		Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1, CO2 CO3, CO4 CO5	CD1, CD5, CD8
CD2	Tutorials/Assignments		CO2, CO3 CO5	CD9, CD5
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets			
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25317
Course title: International Cuisine
Pre-requisite(s): NIL
Co- requisite(s): International Cuisine Practical
Credits: 3 L:3 T:0 P: 0
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: PRATIMA EKKA

Course Objectives

This course envisions to impart to students to:

1.	Understand European cuisines.
2.	Understand Mediterranean cuisines.
3.	Understand Asian cuisines.
4.	Understand Caribbean cuisines.
5.	Understand Middle East cuisines.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Decipher the European cuisines on its merit.
CO2	Decipher the Mediterranean cuisines on its merit
CO3	Decipher the Asian cuisines on its merit
CO4	Decipher the Caribbean cuisines on its merit
CO5	Decipher the Middle East cuisines on its merit

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 European Cuisines Foods of Italy and France, United Kingdom	8
Module 2 Mediterranean Cuisines Foods of Spain, Portugal, Greece	8
Module 3 Asian Cuisine Foods of China, Japan, Thai	8
Module 4 Caribbean Cuisine Foods of South America, Caribbean Islands, central America- Mexico	8
Module 5 Middle East Cuisine Foods of Arab, Persia and Afghanistan	8

Textbooks:

1. P. S. Bali, *International Cuisine and Food Production Management*, Oxford University Press, New Delhi, 2012
2. Mc Williams, *Food around the world*, Pearson, 2012

Reference Books:

1. M Milona, *Culinaria Greece*, Culinaria Konemann, 2004
2. C Piras, *Culinaria Italy*, Culinaria Konemann, 2004
3. M Trutter, *Culinaria Spain*, Culinaria Konemann, 2004
4. C B Teichmann, *Europe Master Chefs*, Culinaria Konemann, 2004

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	2	2			2	2	2	3	3	3	3	2
CO2	3	3	3	2	2			2	2	2	3	3	3	3	2
CO3	3	3	3	2	2			2	2	2	3	3	3	3	2
CO4	3	3	3	2	2			2	2	2	3	3	3	3	2
CO5	3	3	3	2	2			2	2	2	3	3	3	3	2

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25318
Course title: Food and Beverage Control Management
Pre-requisite(s): NIL
Co- requisite(s): Food and Beverage Control Management Lab
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Provide with a comprehensive understanding of function catering.
2.	Understand the menu engineering process.
3.	Understand the importance of food control as an integral part of a hospitality operation.
4.	Understand the importance of beverage control as an integral part of a hospitality operation.
5.	Understand the importance of labour cost control as an integral part of a hospitality operation.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Plan and manage various catering functions, including formal and informal events
CO2	Design and analyze menu for food service establishments.
CO3	Apply the principles and concepts of food control system to typical decisions in food and beverage establishments.
CO4	Apply the principles and concepts of beverage control system to typical decisions in food and beverage establishments.
CO5	Apply the principles and concept of labour control as an integral part of a hospitality operation.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Function Catering Introduction, Types – Formal and Informal, Organisation of banquet dept., Duties and responsibilities, Sales and booking procedure, Banquet menu, Space requirement and sitting plan, Misce-en place, Service.	8
Module 2 Menu Management Introduction, Types of Menus, Menu Planning Considerations & Constraints, Menu Costing and Pricing, Menu Merchandising, Menu Engineering, Menu Fatigue, Menu as a In-House Marketing Tool.	8
Module 3 Food Control Food Purchasing Control, Food Receiving Control, Food Storing and Issuing Control, Food Production Control, Food Cost Control, Food Sales Control, Standard Yield, Standard Portion Sizes, Standard Recipes.	8
Module 4 Beverage Control Beverage Purchasing Control, Beverage Receiving Control, Beverage Storing and Issuing Control, Beverage Production Control, Beverage Cost Control, Beverage Sales Control.	8
Module 5 Labour Control Labour cost considerations, Types of compensations. Organizational plan, Job analysis, Forecasting and scheduling of Personnel, Standards of Performance, Payroll Analysis.	8

Textbooks:

1. Singaravelavan R. *Food & Beverage Services*, Oxford Publications, 2011
2. Food & Beverage Management- Sudhir Andrews, McGraw Hill Education
3. Davis B, Lockwood A, Stone S, Butterworth-Heinemann. *Food & Beverage Management*, Elsevier, 2012.

Reference books:

1. Lillicrap Dennis R., *Food & Beverage Service*, Hodder Arnold Publication, 2006.
2. Menu Engineering: A Practical Guide to Menu Analysis, Michael L. Kasavana, Donald I. Smith, Hospitality Pub
3. Management by Menu, Lendal H. Kotschevar, Diane Withrow, Wiley Publication

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	-	-	3	3	3	-	-	-	-	-			
CO2	3	3	3	2	3	3	3	3	3	2	2	1			
CO3	3	3	2	2	3	3	3	3	2	2	1	2			
CO4	3	3	2	2	3	3	3	3	2	2	1	2			
CO5	3	3	2	2	2	2	2	2	2	3	1	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25319
Course title: Accommodation Management-II
Pre-requisite(s): NIL
Co- requisite(s): Accommodation Management Practical-II
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: SANJIV KUMAR SRIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Understand the concept of Ecotel and criteria of its certification.
2.	Learn about the concept of ergonomics and its application in housekeeping.
3.	Introduce the concept of fibers (textiles) with their construction and characteristics.
4.	Understand the concept of soft furnishings and window treatment.
5.	Learn about budget preparation for the housekeeping department.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Explain the concept of Ecotel and criteria of its certification.
CO2	Apply the concept of ergonomics and its application in housekeeping.
CO3	Describe different types of fibers (textiles) and its construction.
CO4	Explain various types of soft furnishings and window treatment.
CO5	Conceptualize the budgeting process for the housekeeping department.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Ecotel Introduction, ecotel certification and its criteria, green building concept and its merits, Eco-friendly amenities. Energy conservation: Introduction, energy monitoring and tips for conservation. Water conservation: Concept, tips for conservation. Waste management: Reuse and recycle Environmentally friendly housekeeping	8
Module 2 Ergonomics in Housekeeping Introduction, Meaning, Principles, Ergonomics in Hotel housekeeping, Significance & need of ergonomics, Analysis of Risk factor in housekeeping: Ergonomics perspective, Mitigation of Risks in Housekeeping by applying ergonomics principles, Modifying the workplace layout and equipment, modifying way of lifting, modifying personal habits, controlling the work environment, redesigning work practice.	8
Module 3 Textiles Introduction of textile fibers: source based, length based, content based. Identification of fibers: Tactile & visual examination, microscopic analysis, chemical method, solubility test, burning test. Characteristics of textile fibers: Natural: vegetable, Animal & Manmade. Yarn: Types characteristics, Fabric construction: weaving, knitting, Netting, Braiding, Bonding.	8
Module 4 Soft furnishings and Window Treatment Introduction, functions of soft furnishings, Types of soft furnishings: Cushions, blankets, bedspreads, loose covers. Window treatments, Stiff window treatment: Blinds, types of blinds, Shades and types of shades, Shutters, Screens, Soft window treatment: Curtains: Functions, importance, types, Valances and swags.	8
Module 5 Budgeting for Housekeeping Introduction, Types of budgets: Capital, operating, master, departmental, fixed and flexible budget. Housekeeping expenses: operating and capital expenses. Budget planning process, Controlling expenses: operating expenses, cost control in specific areas. Inventory control & Stock taking: Stock taking, Establishing Par levels, Purchasing: principles, Stages in purchasing, Types of purchasing.	8

Textbooks:

1. S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGraw Hill, 2008.
2. G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd ed, New Delhi: Oxford university press, 2014.
3. S.K. Kaushal and S.N. Kaushal, *Accommodation Operation and Management*. 1st ed, New Delhi: Frank Bros. & Co, 2006.

