

OSHA's Compliance Directive for Cranes and Derricks in Construction Standard CPL 02-01-063

OSHA published a revised standard on Subpart CC Cranes and Derricks in Construction on August 9, 2010, with an effective date of November 8, 2010. Due to the complexity of the latest revision, OSHA developed a directive to help Compliance Officers enforce it. The following excerpts from Compliance Directive CPL 02-01-063 may be useful for contractors working to remain compliant and will help identify areas that may need more attention within their own program. I encourage NECA contractors to visit the Compliance Directive for Cranes and Derricks in Construction Standard PDF for more details.

References

29 CFR Part 1926, Subpart H—Materials Handling, Storage, Use, and Disposal

29 CFR Part 1910, Subpart N—Materials Handling and Storage

29 CFR Part 1910, Subpart N—Overhead and Gantry Cranes

29 CFR Part 1926, Subpart V - Electric Power Transmission and Distribution

29 CFR Part 1926, Subpart CC—Cranes and Derricks in Construction

Compliance Inspection Checklist

- ✓ Determine the adequacy of ground conditions beneath the equipment set-up area such as the support/foundation, matting, cribbing, blocking, etc.
- ✓ Check for visible indications of repairs of the equipment.
- ✓ When overhead power lines are on the construction site, ask if the utility owner/operator was contacted and if the lines are energized. Obtain the voltage of the power lines (if known). Verify whether a work zone around the crane was demarcated and what encroachment prevention steps are being used.
- ✓ When a signal person is used on the worksite, verify the individual's qualifications/documentation. Acceptable documents include both physical and electronic records.
- ✓ Verify that the communication system being used by the crane operator and the signal person is the one specified on the signal person's qualification documentation.
- ✓ If lift plans are being used, verify that they are being followed.
- ✓ When equipment is used to hoist personnel, identify who determined that it is infeasible to use another way to reach the work area and that it is necessary to use the crane for this task. This does not apply to steel erection activities under Subpart R.
- ✓ Verify whether employers are holding required meetings, such as planning meetings necessary for working near overhead power lines, conducting Assembly/Disassembly (A/D), or hoisting.



- ✓ Inspect all rigging equipment that is available for workers to use (slings, chokers, shackles, etc.) for damage, wear, safe working load tags, capacity, and safety factor.
- ✓ Verify that load chart and operations' manuals are available, written in a language that the operator understands (specified on the operator's certification), and that the information is applicable to the particular crane. Ask the operator or employer where the documents are kept. For example, see if the serial number on the load chart matches that of the crane. Typically, the serial number is found on the nameplate in the cab and on the front cover of the manual.
- ✓ Verify operator qualifications and training. Observe crane operations and interview both the employer and the operator to determine whether the operator is competent to operate the equipment safely.
- ✓ Verify that the equipment and wire rope inspection requirements have been met and that the documentation is available for all inspections of the equipment. Identify who did the inspection and verify that inspector's qualifications.
- ✓ Determine, through interview and observation, if safety devices and operational aids are functioning through interview or observation. For example, it is possible that employees can be doing other things to compensate for aids and devices that are not functioning properly. For operational aids that are not functioning and have not been repaired, determine whether parts are on order. If parts have been received, document the date of order and/or receipt.
- ✓ Visually inspect the hoisting equipment, components, and load line for visible deficiencies. If needed, use binoculars to examine ropes that cannot be inspected closely from a safe position.
- ✓ Ask what loads have been lifted and how the operator and/or rigger are determining the weight of the load. For example, are they using a bill of lading or marked weight, the load moment indicator, or crane scale? Verify that the weight of the load(s) was within the capacity of the equipment or below 75% of capacity if a load moment indicator was used.
- ✓ Verify that qualified riggers are being used:
 - o For assembly and disassembly work, as per § 1926.1404(r)(1).
 - Whenever workers are within the fall zone and hooking, unhooking, guiding a load, or making the initial connection of a load to a component or structure, as per § 1926.1425(c).
- ✓ When A/D is being performed, ask who the A/D director is and verify whether this person is at the worksite. This could be one person or a competent person who is assisted by one or more qualified persons.
- ✓ If there are mechanics and/or oilers working on or near the equipment:
 - By observation and interview, verify their qualifications regarding the work being performed.
 - Ask how they are communicating with the operator when the equipment is being operated.



