

BRICKS :One of the oldest construction materialMost popular and leading construction

material; because of it low cost, durable, light weight and easy to work with.

Brick have been used all over the world in every class andkind of building.

The brick do not requireddressing and the art of lay bricks is so simple that the brick work can be carried outwith the help of unskilled labour.

The bricks are obtained by moulding clay in rectangular block of uniform size and then by drying and burning this blocks.

•As bricks are uniform size they can properly arranged.

•The common brick is one of the oldest building material.

•It is extensively used at present as a leading material of construction, because of

durability, strength, low cost, and easilyavailable, etc





#### Wood

<u>-</u> The terms wood, lumber, and timber are often used interchangeably, but each term has a distinct meaning. Wood Hard fibrous substance lying beneath the bark of trees. Lumber Wood that has been sawn into construction members. Timber Lumber that is five inches or larger in its least dimension.

- Terminology and Classification Wood is classified as softwoodor hardwooddepending on the type of tree it originates from. Softwoods, such as pine, fir, and spruce, come from needle-leaved conifers, which are evergreen Hardwoods, such as maple, oak, and sycamore, come from broad-leaved deciduous trees, which shed their leaves annually. The important difference between softwoods and hardwoods is botanical, which refers to the cellular structure of the two groups. Most hardwoods are in fact harder than softwoods; however balsa wood, one of the softest woods known is actually a hardwood.
- Characteristics : Wood consists of approximately 70% cellulose and 18% to 28% lignin, which is the adhesive imparting strength to the wood. The remainder is made up of minerals and extractives, which give wood its color, odor, and resistance to decay.





## Plaster

Plastering the process of applying thin cover of cement mortar over the exposed surface in order to safeguard against penetration of rain water and other atmospheric agencies. It improves the appearance of the structure and gives decorative effect to the interiors.

- Plastering is done to achieve the following objectsTo protect the external surfaces against penetration of rain water and other atmospheric agenciesTo give smooth surface in which dust and dirt cannot lodgeTo give decorative effectTo protect surfaces against vermin.To conceal inferior materials or defective workmanship.
- The most common materials of plaster mainly contain either Gypsum, Lime, or Cement, but all work in a similar way.
- The plaster is manufactured as <u>a dry powder</u> and is mixed with water to form a stiff but workable paste immediately before it is applied to the surface. The reaction with water liberates heat through crystallization and the hydrated plaster then hardens.





## What is "Stucco"?

In its most basic form, stucco is a mixture of Portland cement, sand and limeRatios of these products vary depending upon application .

 The relatively dry climate throughout the region permitted the use of this cheap, flexible, and versatile medium for decoration on exterior and interior surfaces. Stucco was most commonly applied to walls constructed of mud-brick, pisé, or rubble and was also used for window and balcony grilles and to construct MUQARNAS ('stalactite') vaults





## Stone

Stone is a 'naturally available building material' which has been used from the early age of civilization. It is available in the form of rocks, which is cut to required size and shape and used as building block. It has been used to construct small residential buildings to large palaces and temples all over the world.

## What's a stone?

the hard substance, formed of mineral matter, of which rocks consist. a rock or particular piece or kind of rock, as a boulder or piece of agate. a piece of rock quarried and worked into a specific size and shape for a particular purpose: paving stone; building stone. a small piece of rock, as a pebble.

As a principal material for foundation of civil engineering works, and for the construction of walls, arches, abutments and dams.

Stone, or rock, is a natural substance that is quarried and mined from the earth and used in a variety of applications in construction, including: **Masonry, including decorative elements such as pillars, swags and porticos. Floor and wall tiles and cladding. Paving. Roof coverings.** 



It can be used without any additional finishes or wall coverings, has low maintenance needs, and is highly durable—and recyclable.

Many types of stones are available such as basalt, marble, limestone, sandstone, quartzite, travertine, slate, gneiss, laterite, and granite which can be used as construction materials.