Reference Books:

1. M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.
2. Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
3. Joan C. Branson and M. Lennox, *Hotel, Hostel & Hospital Housekeeping*. 5th ed, London: Hodder Arnold, 1988.
4. M. Kappa and A. Nitschke, *Managing House Keeping Operation*. 3rd ed, Lansing Mich: American Hotel and Lodging, Educational Institute, 2008.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcome s (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	2	3	2	2	2	1	2	2	3			
CO2	3	3	3	2	3	2	3	3	2	3	1	2			
CO3	3	3	3	2	3	1	2	3	3	3	3	3			
CO4	3	3	3	2	3	2	2	3	3	3	3	3			
CO5	3	3	2	2	3	3	1	3	3	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25320
Course title: Front Office Management - II
Pre-requisite(s): NIL
Co- requisite(s): Front Office Management Lab - II
Credits: 3 Cr. 3 L: 3 T: P:
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth /Three
Branch: BHM
Name of Teacher: Praveen Srivastava

Course Objectives

This course envisions to impart to students to:

1.	Understand the importance of quality service in Hotel.
2.	Explain the use of data in forecasting
3.	Understand the strategies for revenue generation
4.	Explain the importance of the Property Management System in Hotel.
5.	Understand various channels of distribution for hotel.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Create quality service in the Front Office department of a hotel.
CO2	Evaluate various historical, current, and future data to estimate room demand.
CO3	Develop various revenue management strategies for hotel.
CO4	Select a Property Management System for hotel.
CO5	Develop Distribution channel for the Hotel.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Quality service in Front office Lodging as a guest service business, developing a quality culture: Role of Manager in quality, determining guest service expectation, planning guest service process – recognizing basic concerns, determining guest service expectations, Delivering guest service through employees.	8
Module 2 Managing Forecast Data Tracking room demand: Computation of occupancy forecast, No Shows, early departure, Overstay, use of current and future data. Predictive data sources: Internal Data & External Data. Managing occupancy forecast report – pick up report, ten-day forecast, extended forecast, Other forecast issues – impact on pricing and Evaluation of effectiveness.	8
Module 3 Revenue Management Room rate management, room rate economics – rate types, rate determination, revenue management tool, revenue management essentials. Traditional pricing strategy, web-based pricing strategy, Yield Management – Implementation and Techniques.	8
Module 4 Front office Property Management System Four R's of Front office information management – Reservation Management, Rooms Management, Revenue Management, Record and Account management, PMS report development, distribution and analysis.	8
Module 5 Distribution Channel Management Overview of distribution channels- brief history of distribution channels, use of intermediaries, current distribution channels. Management of distribution channels – walk in guest, Group sales department, Global Distribution system, Central reservation system, Internet, Telephone, Fax etc. challenges of distribution channel management.	8

Textbooks:

1. Robert H Woods, Jack D Ninemeier, *Professional Front office Management*, Pearson, 2006.

Reference Books:

1. Colin Dix & Chirs Baird, *Front office operations*, Pearson, 2006.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	2	2	2	2	1	3	2	1	1	2	3	3	1
CO2	2	2	2	1	2	2	3	2	1		1	2	2	1	2
CO3	2	2	2	1	2	2	3	2	1		1	2	2	1	2
CO4	2	2	2	3	2	2	2	2	3	1	1	3	2	3	2
CO5	1	2	3	1	3	2	1		1	2	1	2	2	2	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8, CD2
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25321
Course title: International Cuisine Practical
Pre-requisite(s): NIL
Co- requisite(s): International Cuisine
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: Pratima Ekka

Course Objectives

This course envisions to impart to students to:

1.	Understand European cooking and preparations.
2.	Understand Mediterranean cooking and preparations
3.	Understand Asian cooking and preparations
4.	Understand Caribbean cooking and preparations
5.	Understand Middle East Cuisine cooking and preparations

Course Outcomes

After the completion of this course, students will be able to:

CO1	Prepare the European cuisine on its merit.
CO2	Prepare the Mediterranean cuisine on its merit.
CO3	Prepare the Asian cuisine on its merit.
CO4	Prepare the Caribbean cuisine on its merit.
CO5	Prepare the Middle East cuisine on its merit.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 European Cuisines Foods of Italy and United Kingdom, France	9
Module 2 Mediterranean Cuisines Foods of Spain, Greece, Turkey	9
Module 3 Asian Cuisine Foods of China, Japan, Thai	9
Module 4 Caribbean Cuisine Foods of South America, Caribbean Islands, central America- Mexico	9
Module 5 Middle East Cuisine Foods of Arab, Persia and Afghanistan	9

Textbooks:

1. D.D., Mary, *Cooking Essentials for the New Professional Chef*. John Wiley and Sons, 1997.
2. Parvinder S Bali, *Food Production Operations*. Oxford University Press, 2014.
3. Philip E. Thangam, *Modern Cookery (Vol- I)*, Orient Longman, 1946.
4. R. Kinton & V. Cessarani, *Foundation Practical Cookery*, Hodder Education, 2009.
5. R.J. Kauffman & H. Cracknell, *Practical Professional Cookery*, Thomson, 1999.

Reference Books:

The Theory of Catering- FOSKETT, D., and CESARANI, V ,Book Power Hodder
Theory of Cookery ARORA, K Frank Bros. & Co. Ltd.
Professional Cooking. GISSLEN, W., John Wiley & Sons INC.
La Rousse Gastronomie MONTAGNE, P. Hamlyn Octopus publishing group
Modern Cookery I & II PHILIP, E Orient Longman 2009
Classical cooking the modern way. Pauli, E. (1989a).
The book of ingredients. Van Nostrand Reinhold. Gringson, J. (1967)

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Day to Day Progressive Evaluation	30
Lab viva	20
End Sem Viva	30

Indirect Assessment

- 1. Student Feedback on Faculty**
2. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	3	1	3		2		2	1	2	3	3	2
CO2	3	3	3	3	3	3		3	3	2	1	3	3	3	1
CO3	3	3	3	2	2	3		2		2	1	3	3	3	1
CO4	3	3	3	3	3	3	2	3	3	2	1	3	3	3	1
CO5	3	3	3	3	2	3		2	3	2	1	3	3	3	1

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8, CD1
CD2	Tutorials/Assignments	CO2	CD5, CD8, CD1
CD3	Seminars	CO3	CD5, CD8, CD1
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25322
Course title: Food and Beverage Control Management Lab
Pre-requisite(s): NIL
Co- requisite(s): Food and Beverage Control Management
Credits: 1.5 L:0 T: 0 P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: DR. ABHISEK JANA

Course Objectives

This course envisions to impart to students to:

1.	Learn the skill of setting up the table for restaurant.
2.	Gain an in-depth understanding of menu engineering.
3.	Understand the principles and procedures of formal banquet catering
4.	Learn the practical ability to organize various types of events.
5.	Effectively communicate with the guests.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Demonstrate practical ability to set up various types of restaurants in a professional manner for service.
CO2	Design and analyze menu for food service establishments.
CO3	Efficiently managing banquet bookings, coordinating formal banquet services, and delivering high-quality catering experiences
CO4	Organize various types of Indian theme parties, cocktail parties and food festivals.
CO5	Apply social and communication skills in order to respond to the needs of the guests.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Set up a table with Prepared Menu with wines.	6
Module 2 Menu Designing, Planning, Costing, Engineering.	6
Module 3 Function Catering: Taking Banquet Booking; Formal Banquet Service	6
Module 4 Indian themes and food festivals, Cocktail parties.	6
Module 5 Social Skills & handling guest complaints.	6

Textbooks:

3. Singaravelavan R. *Food & Beverage Services*, Oxford Publications, 2011
4. Food & Beverage Management- Sudhir Andrews, McGraw Hill Education
5. Davis B, Lockwood A, Stone S, Butterworth-Heinemann. Food & Beverage Management, Elsevier, 2012.

Reference books:

4. Lillicrap Dennis R., *Food & Beverage Service*, Hodder Arnold Publication, 2006.
5. Menu Engineering: A Practical Guide to Menu Analysis, Michael L. Kasavana, Donald I. Smith, Hospitality Pub
6. Management by Menu, Lendal H. Kotschevar, Diane Withrow, Wiley Publication Hill Education. Second Edition.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	1	3	1	-	2	2	1	2	3			
CO2	3	3	3	2	3	3	3	3	3	2	-	3			
CO3	3	-	1	-	3	-	-	2	3	-	1	-			
CO4	3	3	3	3	2	3	2	2	2	2	2	3			
CO5	3	3	3	1	2	3	-	2	1	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8. CD9
CD2	Tutorials/Assignments	CO2	CD5, CD8
CD3	Seminars	CO3	CD5, CD8
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25323
Course title: Accommodation Management Lab - II
Pre-requisite(s): NIL
Co- requisite(s): Accommodation Management - II
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/Three
Branch: BHM
Name of Teacher: SANJIV KUMAR SIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Understand various types of complaints and reports maintained at control desk.
2.	Learn about principles of ergonomics.
3.	Understand various types of fabrics and their characteristics.
4.	Learn about determining staff strength and criteria for staff selection.
5.	Develop knowledge about preparing housekeeping budget.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Deal various types of complaints and maintain records from control desk.
CO2	Apply the principles of ergonomics in housekeeping.
CO3	Identify various types of fabrics.
CO4	Plan staff strength and design eligibility criteria.
CO5	Conceptualize housekeeping budget preparation.

