

Lecture 11

Construction Materials and Workmanship

Outline

1. Presentation Group
2. Materials and Methods Of Construction
3. Request for Substitution of Materials
4. Access To The Work By Quality Assurance Personnel
5. Inspection of Materials Delivered To The Site
6. Rejection of Faulty Material
7. Quality Assurance
8. Construction Labor

Materials and Methods Of Construction

- Best quality material with a right method
- Interpretation of the Specification

Request for Substitution of Materials

The most frequent requests received on the job will be requests by the contractor to **USE SUBSTITUTE MATERIALS** for those actually specified by architect or engineer

Request for Substitution of Materials

Time to consider substitutions

‘DURING DESIGN PHASE

OR

CONSTRUCTION PHASE’

Access To The Work By Quality Assurance Personnel

Contractor is **OBLIGATED T ALL TIME** to provide
access to the work to the architect/engineer

Who Is Responsible For The Safety At Site

THE OWNER RESPONSIBLE FOR THEIR SAFETY

WHILE THEY ARE AT THE SITE.

Who is responsible for the Inspection of
Materials Delivered To The Site..??

INSPECTOR responsible to inspect all materials
delivered to the site prior to their being used in
the work

Rejection of Faulty Material

Acceptability of any material or equipment
should be based upon **ACCEPTED STANDARDS** of
the industry

Quality Assurance

- Quality level

Quality control items:

- Location of the project
- Availability of local material
- Climatic and operating condition
- Cost limitation

Quality Assurance

- Quality Assurance
 - Testing (lab/field)
 - Experience qualification (certain type of work)
 - Factory Inspection
 - Mock up
 - Certified laboratory test report (steel, concrete, fire-spread)
 - Certificate of Compliance or Conformance (glass, paint, aluminums windows)

Construction Labor

- Masonry
- Carpenter
- Bricklayer
- Iron worker
- Cement Masons
- Painters
- Plumbers

Thank You