



Overhead Crane and Rigging

Overhead Crane: A machine used to lift and move heavy loads horizontally in industrial settings. It typically runs on tracks mounted above the work area and includes a hoist, trolley, and bridge.

Rigging: The process and equipment used to safely attach and lift loads with cranes. It involves tools like slings, hooks, and shackles, and requires careful planning to ensure safety and balance.

1. Understanding Overhead Cranes:

- Overhead cranes move loads horizontally and vertically using a movable bridge and hoisting mechanism.
- They operate on fixed runways and can lift heavy loads.
- Safety is paramount due to the potential hazards associated with crane operations.

2. Pre-Work Inspection:

- **Check for Overhead Obstructions:**
 - Look for power lines, trees, structures, or any obstacles that could interfere with crane movement.
- **Verify Load Ratings:**
 - Ensure that slings, chains, and straps meet or exceed the lift's rating.
 - All slings, straps, and chains must have tags indicating their safe working load.
- **Pinching and Crushing Hazards:**
 - Identify potential pinch points around the crane and load landing area.
 - Mark these areas with paint or chalk for visibility.
- **Barricade Swing Radius:**
 - Prevent unauthorized entry into the swing radius.
 - Barricade the area to keep bystanders safe.



3. During Load Movement:

- **Safe Distances:**
 - Never allow crew members or bystanders to be beneath a suspended load.
 - Keep everyone a safe distance away from the crane during lifting, moving, or lowering.
- **Operator Focus:**
 - Crane operators must concentrate solely on crane operation.
 - Avoid distractions like phone calls or texting.
- **Signal Communication:**
 - Use trained signalpersons who understand industry hand signals.
 - Maintain visual contact between the signalperson and crane operator.
 - Only one person should give signals at a time unless a hazardous situation requires otherwise.

4. Lift Plans:

- **Critical Lifts:**
 - Follow a lift plan for all critical lifts.
 - Distribute copies of the plan to relevant team members.
 - Communicate any changes or modifications promptly.