SYLLABUS

MODULE	(NO.OF PRACTICAL HOURS)
Module 1 Control Desk Management Lab 1. Complaints handling procedure. Lab 2. Filling up forms used in control desks.	6
Module 2 Ergonomics in Housekeeping Lab 3. Designing a questionnaire for hotel housekeepers to analyze workplace pain and hazards. Lab 4. Applications of ergonomic principles applied in housekeeping.	6
Module 3 Textile Identification Lab 5. Tactile and visual examination. Lab 6. Conducting a burning test for identification of fibers.	6
Module 4 Managing Housekeeping Personnel Lab 7. Determining Staff strength in housekeeping. Lab 8. Designing Job description and Job specification for housekeeping staffs.	6
Module 5 Budgeting Lab 9. Identifying housekeeping expenses. Lab 10. Preparing operational budget. Lab 11. Preparing Capital budget.	9

Textbooks:

1. S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGraw Hill, 2008.
2. G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd ed, New Delhi: Oxford university press, 2014.
3. S.K. Kaushal and S.N. Kaushal, *Accommodation Operation and Management*. 1st ed, New Delhi: Frank Bros. & Co, 2006

Reference books:

1. M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.
2. Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
3. Joan C. Branson and M. Lennox, *Hotel, Hostel & Hospital Housekeeping*. 5th ed, London: Hodder Arnold, 1988.
4. M. Kappa and A. Nitschke, *Managing House Keeping Operation*. 3rd ed, Lansing Mich: American Hotel and Lodging, Educational Institute, 2008

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment –

3. Student's Feedback on Course Outcome

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	1	2	1	3	2	3	2	2	3			
CO2	3	3	3	2	2	3	2	2	3	2	1	3			
CO3	3	3	3	2	2	2	3	2	3	1	1	3			
CO4	3	3	3	2	3	1	1	3	2	3	2	3			
CO5	3	3	2	3	2	3	2	2	2	1	2	3			

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO 1	CD5, CD8
CD2	Tutorials/Assignments	CO 2	CD5, CD8
CD3	Seminars	CO 3	CD5, CD8
CD4	Mini projects/Projects	CO 4	CD5, CD8
CD5	Laboratory experiments/teaching aids	CO 5	CD5, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25324
Course title: Front Office Management Lab - II
Pre-requisite(s): NIL
Co- requisite(s): Front Office Management - II
Credits: 1.5 L: T: P: 3
Class schedule per week: 03
Class: BHM
Semester / Level: Sixth/ Three
Branch: BHM
Name of Teacher: Praveen Srivastava

Course Objectives

This course envisions to impart to students to:

1.	Understand the importance of quality service in Hotel.
2.	Explain the use of data in forecasting
3.	Understand the strategies for revenue generation
4.	Explain the importance of the Property Management System in Hotel.
5.	Understand various situations which may arise during hotel operation.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Demonstrate guest service delivery.
CO2	Compute Occupancy percentages.
CO3	Develop Room Rate using different approach.
CO4	Demonstrate PMS application for various Front Office Functions.
CO5	Handle various situations arising in day-to-day operation of hotel.

SYLLABUS

MODULE	(NO. OF PRACTICAL HOURS)
Module 1 Quality Service in Front office Role play of planning guest service for quality service. Role play of delivering guest service through employees.	6
Module 2 Computation of occupancy forecast Computation of occupancy forecast percentage. Computation of availability forecast percentage.	6
Module 3 Revenue Management Computation of room rate by applying Hubbart Formula. Computation of room rate by 1 per 1000 approach	6
Module 4 Front office Property Management System PMS Lab for reservation management. PMS Lab for room management. PMS Lab for revenue management PMS Lab for account management.	12
Module 5 Case Studies Case Studies. Situation handling	6

Textbooks:

1. Kasavana & Brooks, *Managing Front Office Operations*, AHL&A, 2001

Reference Books:

1. Colin Dix & Chirs Baird, *Front office operations*, Pearson, 2006.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Lab quiz I	10
Lab Quiz II	10
Lab Viva	20
Progressive Evaluation	30
End Semester Evaluation	30

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	2	2	2	2	1	3	2	1	1	2	3	3	1
CO2	2	2	2	1	2	2	3	2	1		1	2	2	1	2
CO3	2	2	2	1	2	2	3	2	1		1	2	2	1	2
CO4	2	2	2	3	2	2	2	2	3	1	1	3	2	3	2
CO5	2	2	2	1	1	2		3	1	1		2	3	3	1

Correlation Levels 1, 2 or 3 as defined below:

- 1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD5, CD8, CD9
CD2	Tutorials/Assignments	CO2	CD5, CD8
CD3	Seminars	CO3	CD5, CD8
CD4	Mini Projects/Projects	CO4	CD5, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD5, CD8, CD9
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

4th Year Syllabus and Course Information Sheet

COURSE INFORMATION SHEET

Course code: BH25401
Course title: Research Methodology
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: P:
Class schedule per week: 03
Class: BHM
Semester / Level: Seventh/Four
Branch: BHM
Name of Teacher: Gautam Shandilya

Course Objectives

This course enables the students:

A.	To know the concept of research scope, procedure, and application.
B.	To understand different research design and data collection methods.
C.	To understand different sampling design.
D.	To understand data.
E.	To know the style of report writing.

Course Outcomes

After the completion of this course, students will be able to:

1.	Outline the concept meaning of research scope, procedure and application.
2.	Describe different research design and data collection methods.
3.	Illustrate and examine different sampling design.
4.	Analyse and interpret data.
5	Reproduce the concept of report writing and referencing styles.

Syllabus

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to Research Methods Definition and Objectives of Research, Types of Research; Research Purposes, Various Steps in Research, Research Design - Survey Research - Case Study Research, Scientific Methods, Hypotheses Generation and Evaluation.	11
Module 2 Data Collection and Sampling Design Sources of Data: Primary Data, types, Secondary Data; Questionnaire- Survey and Experiments – Design of Survey and Experiments – Measurement and Scaling, commonly used scales in business research, Reliability and Validity of scales.	5
Module 3 Sampling Rationale, characteristics- meaning, concept of population and sample, and utility. Types of sampling and generalizability of results. Probability sampling- simple random sample, systematic random sample, stratified random sampling etc. random and non-random samples, random numbers and use. Non-probability sampling- purposive samples, incidental samples, quota samples, snowball samples. General consideration in determination of sample size. Sampling distribution and Errors.	8
Module 4 Statistical Modelling and Analysis Data analysis: Editing, Coding, transformation of data, Basic data analysis, setting of hypotheses, hypothesis testing, Hypothesis: Null hypothesis and alternative hypothesis, Testing of hypothesis, Type I and Type II errors. Test of Significance: Small sample tests: Student 's t-test, Paired t-test, Fisher's t-test, Large sample test: Z test, Goodness of fit and test of association. Non-parametric tests: Sign test, Wilcoxon signed rank test, Run test, Man- Whitney U test (concept only).	12
Module 5 Report Writing Structure and components of research report, different referencing style, mechanism of writing a research report.	4

Textbooks:

1. C.R. Kothari, Research Methodology Methods and Techniques, Vishwa Prakashan, 2006.
2. Deepak Chawla, Research Methodology: Concepts and Cases: Concepts & Cases
3. Jenkins, G.M., and Watts, D.G., Spectral Analysis and its Applications, Holden Day, 1986.

Reference books:

1. Richard I Levin amp; David S.Rubin, Statistics for Management, Pearson Education, 2005.
2. Donald R. Cooper, Pamela S. Schindler, Business Research Methods, Tata McGraw-Hill Co. Ltd., 2006.

Gaps in the syllabus (to meet Industry/Profession requirements): - Nil

POs met through Gaps in the Syllabus: - N/A

Topics beyond syllabus/Advanced topics/Design: - N/A

POs met through Topics beyond syllabus/Advanced topics/Design: - N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Mid Sem Examination Marks	25
End Sem Examination Marks	50
Quiz	10
Assignment	10
Teacher's Assessment	5

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	3	1	3	3	3	1	1	3	2	2	3	3
2	2	1	1	1	2	1	1	2	1	2	3	1
3	3	3	3	3	1	3	3	1	1	1	3	3
4	3	3	3	3	3	3	3	1	1	1	3	1
5	3	1	3	3	3	2	1	2	2	3	3	3

Mapping Between COs and Course Delivery (CD) methods

CD	Course Delivery methods		Course Outcome	Course Delivery Method

CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1, CO2, CO3, CO4, CO5	CD1
CD2	Tutorials/Assignments		CO1, CO2, CO3,	CD2
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets		CO1, CO2, CO3, CO4, CO5	CD8
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25402

Course title: Financial management

Pre-requisite(s): NIL

Co- requisite(s): NIL

Credits: 3 L:3 T: P:

Class schedule per week: 03

Class: BHM

Semester / Level: Seventh/Four

Branch: BHM

Name of Teacher: Shelly Srivastava

COURSE OBJECTIVE:

This course enables the students:

1.	To give the knowledge of meaning, definition and scope of financial management.
2.	To provide the basic concepts and understanding of financial management. To develop the Understanding of financial statement analysis through the different analysis tools,
3.	To state and explain the concepts and types of working capital.
4.	To give the concept of time value of money and application in decision making process.
5.	To explain the meaning of capital structure and capitalization theory and management of earnings.

COURSE OUTCOME:

After the completion of this course, students will be able to:

1.	Appraise the area of financial management and its scope,
2.	Analyze how funds are determined and explain the different techniques and tools of financial statement analysis,
3.	Calculate and solve the required fund for working capital,
4.	Illustrate the time value of money concept and can apply in decision making process of investments,
5.	Handle the problems related to finance and solve the problem of management.

