## **UNIT II (CONSTRUCTION PRACTICES)**

1. What are the general specifications for first class building? Foundation and plinth. superstructure. damp-proof course.lintels. roofing. plastering. doors and windows.distempering and colour wasting. painting.

2. What are monolithic wall? write its classifications?

*Monolithic walls*:-Walls built of a material requiring some kind of shuttering in the initial stages.

Masonry can be *classified* into the following types stone masonry. brick masonry. hollow block concrete masonry. reinforced masonry. composite masonry.

# 3. Define plinth.

Plinth:- It is the horizontal course of stone or brick provided at the base of the wall above ground level. It indicates the height of the ground floor level above the natural ground level. It protects the building from dampness.

4. What are classifications of stone masonry There are two types ,they are rubber masonry. ashlar masonry.

5. What is rubber masonry and ashlar masonry?

Rubber masonry:-

Stones of irregular sizes are used. stones may be undressed or roughly dressed. using hammer having wider joints.

Ashlar masonry:-

This is a costlier, high grade and superior quality of masonry. The work built from accurately dressed stones with uniform and very fine joints of about 3mm. thickness is termed as ashlar masonry.

6. Compare English bond and Double Flemish bond.

English bond double Flemish bond.

More compact and stronger for walls having thickness more than 1(1/2)bricks.

Not pleasing appearance of the facing. No strict supervision and skill required for its construction. More in cost than Double Flemish bond. Less compact and stronger.

Better appearance in the facing. Good workmanship and careful supervision is required.

Cheaper in cost-because number of bricks bats are used.

7. What are the defects in brick masonry.

Defects in brick masonry:-

Sulphate attack. Crystallization of salts from bricks. Corrosion of embedded iron or steel. Shrinkage on drying.

8. Mention the common sizes of building blocks.

The common sizes of building blocks are

390x190x300 mm- standard size hollow block.

390x190x200 mm- hollow building tiles.

390x190x100 mm- hollow concrete blocks for partition.

9. What the types of flooring commonly used.

mud flooring, muram flooring, cement concrete flooring, mosaic flooring, tiled flooring, marble flooring

10. Define damp proof course., what are its causes of dampness.

Definition:-The courses which are laid to check the entry of water or moisture into the building are called damp proof courses.

Causes:-

faulty design of structure faulty construction or poor workmanship use of poor quality materials in construction.

## 11. Define roofs.

Roof:-A roof is defined as the uppermost part of the building which is constructed in the form of a frame work to give protection to the building against rain , heat wind etc..

12. What are the uses of water proofing compounds.

Uses:- When water proofing compounds is added to cement during construction it prevents leakage. It is available in powder form. It is mixed with cement by hand before cement is mixed with aggregate.

13. what are the condition for filters.

Condition for filter:-

It should remove harmful particles from air.

It should be workable under different velocity.

It should have very low frictional resistance.

It should not cause contamination of incoming air.

it should be easy to clean.

#### 14. Define fire resistance

Fire Resistance:- It is the time during which an element of structure fulfils its function in building safely in the event of fire of known intensity. Fire resistance is also defined as an index of fire safety of buildings.

#### 15. Define acoustics

Acoustics:-The term acoustics is defined as the science of sound, and it describes the origin ,propagation and sensation of sound.

16. What are the conditions for good acoustics of an auditorium:-

Conditions for good acoustics of an auditorium:-

The initial sound should be of adequate intensity or loudness.

It is important for a speaker to be heard over a long distance.

The sound produced should be evenly spread over the whole area covered by audience. If the sound is not evenly distributed echoes will be established.

the initial sound should be clear and distinct.

For music hall ,the initial sound should reach the audience with same frequency and intensity.

All undesired sound should be reduced.

## 17. Define scaffolding:-

Scaffolding:-It is defined as the temporary structure employed in the building construction for supporting workers, materials and tools etc., during its construction alteration, demolition, painting and repair etc.,

# 18. Write the types of scaffolding.

Types of scaffolding:-

Single scaffolding or Brick layer scaffolding.

Double scaffolding or Masons scaffolding.

Ladder scaffolding.

Cantilever or Needle scaffolding.

19. Write any some materials used for joints.

bituminous felt

Metal strips

Fibre board

these are some of the materials used for joints.

## 20. Define flooring

Flooring:- The properly supported horizontal surfaces which divide the building into different levels for providing accommodation one above the other within space are called floors.

#### <u>PART - B</u>

- 1) Explain the method of providing a damp proof course in a building
- 2) Explain in brief about the various types of flooring
- 3) Compare stone, brick and concrete hollow block masonry
- 4) Explain the construction of a steel grillage foundation
- 5) Explain the modern method of laying the bricks.
- **6)** explain the fabrication and erection steel truss
- 7) Explain fire protection methods and procedures
- 8) Explain the air conditioning devices
- 9) Explain the construction methodology of RCC cooling tower using slip form techniques
- **10**) Detail the method of scaffolding provided to plaster the outer walls at the first floor Level