

# **Construction Technology**

Location: COS, Tulare

### **Chairman:**

Brian Unruh

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#### **ELIGIBILITY:**

Refer to General Information and Rules page. Eligibility is limited to teams of 4. No individual entries are allowed.

#### **COMPETITION SCHEDULE:**

9:30 am Arrive at COS Tulare Campus

9:45 am Roll Taken

9:45 -11:45 am Competition Duration

12:00 pm Depart Tulare Campus to return to Visalia for lunch, exhibitors, awards ceremony

#### **SCOPE OF CONTEST:**

- 1. The first section will be a short written test and will include shop math, identification of tools and/or machines, reading plans, and print details.
- 2. The second section will be manipulative and will require a four-student team to layout, cut and assemble a free-standing wall using hand tools and basic power tools. Each team will be scored on the following:
  - o Reading of blueprints or drawings
  - Demonstration of safe work skills
  - Quality of work
  - Proper use of tools and materials
  - o Organizational skills, including ability to work with others
  - Time (manipulative only)

## **SPECIAL NOTES:**

- 1. In the event of power equipment malfunction, contestant will revert to the use of comparable hand tools.
- 2. Both written and manipulative portions of the event will be completed in a maximum of 3 HOURS.
- 3. A sample plan is attached.

#### **EQUIPMENT AND MATERIALS:**

To be supplied by chairperson:

- Building materials, including nails
- Work area
- Power supply

To be supplied by teams:

- Portable power tools
- Extension Cord (s) #12 or larger
- Safety glasses
- Pencil(s)
- 16' to 30' tape measure
- Calculator
- Combination or tri-square
- Framing hammer

#### TIME:

Contest to begin at 9:45 a.m. sharp.

#### **TIE BREAKER:**

Ties will be broken by the highest score in the carpentry math test.

#### **INSTRUCTIONS:**

LAYOUT AND CONSTRUCT THIS WALL SECTION ACCORDING TO THE ATTACHED DRAWING. THE METHOD FOR BUILDING THE CORNER POST IS UP TO YOU.

YOU WILL BE SCORED ON THE QUALITY OF YOUR FINISHED PRODUCT, PROPER USE OF MATERIALS AND FASTENERS, THE EFFICIENCY OF YOUR MATERIALS USE, TEAMWORK AND SAFETY.

YOU MUST COMPLETE THIS PROJECT IN THE ALLOWED TIME. THE JUDGES WILL GIVE YOU A 10 MINUTE WARNING BEFORE THE END OF TIME SO THAT YOU CAN FINISH AND CLEAN UP ON TIME.

ALLOW ADEQUATE ROOM FOR WINDOW INSTALLATION.

GALVANIZED NAILS ARE REQUIRED FOR PRESSURE TREATED LUMBER.

HEADERS MUST BE CUT LONG ENOUGH FOR WINDOW INSTALLATION - TEAMS MUST CALCULATE HEADER LENGTH.

INSTRUCTORS / TEACHERS MAY NOT COACH TEAMS DURING THE COMPETITION.

MITER SAWS AND CIRCULAR SAWS MAY BE USED - TEAMS MUST PROVIDE THEIR OWN TOOLS.

NAIL GUNS ARE PROHIBITED DURING FRAMING COMPETITION.

ALL REQUIRED MATERIALS ARE PROVIDED. EX: NAILS, LUMBER, AND PENCILS.

STUD LENGTH IS 92 1 - TEAMS MUST CUT STUDS TO LENGTH.

BOTTOM OF HEADER INSTALL AT 6'-10".

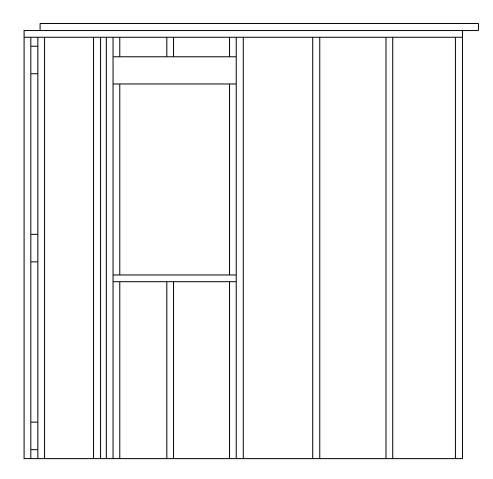
FRAME FOR 2030 WINDOW.

STUD LAYOUT IS 16" OC

## **COS FRAMING COMPETITION**

CRAFTED BY: TRISTAN NELMS, DANIEL MARTINEZ & JULIAN RAMOS





**FRAMING ELEVATION** 

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