Syllabus

MODULE	(NO. OF LECTURE HOURS)
Module 1 Nature of Financial Management Scope of Finance & Financial Management, Finance Functions of Finance Department.	6
Module 2 Analysis of Financial Statements Fund Flow Statement (definition of funds, purpose of preparation, simple numerical exercises) Cash Flow Statement (purpose of preparation, simple numerical exercises), Ratio Analysis (purpose of preparation, types of ratios and their implications for business, simple numerical exercises)	9
Module 3 Working Capital Management Concept of Working Capital, Characteristics of Current Assets, Factors Influencing Working Capital Requirements, Level of Current Assets (Permanent & Variable Working Capital), Financing of Current Assets, Operating Cycle/ Cash Conversion Cycle, Simple Numerical Exercises	6
Module 4 Concept of Value & Return and Capital Budgeting Decisions: Future Value & Present Value of Single Amount, Annuity. Meaning and Importance of Investment Decisions, Types of Investment Decisions, Techniques for Evaluating Investment Proposals (Discounted Cash Flow Methods-NPV, PI, IRR; Non-Discounted Cash Flow Methods- Payback Period, ARR) Simple numerical exercises.	12
Module 5 Financing Decisions Meaning & Importance of Capital Structure, Factors affecting Capital Structure Capitalization (Meaning, Theories of Capitalization, Over & under Capitalization), Leverage. Dividend Policy Decision: Reason for Paying Dividends, Considerations of Dividend Policy, Stability of Dividends, Forms of Dividends.	9

Textbooks:

1. Chandra, P Financial Management-Theory and Practices, (Tata McgrawHill :New Delhi)
2. Pandey, I.M. Financial Management, (Vikas : New Delhi)
3. Khan, M.Y. Financial Management,(Tata Mcgraw Hill : New Delhi)
4. Reddy, G. Sudarsana Financial Management- Principles and Practice (Himalaya Publishing House)

Ref. Books:

1. Van Horne Financial Management &Policy, (Pearson Education Asia)
2. Vyuptakesh Sharan, Fundamentals of Financial Management, (Pearson Education)

Gaps in the syllabus (to meet industry/Profession requirements)

POs met through Gaps in the Syllabus

Topics beyond syllabus/Advanced topics/Design**POs met through Topics beyond syllabus/Advanced topics/Design****Course Outcome (CO) Attainment Assessment tools & Evaluation procedure:****Direct Assessment:**

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Sem Examination Marks	25
Assignment	10
End Sem Examination	50
Teacher's Assessment	05

Indirect Assessment:

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping Between COs and Course Delivery (CD) methods			
CD	Course Delivery Methods	Course outcome	Course Delivery Methods
D 1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1
D2	Tutorials/Assignments	CO2	CD1, CD2,CD5
D3	Seminars	CO3	CD1,CD2,CD 5
D4	Mini projects/Projects	CO3,C O4	CD1,CD2
D5	Laboratory experiments/teaching aids	CO5	CD1
D6	Industrial/guest lectures		
D7	Industrial visits/in-plant training		
D8	Self- learning such as use of NPTEL materials and internets		
D9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25403
Course title: Hotel Entrepreneurship
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Seventh/Four
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	To introduce to the fundamentals of hospitality entrepreneurship and help them identify emerging opportunities in the Indian and global hotel sector.
2.	To conduct effective market research and develop an innovative hotel concept tailored to specific customer segments.
3.	To equip with financial tools and frameworks to evaluate the viability of a hospitality venture.
4.	To familiarize with the legal, compliance, and risk management requirements for setting up and operating a hotel business in India.
5.	Scale hospitality ventures sustainably and understand potential exit options.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify and assess viable hotel start-up opportunities using entrepreneurial frameworks and hospitality market trends.
CO2	Develop a customer-validated lodging concept using guest personas, demand analysis, and competitive benchmarking.
CO3	Prepare a basic financial feasibility report, including revenue projections, cost estimates, and ROI indicators for a proposed hotel.
CO4	Identify and compile the legal and regulatory licenses needed for launching a hospitality venture and suggest risk mitigation strategies.
CO5	Design a scale-up strategy and evaluate possible exit routes (franchising, IPO, M&A) for a hotel enterprise.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1: Entrepreneurial Landscape in Hospitality Evolution of hotels & emergent lodging formats; Indian start-up ecosystem, GST, FDI & tourism policy; Opportunity recognition frameworks (Blue Ocean, effectuation); Entrepreneurial mindset & design thinking warm-ups	8
Module 2: Market Research & Concept Development Segmentation & positioning for lodging ventures; Tech-driven guest experience (AI, IoT, sustainability); Demand forecasting tools, RevPAR break-even models; Critical path of concept testing: prototyping, MVP, pilot pop-ups	8
Module 3: Feasibility & Financial Planning Site selection metrics, hotel asset-light vs asset-heavy models; CAPEX/OPEX mapping; GOP, EBITDA, NPV, IRR; Capital sourcing: term loans, venture capital, angel networks, SIDBI, tourism subsidies; Franchise & management contracts—fee structures & term sheets	8
Module 4: Legal, Regulatory & Risk Management Company formation types (OPC, LLP, Pvt Ltd) & their tax implications; Licensing: FSSAI, Pollution, Fire NOC, BAR, FCRA, local municipal laws; Labor codes, OSH, WH&S, POSH compliance; Risk mitigation—insurance, force majeure, data privacy, cyber-security	8
Module 5: Operations Scale-Up & Exit Strategies Growth levers: franchising, leasing, management contracts, digital distribution, loyalty ecosystems; Scaling culture & talent—ESOPs, service quality DNA, agile SOPs; Performance dashboards—KPIs & OKRs for start-ups; ESOP buy-backs, IPOs, M&A, strategic alliances; ethics & sustainability legacy	8

Textbooks:

1. Thomas, R. *Small firms in tourism*. Routledge, 2013.
2. Walker, J. R. *The restaurant: from concept to operation*. John Wiley & Sons, 2021.

Reference Books:

1. Khanka, S. S. *Entrepreneurial development*. S. Chand Publishing, 2006.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment:

3. Student Feedback on Faculty
4. Student Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	1	1	1	1	1	1	1	1	2	2			
CO2	3	2	3	1	1	2	1	1	1	2	1	2			
CO3	3	2	1	2	3	2	1	1	1	1	3	1			
CO4	2	1	1	1	1	1	1	3	3	1	2	1			
CO5	1	3	3	1	2	1	1	1	1	2	3	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25404
Course title: Facility Management
Pre-requisite(s): NIL
Co-requisite(s): NIL
Credits: 2 L: 2 T: P:
Class schedule per week: 02
Class: BHM
Semester/Level: Seventh/Four
Branch: BHM
Name of Teacher: Nishikant Kumar

Course Objectives

This course envisions to impart to students to:

1	Understand the concept, scope, and importance of facility management in Indian context.
2	Understand the principles of space planning, maintenance, and safety protocols in managing facilities.
3	Analyse operations, outsourcing strategies, and vendor management in facility systems.
4	Evaluate sustainability practices, energy efficiency, and environmental impact in FM.
5	Design integrated facility management systems using technology and innovation.

Course Outcomes

After the completion of this course, students will be to:

1.	Understand the fundamental concepts and evolving role of facility management in India.
2.	Apply space planning techniques and ergonomic principles in facility design.
3.	Analyse maintenance strategies, SLAs, and vendor performance in FM operations.
4.	Evaluate sustainability initiatives and safety protocols in facility management.
5.	Develop innovative solutions using technology and software tools for efficient FM.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to Facility Management Definition, meaning, and scope of Facility Management (FM), Functions and responsibilities of a facility manager, Types of facilities: Commercial, residential, healthcare, educational, industrial, Role of facility management in Indian real estate and corporate sectors, Key stakeholders: Clients, vendors, contractors, regulatory bodies, Trends in Indian FM industry: Outsourcing, smart buildings, sustainability.	6
Module 2 Planning and Space Management Principles of space planning and utilization, Facility layout design and ergonomics, Space allocation policies and occupancy planning, Workplace design: Open office, modular, hybrid models Use of CAD/BIM tools in layout planning. Case study: Office layout redesign in an MNC in India.	6
Module 3 Operations and Maintenance Preventive vs. corrective maintenance, Service Level Agreements (SLAs): Definition, negotiation, monitoring, Vendor selection and performance evaluation, Contract management and procurement process Common issues in Indian FM operations: Power backup, water supply, waste disposal, Role of facility manager in crisis management (e.g., fire, natural disasters).	6
Module 4 Sustainability and Safety Concept of green buildings and LEED certification in India, Energy conservation measures: Lighting, HVAC, solar power, Waste management and recycling in large facilities, Occupational Health and Safety (OHS) standards, Fire safety norms and disaster preparedness as per NFPA and local laws, Environmental compliance under MoEF and pollution control boards.	6
Module 5 Technology and Innovation in FM Introduction to Facility Management Software (Cafm, IBM Maximo, etc.), Building Information Modeling (BIM) and its role in FM, Internet of Things (IoT), AI, and Smart building systems, Mobile apps and dashboards for real-time monitoring, Digital transformation in Indian FM sector, Future trends: Predictive maintenance, drones, digital twins.	6

Textbooks:

1. Jones, Peter & Lockwood, Alan – Facilities and Property Management , Cengage Learning
2. Smith, Diane – Facility Management: Principles and Practices , CRC Press
3. Singh, R.K. – Facility Management in India: Concepts and Applications

Reference books:

1. Dewhurst, F.M. & Bewer, A.F.B. – Facilities Management: Theory and Practice , Pearson Education

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment

1. Student's Feedback on Course Outcome.

Mapping of Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	2	3	3	2	2	3	2	2	2	2	3			
CO2	2	3	2	2	3	1	2	2	1	2	3	2			
CO3	3	2	3	3	3	3	2	2	3	3	1	3			
CO4	2	3	2	1	2	2	2	1	2	3	3	2			
CO5	3	2	2	2	3	2	3	3	3	2	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH24405
Course title: Human Resource Management
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L: 3 T: P:

Class schedule per week: 03
Class: BHM
Semester / Level: Seventh/Four
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	To cultivate the right approach towards human resources, and their role in business.
2.	To develop the right understanding regarding various sources of acquiring human resources and their role and utility in business.
3.	To develop basic skills in human resource management.
4.	To understand basics of recent concepts in HRM.
5.	To understand basic business operations in the HRM department.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Remembering the traditional, modern, role of HR manager.
CO2	Understand the sources of acquiring human resources.
CO3	Identify the skills of HR Manager.
CO4	Analyzing the difference between Personnel and HRM.
CO5	Evaluate career planning process.

