



JAIPUR ENGINEERING COLLEGE AND RESEARCH CENTER

Class – 2nd Year - IV Semester: B.Tech. (Civil Engineering)

Subject – Building Planning

Chapter – Principles of Planning - UNIT- 7

Presented by -Hetram Sharma (Assistant Professor)

VISSION AND MISSION OF INSTITUE

Vision

To become a renowned centre of outcome based learning, and work towards academic, professional, cultural and social enrichment of the lives of individuals and communities.

Mission

- M1. Focus on evaluation of learning outcomes and motivate students to inculcate research aptitude by project based learning.
- M2. Identify, based on informed perception of Indian, regional and global needs, areas of focus and provide platform to gain knowledge and solutions.
- M3. Offer opportunities for interaction between academia and industry.
- M4. Develop human potential to its fullest extent so that intellectually capable and imaginatively gifted leaders can emerge in a range of professions.

VISSION AND MISSION OF DEPARTMENT

Vision

To become a role model in the field of Civil Engineering for the sustainable development of the society.

Mission

- M1. To provide outcome base education.
- M2.To create a learning environment conducive for achieving academic excellence.
- M3. To prepare civil engineers for the society with high ethical values.

COURSE OUTCOME

CO-1 STUDENTS WILL BE ABLE TO UNDERSTAND TYPES OF BUILDING & APPROPRIATE SELECTION OF SITE WITH SUN CONSIDERATION.

CO-2 STUDENTS WILL BE ABLE TO UNDERSTAND ABOUT BYE-LAW AND NBC REGULATION ALONG WITH ORIENTATION, CLIMATE&COMFORT CONSIDERATION.

CO-3 STUDENTS WILL BE ABLE TO UNDERSTAND BUILDING PLANNING. STUDENTS WILL ABLE TO USE PRINCIPALS OF OF VASTU SHASTRA

CO-4 STUDENTS WILL BE ABLE TO UNDERSTAND FUNCTIONAL DESIGN AND ACCOMMODATION REQUIREMENTS OF RESIDENTIAL BUILDING AND NON-RESIDENTIAL BUILDING WITH PROVIDING DIFFERENT SERVICES

CO-PO MAPPING

Subject Code	COs	Program Outcomes (POs)												
		PO- 1	PO-2	PO-3	PO-4	PO-5	PO-6	PO-7	PO-8	PO-9	PO-10	PO-11	PO-12	
4CE4-07	CO-1	3	1	3	3	2	3	3	2	1	1	3	2	
	CO-2	3		3	2	2	2	3	2	1	1	2	2	
	CO-3	3	1	2	1	1	2	3	2	2	1	3	1	
	CO-4	3	2	2	2	2	2	3	1	2	1	2	2	

CONTENTS

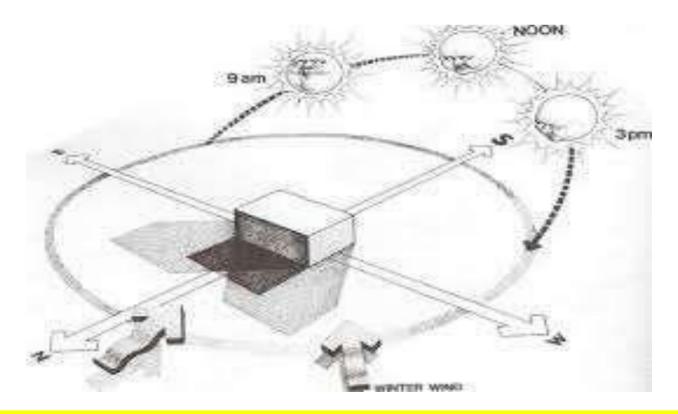
Principles of Planning:-Different factors affecting planning viz-

- 1. Aspect
- 2. Prospect,
- 3. Furniture requirement,
- 4. Roominess
- 5. Grouping
- 6. Circulation
- 7. Elegance
- 8. Privacy

Aspect:-

- Placement of different rooms of house in accordance with our activities at different hours of day.
- Rooms should get enough sunlight and air, which gives,
 - Great environment
 - Comfort
 - etc
- A room which receives light & air from particular direction is said to have 'aspect' of that direction.

Type of room	Suggested Aspect				
Living room, drawing room	S, SE				
Bed room	SW, NW				
Dining room	South ,SE				
Kitchen	East, NE				
Verandah	West, SW				
Study room	N				





Prospect:-

- Prospect is the view from outside of a house.
- The house should have a proper prospect so that it can give a feeling of cheerfulness to the people living in it.
- It should create a good impression on a person who views it from outside.
- It must also possess good qualities like comfort, cheerfulness, security, labour saving and modern outlook.
- For e.g. Small Projections or bay window can have a good out-look as well as helps in providing breeze, light and sunlight to the room.



Privacy:-

- It is an important principle while planning a residential building.
- Privacy can be maintained in ways:
 - 1. External
 - 2. Internal

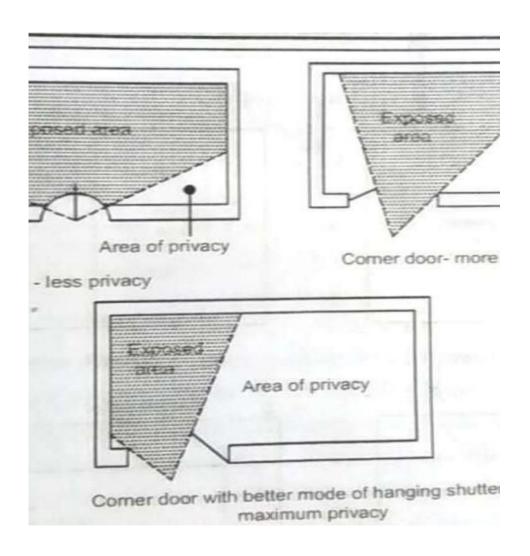
External Privacy:-

• The privacy from sides can be secured by providing planned entrance and pathways.



Internal Privacy:-

- Privacy in internal rooms can be easily obtain by proper planning of diff. areas and location of doors and windows.
- The shutter when opened should give the minimum view of room for an entering persons.



Circulation:-

- Circulation is movement within the premises and includes both horizontal and vertical circulation.
- Horizontal circulation (room to room)
 - Passage
 - Corridors
 - Lobbies etc.
- Vertical circulation (floor to floor)
 - Stairs

Roominess:-

- Roominess means getting maximum advantage from the minimum dimension of the room.
- The effect of roominess depend on the relative dimension of length, width and height of room.
- The shape and size of the room are also very important for roominess. A rectangular room has more roominess then square room in same area.

Grouping:-

- Grouping means the arrangement of various rooms in the building for the convenience of user.
- It minimizes the circulation and at the same time improves the comfort.
- A dinning room should be close to kitchen, while sanitary be away from kitchen, but convenient to bed rooms.

Elegance:-

- Elegance is grand appearance of a building attained mainly owing to the elevation which in turn depends on the plan.
- It depends upon proper positioning/selection of doors, windows, balcony, roofs, staircase etc.
- For better elegance
 - Selecting superior building material for facing as polished stone- granite, marble or mosaic.
 - Providing projection like sunshades, balconies, porch with or without pergola opening.
 - Providing bay window, corner window, etc.









STAY HOME, STAY SAFE