- Verify that they are being protected in hazard areas in accord with §§ 1926.1404(e) and
 .1424(a).
- ✓ If fall protection is being used, inspect personal fall arrest systems for compliance with Subpart M at § 1926.502(d).

Qualified Individuals

Qualified individuals, such as, the Assembly/Disassembly (A/D) director, lift director, equipment inspector, operator, registered professional engineer, or qualified rigger will be evaluated on the following:

- ✓ His or her relevant experience with the equipment at the site or similar sites
- ✓ His or her qualifications to perform the activity or make the required determination
- ✓ The extent and duration of his or her crane-related experience
- Any certificates, degrees, or other supporting documents related to the subject matter

Power Line Safety

The purpose of the power line safety provisions are to keep cranes (including cab, boom, and wires and cables, and load) away from power lines. Safe distances must be maintained when working around power lines, refer to 1926.1407-.1411.

NOTE - None of the provisions of work <u>near</u> power lines (1926.1407-.1411) apply to work performed under Subpart V, *Power Transmission and Distribution*, which is work <u>on</u> power lines.

When an employer performs power distribution and transmission work that is covered by Subpart V of 29 CFR Part 1926, the employer may comply with the requirements of § 1926.959 to meet the requirements of §§ 1926.1407 through 1926.1411.

CFR 29 Part 1926, Subpart CC Exemptions

Digger Derricks

In the 2010 Final Rule for Subpart CC, OSHA exempted digger derricks when used for auguring holes for poles carrying electric or telecommunication lines, placing and removing the poles, and handling associated materials to be installed or removed from the poles. In a subsequent rulemaking, OSHA



expanded this exemption to also include digger derricks when used for any work subject to Subpart V of 29 CFR Part 1926 Subpart V.

Powered Industrial Trucks (Forklifts)

Forklifts are covered by Subpart CC when configured with a "winch or hook" and used like a crane. OSHA also explained in the preamble to Subpart CC that forklifts used to suspend a load below the forks were excluded from the standard. OSHA intends to revise the standard to provide more clarity regarding forklift coverage.

Material Delivery

In general, delivery of equipment from the flatbed of a truck to the ground, not positioning or arranging in a sequence for further hoisting, is not considered a construction activity.

Proposed Amendments to Subpart CC

OSHA is currently proposing corrections and amendments to the final standard for cranes and derricks published in August 2010. The standard has many provisions designed to improve crane safety and reduce worker injury and fatality.

Proposed Amendments:

- ✓ Correct references to power line voltage for direct current (DC) voltages as well as alternating current (AC) voltages
- ✓ Broaden the exclusion for forklifts carrying loads under the forks from "winch or hook" to a "winch and boom"
- ✓ Clarify an exclusion for work activities by articulating cranes; provide four definitions inadvertently omitted in the final standard
- ✓ Replace "minimum approach distance" with "minimum clearance distance" throughout to remove ambiguity
- ✓ Clarify the use of demarcated boundaries for work near power lines; correct an error permitting body belts to be used as a personal fall arrest system rather than a personal fall restraint system
- ✓ Replace the verb "must" with "may" used in error in several provisions
- ✓ Correct an error in a caption on standard hand signals
- ✓ Resolve an issue of "NRTL-approved" safety equipment (e.g., proximity alarms and insulating devices) that is required by the final standard, but is not yet available.



The Cranes and Derricks in Construction Standard is lengthy and complex. Contractors should be well versed in the requirements of the standard and be clear on how exemptions apply for utility work. Please take some time to evaluate your program against the regulations. Using the compliance directive will help your company identify gaps in practice or understanding and will help you correct deficiencies before an inspection, or an incident occurs.

NECA Safety is available to address questions and concerns. Please reach out for more information.

Thank you,

Mike Starner