SYLLABUS

MODULE	(NO.OF LECTURE HOURS)
Module 1 Introduction to HRM Meaning, Definition, Features, Scope, Objectives, Importance, Principles of HRM, Evolution of HRM, Functions of HRM, Challenges of HRM, Role of HR Manager, Difference between HRM& Personnel Management.	8
Module 2 Human Resource Planning Job Analysis- Meaning, Definition, Objectives, Benefits, Methods, Job Analysis Components- Job Description, Job Specification, Job Evaluation Human Resource Planning (HRP)- Meaning, Definition, Objectives, Process, Factors Influencing the Estimation of Human Resource in Organization, Advantages & Limitations/Barriers of HRP. Caselets on Job Analysis & Human Resource Planning.	10
Module 3 HRM in Changing Environment Career Planning- Meaning, Definition, Objectives, Process, Benefits and Stages. Employee Morale & Job Satisfaction Employee Morale- Meaning, Definition, causes of low Morale, Job Satisfaction- Meaning, Definition, Factors contributing to Job Satisfaction, Measures to increase Job Satisfaction, Advantages of Job Satisfaction Caselets on Career Planning, Employee Morale & Job Satisfaction.	8
Module 4 Personnel and HRM Difference between Personnel and HRM, Maintenance and Integration Functions: Administration of welfare, amenities & fringe benefits, safety & accident prevention work, environment fatigue safety, accident prevention. Employee grievances and their redressal, suggestion schemes, administration of discipline.	8
Module 5 Trends in HRM Work force Diversity, Technological Changes & HRM, International HRM, E-Human Resource Management, Human Resource Information System (HRIS), HRM in Virtual Organizations, Work from Home, Out-Sourcing, Changing Role of HRM.	6

Textbooks:

1. Human Resource Management. L. M. Prasad, Sultan Chand & Company Ltd.
2. Human Resource Management, K. Ashwathappa, Tata McGraw Hill.
3. Personnel Management, C. B. Mamoria , Himalaya Publishing House Mumbai.

Reference books:

1. Personnel Human Resource Management, A. M. Sharma, Himalaya Publishing House Mumbai.
2. Human Resources and Organizational Behavior, Dr. M. Waghmare, Thakur Publication.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure**Direct Assessment**

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	05
End Semester Examination	50

Indirect Assessment –

2. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	2		3	1	1	1	1	2	3	2	3	2	3
CO2	3	3	2		3	3	1	1	1	2	1	2	3	3	3
CO3	3	3	3	2	3	2	1	2	3	3	3	3	2	3	3
CO4	3	2	2	1	2	1			2	3	2	2	3	1	1
CO5	3	3	2	1	3	3	2	1	2	2	2	2	3	2	2

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini projects/Projects	CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25406
Course title: Field Work and Workshop
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 6 L: T: 0 P: 18

Class schedule per week: 02
Class: BHM
Semester / Level: Seventh/Four
Branch: BHM
Name of Teacher: GAUTAM SHANDILYA

Course Objectives

This course envisions to impart to students to:

1.	To equip with the knowledge and practical skills required to conceptualize, plan, and execute professional events from start to finish.
2.	To get trained in applying effective sales, marketing, and promotional strategies tailored to hospitality and event industries.
3.	To get familiarized with procurement processes, vendor relations, and purchasing strategies relevant to event operations.
4.	To develop understanding of design elements and hands-on skills in theming and decorating event venues.
5.	To encourage critical evaluation of event outcomes through data collection, guest feedback, and performance analysis.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Develop, plan, and execute live events in a professional setting.
CO2	Apply sales, marketing, and promotional strategies to attract guests and sponsors.
CO3	Conduct purchasing and vendor management effectively for event requirements.
CO4	Design aesthetically pleasing event spaces using appropriate decoration techniques.
CO5	Analyze the impact of event execution on guest satisfaction and profitability.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Introduction to Event Management – Types of events, objectives, stakeholders. Workshop on brainstorming event themes. Event Planning Process – Timeline creation, resource allocation, team roles. Students prepare project proposal. Venue Selection & Site Inspection – Layout planning, logistics, risk analysis. Practical: Conduct mock site visits.	6
Module 2 Budgeting and Cost Control – Estimating revenue and expenses. Create budgets using Excel/ERP. Purchasing and Vendor Management – Procurement planning, negotiations, supplier evaluation. Visit to the market/vendors. Licensing & Legal Aspects – Permissions, government regulations, contracts, insurance. Sponsorship Management – Identifying sponsors, preparing proposals, negotiation skills. Students prepare a sponsorship deck. Sales & Marketing Strategies – Target audience, digital marketing, media promotions, branding. Run simulated promotional campaigns.	10
Module 3 Decoration & Theming – Visual design principles, floral decoration, props, lighting, signage. Hands-on session with decorators. Food & Beverage Planning for Events – Menu design, catering coordination, service setup. Coordinate with the college kitchen. Manpower Planning and Training – Staffing, volunteer management, scheduling, briefing. Role-play and SOP writing.	6
Module 4 Guest Management – Invitations, RSVPs, registration desk setup, VIP protocol. Rehearsals & Dry Runs – Walkthrough of event flow, AV checks, technical setup. Live Event Execution – Each group conducts their event. Faculty and peers evaluate performance. Crisis and Risk Management – Security, first aid, emergency planning. Drill session and simulations.	8
Module 5 Post-Event Evaluation – Feedback collection, reporting, financial reconciliation. Students submit event reports. Case Studies & Industry Interaction – Guest lectures from event professionals. Discussion of real-world case studies. Final Presentations & Viva – Event portfolio presentation, reflective learning report, oral examination.	6

Textbooks:

1. Goldblatt, J. *Special events: A new generation and the next frontier*. Vol. 13. John Wiley & Sons, 2010.

Reference Books:

1. Kotler, P., John, T. B., James, C. M. and Seyhmus B. *Marketing for hospitality and tourism*. Pearson, 2017.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Progressive Evaluation	50
End Evaluation	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	3	2	3	2	2	2	2	3	3	2			
CO2	3	3	2	2	2	3	2	1	3	2	2	2			
CO3	3	2	3	3	2	2	2	2	2	3	3	2			
CO4	2	2	2	3	2	2	1	2	3	2	2	2			
CO5	3	3	3	2	2	3	3	2	2	3	3	3			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low) 2: Moderate (Medium) 3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD5
CD2	Tutorials/Assignments	CO2	CD4, CD7
CD3	Seminars	CO3	CD4, CD7
CD4	Mini Projects/Projects	CO4	CD4, CD5
CD5	Laboratory Experiments/Teaching Aids	CO5	CD4, CD9
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25407
Course title: Supply Chain Operation
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Eighth/Four
Branch: BHM
Name of Teacher: SUPRIYO ROY

Course Objectives

This course envisions to impart to students to:

1.	Appraise what a supply chain is and what it does.
2.	Comprehend Supply Chain Structural Design.
3.	Comprehend the key Components in the Supply Chain.
4.	Managing the Process of Purchasing in SCM.
5.	Know the Importance and the Nature of Transportation in the Supply Chain.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Identify and evaluate the functions and significance of supply chains in modern business environments.
CO2	Analyze various structural designs of supply chains and their strategic implications.
CO3	Explain the role and integration of key components within a supply chain system.
CO4	Demonstrate effective purchasing strategies and supplier relationship management in SCM.
CO5	Assess the critical role of transportation and its impact on supply chain efficiency and responsiveness.

SYLLABUS

MODULE	(NO. OF LECTURE HRS.)
Module 1 Basics of Supply Chain Meaning, Definition, Objectives, Scope, Evolution of Supply Chain Management; Major Supply Chain Drivers involved in developing SCM Framework; Participants and their functions in the Supply Chain; Inter-functional Coordination in SCM.	6
Module 2 Supply Chain Structural Network and Design Network Design Framework, Factors Influencing Network Design Decision, Retailing Supply Network, Supply Network around Manufacturers / Producers; Integration of SCM with Marketing, Sales Forecasting, Supply Chain of Production, Purchasing, Logistics, Information Systems and Finance.	10
Module 3 Supply Chain Process Planning, Sourcing, Making, Delivering, Returning; Planning Demand and Supply; managing economies of scale in supply chain, managing inventories.	7
Module 4 Purchasing in Supply Management Importance, Objectives, Process of Purchasing; Types of Purchasing, Purchasing partnerships, Materials sourcing and its role, In-house or Outsource, Just-in-time purchasing.	7
Module 5 Logistics Functions; Importance of logistics - Economic and Social Advantages; Participants in Logistics/Transport Decisions, Means of transport; Factors considered for selecting suitable means of logistics/transport; 3PL and 4PL, Role of IT in transportation.	8

Textbooks:

1. Chopra, S., Meindl, P. & Kalra, D.V. *Supply Chain Management*, Pearson Education, Inc.
2. Chopra, S. & Meindl, P. *Supply Chain Management: Strategy, Planning, and Operation*, Pearson Education, Inc.

