

DIPLOMA (HOTEL MANAGEMENT & CATERING TECHNOLOGY) – PART FOUR

Optional Early Certificate: - Certificate (HMCT)

S.N	Code	Name of Module	CR
1	HM63-16	Computer Fundamentals	4
2	HM63-17	Food Service Facilities Planning	5
3	HM63-18	House Keeping , Hygiene and Sanitation	4
4	HM63-19	Hotel Engineering	5
5	HM63-20	Project	4

Module Name: COMPUTER FUNDAMENTALS

- 1. Introduction to Computer System:** Introduction, Characteristics of Computer, Drawbacks of Computers, Generation of Computer.
- 2. Computer Organization:** Architecture of Computer System.
- 3. Number System:** Introduction, Commonly used Number System, Decimal, Binary, Octal, Hexadecimal, Converting form one Number System to another.
- 4. Binary Arithmetic:** Introduction, Binary Addition, Subtraction, Multiplication, Division, representations of Character, BCD Code, EBCDIC, ASCII, fixed point Representation, Floating Point representation.
- 5. Algorithms and Flowcharts:** Algorithms, Characteristics of an Algorithm, Flowchart, Different Symbols used in flowcharts.
- 6. Computer Languages :** Machine Language, Advantages of Machine Language, Disadvantages of Machine Language, High Level Language, Assembly Language, Software, Types of Software, System Software, Application Software.
- 7. Input-Output Devices :** Introduction, Offline Input Devices, Online Input Devices, Punched Cards, Keyboard, Mouse, Touch pad, Light Pen, Scanner.
- 8. Storage Devices:** Introduction, Primary Memory, RAM, DRAM, ROM, PROM, EPROM, EEPROM, Cache Memory, Magnetic Tape, Floppy, Hard Disk, CD-ROM.
- 9. Operating System:** Introduction, Type of Operating System, Batch Processing Operating System, Single-user Operating System, multi-user Operating System, Multi-Processing Operating System, real Time Operating, DOS, Function of DOS.

10. Viruses: Introduction, Types of Viruses, antivirus.

Module Name: HOUSE KEEPING, HYGIENE AND SANITATION

1. **Identifying Cleaning Equipment's:** Classification of Cleaning Equipments. Functioning and care of Manual Cleaning Equipment. Functioning and care of Mechanical Cleaning Equipment. Groups of cleaning agents. Use of Detergents. Use of water, Abrasives, degreasers, acids, organic solvents and dry cleaning agents. Lost and found procedures / Records maintained for lost and found. Floors and floor finishes. Granolithic and Terrazzo floors. Wooden flooring / Carpets & Advantages and care of carpets.
 - Use of Glass fiber, Acoustic Walls. Various finishes applied to walls. Register and forms maintained in H/K & Formats of Registers and reports. Desk control operations / Importance of Desk control. Personal, environment hygiene, garbage-safe and correct disposal of garbage. Protective clothing. Pest control. Personal Environment Hygiene Garbage -safe and correct disposal of garbage.
2. **Water:** Sources of water and hazards of water pollution.
3. **Air:** Sources of air Pollution. Health effects of air pollution. Pollution Control.
4. **Protective Clothing:** Protective Clothing in Different Dept. Selection of materials care and use. Its efficiency and comfort. Care maintenance of Protective Clothing.
5. **Handling of Food:** Personal hygiene of the food handlers. Programme of Good Health for Food handlers. Food Borne Diseases – Roots of Contamination. Habits and Abuse.
6. **Pest Control:** Rodent and Insect Control Technique.

Module Name: FOOD SERVICE FACILITIES PLANNING

1. **Food service facilities planning:** Introduction, Design & layout. Planning: Characteristics, Scope, Objectives, Facilitating production, materials handling, space utilization, maintenance & cleaning, Cost control, investment in equipment, labour utilization, Supervision, flexibility.
2. **The planning process:** Preliminary planning information, prospectus, commissioning planners, developing the concept, equipment requirements, space requirements, developing preliminary plans preparation of final plans, preparing specifications, binding & awarding contracts, constructions. Preparing of prospectus: Importance, customer & user characteristics, developments the feasibility study: importance of market survey, site analysis, cost estimates.
3. **Functional planning:** Functions, concept of flow, functional requirements, receiving storage, preparation, cooking, baking, Serving, dish washing, Pot & pan washing, Waste disposal, other requirements. Planning the atmosphere: Atmosphere & mood, color, lighting, acoustics, noise & music, climate control, furnishings, exterior design, advertising & public relations.
4. **Work place design:** Developing work place, work place environment, concepts of motion economy, materials handling, designing safe work place,
5. **Equipment's requirements:** Methods, equipment's check list, broilers, griddles, ovens, ranges, steam jacketed kettles, steamers, ware washing equipment, waste disposal equipment selection.

6. **Space requirements:** Introduction – space estimates, total facility size, dining areas, production areas, space calculations, receiving area, Storage areas, Serving areas, dining areas.
7. **Layout facilities:** Space arrangements, flow, other criteria for lay out, layout configurations, relationship charts for lay out, lay out guides, layout of storage areas, Layout of main cooking areas, Layout of dish washing areas.

Module Name: HOTEL ENGINEERING

1. Plumbing & Sanitation
2. Plumbing Terminology
3. Storage of Water
4. Storage capacity
5. Traps
6. Plumbing practice
7. Safety & precaution
8. Sanitary systems
9. Fitting
10. Water Closets
11. System of hot & cold supply
12. Electricity
13. Fuse
14. Lighting
15. Fire Precaution
16. Fire Prevention
17. Types of Extinguishers
18. Kitchen equipment
19. Stores
20. Convection Oven
21. Microwave
22. Steamers
23. Deep fat Fryers
24. Refrigerators
25. Dish washing Machine
26. House Keeping Equipment
27. Transfer of Heat
28. Gas & Electricity
29. Composition & purification of Water
30. Hard & Soft water
31. Thermostats
32. Fuels & Classification