Reference Books:

1. Simchi-Levi, D., Kaminsky, P., & Simchi-Levi, E. *Designing and Managing the Supply Chain: Concepts, Strategies, and Case Studies*
2. Jacobs, F.R., Berry, W. & Whybark, D.C. *Operations and Supply Chain Management*, TMH

Gaps in the syllabus (to meet Industry/Profession requirements) – Nil

Pos met through Gaps in the Syllabus – N/A

Topics beyond syllabus/Advanced topics/Design – N/A

Pos met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (Pos)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	2	2	1	2	3	2	2	2	2	3	2			
CO2	3	3	3	2	2	2	1	2	2	2	3	2			
CO3	3	2	3	2	2	2	1	2	2	2	3	2			
CO4	2	2	2	2	3	3	1	3	3	3	3	2			
CO5	2	2	2	2	3	3	2	2	2	2	3	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between Cos and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25408
Course title: Organizational Behavior
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L: 3 T: P:

Class schedule per week: 03
Class: BHM
Semester / Level: Eighth/Four
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course envisions to impart to students to:

1.	To study the fundamental concepts of Organization Behavior.
2.	To understand the impact of individual and group behavior on organizational effectiveness
3.	To learn on motivation and leadership influence to Behavior and Performance.
4.	To learn on Group Dynamics of people management and conflict management.
5.	To understand the diverse work culture and essence of Quality Work Life in an Organization.

Course Outcomes

After the completion of this course, students will be able to:

CO1	To have a good understanding of the framework of Organizational Behavior and Management along with the Basic Behavioral Science that influence Organizational Behavior.
CO2	To have an understanding on the Theories of Motivation and Work Behavior and to learn recognizing and valuing individual Personalities and Behaviors by working on Perceptions from Organizational Perspective
CO3	To understand the influence of Individual and Group Behavior towards meeting the Organizational Goal and to understand the essence of People and Stress Management as a component of Group Dynamics in an Organization
CO4	To have an understanding on the different types of Leadership styles to recognize good and bad leadership for the organization. Conflict Management is a part of Group or Team due to difference in Opinion and to learn the ways to resolve conflict at the interest of the common Organizational Goal.
CO5	To have an understanding and to develop good Work Culture and Climate in an Organization by working on both the Extrinsic and Intrinsic factors associated with the Organization to provide a Quality Work Life balance.

SYLLABUS

MODULE	(NO.OF LECTURE HOURS)
Module 1 Introduction to Organizational Behavior Management and Organizational Behavior, Theories of Management, Major Behavioral Science that contribute to Organizational Behavior-Psychology, Sociology, Sociopsychology, Political Science, Anthropology, Organizational structure, Dynamics of People and Organization, Models of Organizational Behavior, Hawthorne studies, Challenges and opportunities in Organizational Behavior.	8
Module 2 Motivation, Personality & Perception Motivation-Motivation and Behavior, theories of Motivation, Reinforcement theory, Organizational Learning Process, Motivation and performance, Financial and Non-financial incentives, Personality Determinants of personality, Type A and Type B personality, Values, Attitudes & Beliefs, Argyris's Maturity-Immaturity Continuum, Perception-Motivation and Perception, Meaning, Need of Perceptual process, Factors influencing Perceptual process, self-concept and self-esteem.	10
Module 3 Group Dynamics and Stress Management Group Dynamics-Team & Group difference, Group Effectiveness, Formal & Informal Group, Stages of Group Development, Group Decision Making, Inter group relation and Conflict, Stress Management-Stress and Behavior, Sources of Stress, Consequences of Stress and Performance.	8
Module 4 Leadership, Conflict Management and Power & Politics Leadership-Introduction and characteristics of Leadership, Formal and Informal leadership, Theories of Leadership, Conflict Management-Nature of Conflict, Sources of Organizational Conflict, Modes of Conflict Resolution, Conflict Management, Power & Politics-Difference between Influence, Power & Authority, Sources of power, Organizational Politics, Machiavellianism, Ethics of Power and Politics in Organizations.	8
Module 5 Organization Development and Culture Organizational Change, Resistance to change, Steps for planned change, Quality Work Life, Organizational Development Objective and Interventions, Organization Climate and Organizational Effectiveness, Managing Organizational Culture.	6

Textbooks:

1. Sekaran, U. Organisational Behaviour, Tata McGraw Hill
2. Newstrom, J. Organisational Behaviour, Tata McGraw Hill

Reference books:

1. Stephen P. Robbins, Timothy A. Judge, Niharika Vohra (18th ed.), Pearson Education, New Delhi.
2. L. M. Prasad, Organisational Behaviour, Sultan Chand & Sons.

Gaps in the syllabus (to meet Industry/Profession requirements) - Nil

POs met through Gaps in the Syllabus - N/A

Topics beyond syllabus/Advanced topics/Design - N/A

POs met through Topics beyond syllabus/Advanced topics/Design – N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
First Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	05
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (POs)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	3	3	2		3	1	1	1	1	2	3	2	3	2	3
CO2	3	3	2		3	3	1	1	1	2	1	2	3	3	3
CO3	3	3	3	2	3	2	1	2	3	3	3	3	2	3	3
CO4	3	2	2	1	2	1			2	3	2	2	3	1	1
CO5	3	3	2	1	3	3	2	1	2	2	2	2	3	2	2

Correlation Levels 1,2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between COs and Course Delivery (CD) methods

CD Code	Course Delivery methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of boards/LCD projectors/OHP projectors	CO1	CD1, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD8
CD3	Seminars	CO3	CD1, CD8
CD4	Mini projects/Projects	CO4	CD1, CD8
CD5	Laboratory experiments/teaching aids	CO5	CD1, CD8
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training		
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25409
Course title: Consumer Behavior
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L:3 T: 0 P: 0

Class schedule per week: 03
Class: BHM
Semester / Level: Eighth/Fourth
Branch: BHM
Name of Teacher: SANJIV KUMAR SRIVASTAVA

Course Objectives

This course envisions to impart to students to:

1.	Understand the importance of Consumer Behaviour.
2.	Evaluate the factors affecting consumer behaviour.
3.	Acknowledge the concept of Market segmentation and Positioning.
4.	Learn about Consumer decision making process.
5.	Develop understanding consumer and marketing communication process.

Course Outcomes

After the completion of this course, students will be able to:

CO1	Explain the concept and importance of Consumer Behavior.
CO2	Identify the factors affecting consumer behaviour.
CO3	Explain the concept of Market segmentation and Positioning.
CO4	Describe the Consumer decision making process.
CO5	Plan Consumer communication process.

SYLLABUS

MODULE	(NO. OF LECTURE HRS.)
Module 1 Introduction to Study of Consumer Behaviour Defining Consumer Behaviour, why study Consumer Behaviour, Nature and scope of Consumer Behaviour, Consumer Behaviour and the Marketing Concept, Customer, Client and Consumer, Changing Market Scenario, Interdisciplinary nature of Consumer Behaviour, Applications in marketing.	8
Module 2 Factors affecting Consumer Behaviour Factors influencing Consumer Behaviour– External Influences – Culture, Subculture, Social Class, Reference Groups, Family, Internal Influences– Needs & Motivations, Perception, Personality, Lifestyle, Values, Learning, Memory, Beliefs & Attitudes.	8
Module 3 Marketing Segmentation and Positioning Introduction, meaning, Requirements for Effective Segmentation, Bases for Segmentation, target marketing, Evaluation and selection of target market. Product Positioning: An Introduction, Positioning Strategy, Positioning Approaches, Positioning	8
Module 4 Consumer Decision Making Process Introduction to decision making, Levels of consumer decision making, Types of consumer decisions, Consumer Decision Making Process – Problem Recognition -Information Search – Alternative Evaluation – Purchase Selection – Post purchase Evaluation, Models of Consumer Behaviour: General Model, Basic Model and specific Model. Buying pattern in the new digital era.	8
Module 5 Marketing and Consumer Communication: Meaning and definition of Consumer Communication, Component of the communication process, Consumer communication process: Sender, Medium, Receiver, Feedback. Designing a communication strategy: Objective of communication, Target Audience, Message, Media, Feedback. Integrated Marketing communication. Opinion Leader: Meaning, Motive behind opinion leadership, Traits and characteristics of opinion leaders, Word of Mouth.	8

Textbooks:

1. Sangeeta Sahney, *Consumer Behaviour*, Oxford University Press, 2017
2. Schiffman Leon G; *Consumer Behavior*: Pearson Education India.
3. *Consumer Behaviour* – Satish K Batra, S H H Kazmi
4. *Consumer Behaviour in Indian Context* – K K Srivastava, Sujata Khandai

Reference Books:

1. Hawkins, Best and Coney, *Consumer Behaviour*, Tata McGraw Hill, New Delhi
2. John A Howard, *Consumer Behaviour in Marketing Strategy*, Prentice Hall New Delhi
3. Rajneesh Kumar, *Consumer Behaviour*, Oxford Publication, 2014.
4. *Consumer Behavior*, Blackwell and Engel, Cengage Publication, Indian Edition.

Gaps in the syllabus (to meet Industry/Profession requirements) – Nil

Pos met through Gaps in the Syllabus – N/A

Topics beyond syllabus/Advanced topics/Design – N/A

Pos met through Topics beyond syllabus/Advanced

topics/Design – N/A Course Outcome (CO) Attainment

Assessment tools & Evaluation procedure Direct

Assessment

Assessment Tool	% Contribution during CO Assessment
Quiz	10
Mid Semester Examination	25
Assignment	10
Teacher's Assessment	5
End Semester Examination	50

Indirect Assessment –

1. Student's Feedback on Course Outcome

Mapping Course Outcomes onto Program Outcomes

Course Outcome	Program Outcomes (Pos)												Program Specific Outcomes (PSOs)		
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15
CO1	2	2	2	1	1	2	2	2	2	1	2	2			
CO2	2	2	3	2	2	1	2	3	2	3	1	2			
CO3	3	2	2	1	1	1	2	3	1	2	3	3			
CO4	3	2	2	1	1	3	2	2	2	1	2	2			
CO5	2	2	2	2	2	2	2	3	3	2	2	2			

Correlation Levels 1, 2 or 3 as defined below:

1: Slight (Low)

2: Moderate (Medium)

3: Substantial (High)

Mapping Between Cos and Course Delivery (CD) methods

CD Code	Course Delivery Methods	Course Outcome	Course Delivery Method Used
CD1	Lecture by use of Boards/LCD Projectors	CO1	CD1, CD2, CD8
CD2	Tutorials/Assignments	CO2	CD1, CD2, CD8
CD3	Seminars	CO3	CD1, CD2, CD8
CD4	Mini Projects/Projects	CO4	CD1, CD2, CD8
CD5	Laboratory Experiments/Teaching Aids	CO5	CD1, CD2, CD8
CD6	Industrial/Guest Lectures		
CD7	Industrial Visits/In-plant Training		
CD8	Self- learning such as use of NPTEL Materials and Internets		
CD9	Simulation		

COURSE INFORMATION SHEET

Course code: BH25410
Course title: Project
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 6 L: T: P: 18
Class schedule per week: 3
Class: BHM
Semester / Level: Eighth/Four
Branch: BHM
Name of Teacher: Gautam Shandilya

Course Objectives

This course enables the students:

1	To introduce to the fundamentals of research design and the formulation of research objectives within the context of the hospitality industry.
2	To develop analytical thinking for identifying, defining, and critically evaluating research problems relevant to hospitality operations.
3	To familiarize with sampling techniques and data interpretation methods used in hospitality research and decision-making.
4	To encourage the application of interdisciplinary knowledge and tools to solve real-world operational challenges in hospitality management.
5	To be trained in structured academic writing and project documentation in accordance with professional and institutional standards.

Course Outcomes

After the completion of this course, students will be to:

1.	Identify and articulate well-defined research objectives relevant to contemporary issues in the hospitality industry.
2.	Examine and evaluate hospitality-related research problems using appropriate academic and industry-based frameworks.
3.	Develop suitable sampling methodologies and interpret data to support evidence-based decision-making in hospitality research.
4.	Integrate concepts, tools, and techniques from various disciplines to effectively address and solve operational issues in core hospitality functions.
5.	Produce structured, well-researched, and professionally written project reports that meet academic and industry standards.

Guidelines

Project Documentation

Introduction to the topic. · Problem Definition - Need of study - Problem Definition - Research objective - List of Information

Research objective - List of Information · Research Methodology - Research design –

Source of data - Instrumentation of data collection –

Sampling Design · Analysis, Findings & Interpretation. · Suggestions & Recommendations. ·

Conclusion or Silent Findings · Limitation · Bibliography · Annexure
Selecting A Topic: -
Selecting a topic is the first issue. About the only thing you will be sure of should be that do you want to write on a subject that directly relates to hotels or is associated with tourism. A lot of thinking & creativity is required at planning stage.

Project Supervision

Each project shall be guided by a supervisor duly appointed by the department / coordinator.

Project Submission

Final draft of the project should be submitted in the department duly certified by the concerned guide.

Project Presentation & Evaluation

Formal presentation and evaluation of the project before internal panel constituted by the department / coordinator.

Textbooks:

- 1 Kothari, C.R. *Research Methodology Methods and Techniques*, Vishwa Prakashan, 2006.
- 2 Jenkins, G.M. & Watts, D.G. *Spectral Analysis and its Applications*, Holden Day, 1986.

Reference books:

- 1 Levin, R. & Rubin, D. *Statistics for Management*, Pearson Education, 2005.
- 2 Cooper, D. & Schindler, P. *Business Research Methods*, Tata McGraw-Hill Co. Ltd., 2006.

Gaps in the syllabus (to meet Industry/Profession requirements): Nil

POs met through Gaps in the Syllabus: - N/A

Topics beyond syllabus/Advanced topics/Design: - N/A

POs met through Topics beyond syllabus/Advanced topics/Design: - N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Progressive Evaluation	50
End Sem Evaluation	50

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	a	b	c	d	e	f	g	h	i	j	k	l
1	3	2	2	2	1	1	1	2	2	2	2	2
2	3	3	2	2	2	2	1	2	2	2	2	3
3	3	3	2	3	3	1	1	1	1	2	2	2
4	3	3	3	2	2	3	2	2	3	2	3	2
5	2	2	1	2	1	1	1	2	2	3	2	3

Mapping Between COs and Course Delivery (CD) methods				
CD	Course Delivery methods		Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors			
CD2	Tutorials/Assignments			
CD3	Seminars			
CD4	Mini projects/Projects		CO1, CO2, CO3, CO4, CO5	CD4
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training		CO1, CO2, CO3, CO4, CO5	CD7
CD8	Self- learning such as use of NPTEL materials and internets		CO1, CO2, CO3, CO4, CO5	CD8
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25210
Course title: Vocational course in Food Division
Pre-requisite(s): NIL
Co- requisite(s): NIL
Credits: 3 L: 2 T: 0 P:2
Class schedule per week: 04
Class: BHM
Semester / Level: Fourth/Two
Branch: BHM
Name of Teacher: Dr. Pratima Ekka

Course Objectives

This course envisions to impart to students to:

1.	Explain the use of different Vegetables and Fruit in cookery
2.	Categorize dairy products Milk, Cream, Cheese, butter and extend their use.
3.	Understand the basic Bread Preparations
4.	Understand & learn different types of Restaurants and service.
5.	Staff attributes & Hierarchy of F&B Outlets - Duties and responsibilities of each level of staff.

Course Outcomes

After the completion of this course, students will be able to:

CO 1	Develop culinary skills in the Vegetables and fruits.
CO2	Identify the basic commodities – dairy – milk, cream, cheese, butter
CO3	Learn art of bread making.
CO4	Apply basic service knowledge of different outlets of F& B service.
CO5	Learn the hierarchy of f & b service in a star hotel with their attributes, duties & responsibilities.

Syllabus

MODULE	No. of Lecture Hours.
Module:1 Vegetables and Fruit cookery Classification of vegetables – effects of heat on vegetables – cuts of vegetables – Salad – Salads and its types, Salad dressings	8
Module:2 DAIRY PRODUCTS a) Milk, Butter, Cream, Cheese b) Ghee and Cottage Cheese c) Storage. NON-DAIRY products Soya milk d) Rice milk	8
Module:3 Bread Making Ingredients, Basic principles, Method of bread making: Bread varieties: White Loaf and remedies Breads of countries - France, Germany, and Italy.	8
Module:4 Types of restaurants Definition of Restaurant, Coffee shop, Discotheque, Night club, Grill room, Speciality restaurant, Cafeteria, Milk & Snack bar, Dining room, Bar etc.	8
Module:5 Staff Pattern of F& B outlets F&B Manager, Restaurant manager, Head Waiter, Station head waiter (Sr. Captain), Station waiter (Captain) Junior station waiter, Wine butler/wine waiter/sommelier, Floor waiter Lounge waiter, Assistant waiter(steward), Trolley asst. waiter, Clearing asst. waiter, Apprentice, Cashier.	8

Textbooks:

1. Theory of Catering, Victor Ceserani & Ronald Kinton, ELBS
2. Theory of Cookery, Mrs. K.Arora, Frank Brothers
3. Garde Manger: The Art and Craft of the Cold Kitchen By Culinary Institute of America
4. The larder chef: food preparation and presentation By W K H Bode, M. J. Leto, W.K.H. Bode
5. Singaravelavan R. *Food & Beverage Services*, Oxford Publications, 2011.
6. Lillicrap Dennis R., *Food & Beverage Service*, Hodder Arnold Publication, 2006.

Reference books:

1. Modern Cookery (Vol-I) For Teaching & Trade, Philip E.Thangam, OrientLongman
2. Larousse Gastronomique-Cookery Encyclopedia, Paul Hamlyn
3. The Complete Guide to the Art of Modern Cookery, Escoffier
4. Dhawan, Vijay, *Food & Beverage Service* - Franc Brothers, 2009.
5. Walker R. John, *The Restaurant (From Concept to Operation)*, Wiley, 2013
6. Andrioli, Sergio, Douglas, Peter, *Professional Food Service*, Heinemann Professional

7. Sudhir A. *Food & Beverage Service: A Training Manual*, McGraw Hill Education. Second Edition.

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Progressive Evaluation	50
End Sem Evaluation	50

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	3	2	3	2	3	1	2	3	3	1	3	1
2	2	1	3	1	3	1	1	2	2	1	2	1
3	2	1	1	1	3	1	3	1	1	1	1	3
4	2	1	3	1	3	1	2	2	2	1	2	3
5	2	2	3	1	3	1	2	3	3	1	3	3

Mapping Between COs and Course Delivery (CD) methods				
CD	Course Delivery methods		Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1, CO2, CO3, CO4, CO5	CD1, CD8
CD2	Tutorials/Assignments			
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets			
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25211
Course title: Vocational course in Room Division
Pre-requisite(s): Nil
Co- requisite(s): Nil
Credits: 3 L:2 T:0 P:2
Class schedule per week: 4
Class: BHM
Semester / Level: Fourth/Two
Branch: BHM
Name of Teacher: Pranjal Kumar

Course Objectives

This course enables the students:

A.	Understand the importance and functions of control desk.
B.	Learn about the daily routine and operational system of housekeeping department.
C.	Understand the role of housekeeping supervisor and critical issues related to inspection.
D.	Explain guest services and basic front office functions and responsibilities that allow staff to meet guest standards.
E.	Examine the role of Front office department in guest life cycle.

Course Outcomes

After the completion of this course, students will be able to:

1.	Explain the importance and functions of control desk.
2.	Manage daily routine and operational systems of housekeeping department.
3.	Conceptualize the role of housekeeping supervisor and critical issues related to inspection.
4.	Explain the operation of Front Office department in a hotel.
5	Explain the role of Front office department in guest life cycle.

SYLLABUS

MODULE	(NO. OF LECTURE HOURS)
Module 1 Housekeeping control Desk Importance, coordination with other departments (F.O., engineering, room service etc). Handling telephone calls: answering calls, transferring calls, holding calls, taking calls, making calls. Paging system and methods. Handling complaints/requests and difficult situations, room transfer. Forms and formats used in control desk.	8
Module 2 Daily Routine and System Housekeeping day: Introduction, Opening the house, Shifts: Morning Shift: Briefing, Room assignment, Handover of keys, readying the cart, room status check, Room service & inspection. Afternoon/Evening shift: Debriefing, Reporting, handover. Night shift: Activities, Duties, staff scheduling. Leave application procedure, Gate pass procedure, Formats & Records.	8
Module 3 Housekeeping supervision Role of H.K. supervisor, Duties and Responsibilities of supervisor. Check list, Importance of inspection. Typical area neglected, Area of special attention, handling guest complaints, Maid's trolley and Bed making.	8
Module 4 Front Office Department Front office operations, staffing, scheduling, work shifts, job specifications & job descriptions of Front office personnel, The Front desk: Functional Organization, Telecommunication.	8
Module 5 Front Office Operations The guest cycle: Pre-Arrival, Arrival, Occupancy, Departure, Post Departure; Front office systems: Non-Automated, Semi Automated, Fully Automated; Front Office Process, Front office forms, the front desk, Front office equipment, Property Management Systems.	8

Textbooks:

- 1 S. Andrews, *Hotel Housekeeping Management & Operation*. New Delhi: Tata McGrawHill, 2008.
- 2 G. Raghubalan and S. Raghubalan, *Hotel Housekeeping Operation and Management*. 3rd New Delhi: Oxford university press, 2014.
- 3 Kasavana & Brooks, *Managing Front Office Operations*, AHL&A, 2001
- 4 S.K. Bhatnagar, *Front Office Management*, Frank Bros. & Co. , 2006

Reference books:

- 1 M. Schneider and G. Tucker, *The Professional Housekeeper*. 4th ed., New York: John Wiley, 1999.

- 2 Thomas J. A. Jones, *Professional Management of Housekeeping operations*. 5th ed., New York: John Wiley, 2010.
- 3 Colin Dix & Chirs Baird, *Front office operations*, Pearson, 2006.
- 4 James Bardi, *Hotel Front office management*, John Wiley & Sons, 2011.
- 5 Sudhir Andrews, *Front Office: A Training Manual*, Tata McGraw Hill, 2011

Gaps in the syllabus (to meet Industry/Profession requirements) -NIL

POs met through Gaps in the Syllabus –N/A

Topics beyond syllabus/Advanced topics/Design

POs met through Topics beyond syllabus/Advanced topics/Design –N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Progressive Evaluation	50
End Sem Evaluation	50

Indirect Assessment –

1. Student Feedback on Faculty
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	3	2	3	2	3	1	2	3	3	1	3	1
2	2	1	3	1	3	1	1	2	2	1	2	1
3	2	1	1	1	3	1	3	1	1	1	1	3
4	2	1	3	1	3	1	2	2	2	1	2	3
5	2	2	3	1	3	1	2	3	3	1	3	3

Mapping Between COs and Course Delivery (CD) methods				
CD	Course Delivery methods		Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		CO1, CO2, CO3, CO4, CO5	CD1, CD8
CD2	Tutorials/Assignments			
CD3	Seminars			
CD4	Mini projects/Projects			
CD5	Laboratory experiments/teaching aids			
CD6	Industrial/guest lectures			
CD7	Industrial visits/in-plant training			
CD8	Self- learning such as use of NPTEL materials and internets			
CD9	Simulation			

COURSE INFORMATION SHEET

Course code: BH25117
Course title: Vocational Training
Pre-requisite(s) NIL
Co-requisite(s): NIL
Credits: 6 L: T: P:
Training schedule: 8 weeks
Class: BHM
Semester/Level Second/One
Branch: BHM
Name of Teacher: Gautam Shandilya

Course Objectives

This course enables the students to:

1.	Gain the practical knowledge and skills with systems, standards, and practices of hotel industry.
2.	Train, motivate, develop and build the confidence in the practical work of hotel operations in all four core areas.

Course Outcomes

After the completion of this course, students will be able to:

1.	Identify their key operational areas of interest.
2.	Illustrate the first-hand practical knowledge on their areas of interest.
3.	Demonstrate the ability to work in a professional and commercial hotel
4.	Enhance employability skills with their requisite knowledge, skills, attitude and practical experience.

Syllabus

Module 1 Front Office

Areas to be covered:

Reservation, Reception, Bell-desk, Cashier, Business centre, Airport rep etc.

Module 2 Housekeeping

Areas to be covered:

Floors, Public area, Linen / Laundry / Uniform Room, Housekeeping Desk, Florist and Housekeeping Stores.

Module 3 Food Production

Areas to be covered:

Main Kitchen, Garde Manger, Butchery, Bakery, Restaurant kitchen/ Stores - layout of kitchens - brand names of equipment used.

Module 4 Food and Beverage Service

Areas to be covered:

Room Service, Coffee Shop, Banquets, Bar, Specialty Restaurants.

Gaps in the syllabus (to meet Industry/Profession requirements): Nil

POs met through Gaps in the Syllabus: N/A

Topics beyond syllabus/Advanced topics/Design: N/A

POs met through Topics beyond syllabus/Advanced topics/Design: N/A

Course Outcome (CO) Attainment Assessment tools & Evaluation procedure

Direct Assessment

Assessment Tool	% Contribution during CO Assessment
Progressive Evaluation	50
End Sem Evaluation	50

Indirect Assessment

1. Student Feedback on Hotel
2. Student Feedback on Course Outcome

Mapping between Objectives and Outcomes

Mapping of Course Outcomes onto Program Outcomes

Course Outcome #	Program Outcomes											
	1	2	3	4	5	6	7	8	9	10	11	12
1	3	3	3	3	3	3	3	3	3	3	3	3
2	3	3	3	3	3	3	3	3	3	3	3	3
3	3	3	3	3	3	3	3	3	3	3	3	3
4	3	3	3	3	3	3	3	3	3	3	3	3

Mapping Between COs and Course Delivery (CD) methods			
CD	Course Delivery methods	Course Outcome	Course Delivery Method
CD1	Lecture by use of boards/LCD projectors/OHP projectors		
CD2	Tutorials/Assignments		
CD3	Seminars		
CD4	Mini projects/Projects		
CD5	Laboratory experiments/teaching aids		
CD6	Industrial/guest lectures		
CD7	Industrial visits/in-plant training	CO1, CO2, CO3, CO4	CD 7, CD 8
CD8	Self- learning such as use of NPTEL materials and internets		
CD9	Simulation		

Lecture wise Lesson Planning Details.

Industrial visits/in-plant training in hotel as per the schedule given by the Hotel.