



AMERICAN NATIONAL STANDARD

*ANSI/ASSE A10.42-2000
Safety Requirements for
Rigging Qualifications
and Responsibilities –*

*American National Standard
for Construction and
Demolition Operations*

ANSI/ASSE A10.42-2000



AMERICAN SOCIETY OF
SAFETY ENGINEERS

**Safety Requirements for
Rigging Qualifications
and Responsibilities –**

American National Standard for
Construction and Demolition Operations

Secretariat

American Society of Safety Engineers

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Foreword (This Foreword is not part of American National Standard A10.42.)

This standard establishes minimum criteria of knowledge and performance requirements for a qualified rigger in the construction industry.

This standard is one of a series of safety standards that have been formulated by the Accredited Standards Committee on Safety in Construction and Demolition Operations, A10. It is expected that the standards in the A10 series will find a major application in industry, serving as a guide to contractors, labor, and equipment manufacturers. For the convenience of users, a list of existing and proposed standards in the A10 series for safety requirements in construction and demolition operations follows.

- A10.2 Safety, Health, and Environmental Training
- A10.3 Powder-Actuated Fastening Systems
- A10.4 Personnel Hoists and Employee Elevators
- A10.5 Material Hoists
- A10.6 Demolition Operations
- A10.7 Transportation, Storage, Handling, and Use of Commercial Explosives and Blasting Agents
- A10.8 Scaffolding
- A10.9 Concrete and Masonry Construction
- A10.10 Temporary and Portable Space Heating Devices
- A10.11 Personnel and Debris Nets
- A10.12 Excavation
- A10.13 Steel Erection
- A10.14 Safety Belts, Harnesses, Lanyards, and Lifelines
- A10.15 Dredging
- A10.16 Tunnels, Shafts, and Caissons
- A10.17 Safe Operating Practices for Hot Mix Asphalt (HMA) Construction
- A10.18 Temporary Floor Holes, Wall Openings, Stairways, and Other Unprotected Edges
- A10.19 Pile Installation and Extraction Operations (under development)
- A10.20 Ceramic Tile, Terrazzo, and Marble Work
- A10.21 Proper Cleaning and Disposal of Contaminated Work Clothing
- A10.22 Rope-Guided and Nonguided Workers' Hoists
- A10.23 Back Injury Prevention Programs
- A10.24 Roofing (under development)
- A10.27 Hot Mix Asphalt Facilities
- A10.28 Work Platforms Suspended from Cranes or Derricks
- A10.31 Digger-Derricks
- A10.32 Fall Protection Systems for Construction Industry Users (under development)
- A10.33 Safety and Health Program Requirements for Multi-Employer Projects (under development)
- A10.34 Public Protection (under development)
- A10.35 High Pressure Hydro Blasting (under development)
- A10.37 Debris Nets
- A10.38 Basic Elements of a Program to Provide a Safe and Healthful Work Environment
- A10.39 Safety and Health Audit Program
- A10.41 Equipment Operator and Supervisor Qualifications and Responsibilities (under development)
- A10.42 Rigging Qualifications and Responsibilities

One purpose of these standards is to serve as guides to governmental authorities having jurisdiction over subjects within the scope of the A10 Committee standards. If these standards are adopted for governmental use, the reference of other national codes or standards in individual volumes may be changed to refer to the corresponding regulations.

Revisions: The A10 Committee welcomes proposals for revisions to this standard. Revisions are made periodically (usually 5 years from the date of the standard) to the standard to incorporate changes that appear necessary or desirable, as demonstrated by experience gained from the application of the standard. Proposals should be as specific as possible, citing the relevant paragraph number(s), the proposed wording, and the reason for the proposal. Pertinent documentation would enable the A10 Committee to process the changes in a more timely manner.

Interpretations: Upon a request in writing to the Secretariat, the A10 Committee will render an interpretation of any requirement of the standard. The request for interpretation should be clear, citing the relevant paragraph number(s) and phrased as a request for a clarification of a specific requirement. Oral interpretations are not provided.

No one but the A10 Committee(through the A10 Secretariat) is authorized to provide any interpretation of this standard.

Approval: Neither the A10 Committee nor American National Standards Institute (ANSI) "approves," "certifies," "rates," or "endorses" any item, construction, proprietary device, or activity.

Appendixes: Appendixes are included in most standards to provide the user with additional information related to the subject of the standard. Appendixes are not part of the approved standard.

Committee Meetings: The A10 Committee meets twice a year. Persons wishing to attend a meeting should contact the Secretariat for information.

Standard Approval: This standard was processed and approved for submittal to ANSI by the American National Standards Committee on Safety in Construction and Demolition Operations, A10. Approval of the standard does not necessarily imply (nor is it required) that all Committee members voted for its approval. At the time it revised this standard, the A10 Committee had the following members:

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American National Standard for Construction and Demolition Operations—

Safety Requirements for Rigging Qualifications and Responsibilities

1 General

1.1 Scope

This standard establishes minimum criteria of knowledge and performance requirements for a qualified rigger in the construction industry.

1.2 Purpose

This standard is designed to assist in achieving reasonable safety of all persons and materials during the process of, or as the result of, rigging, lifting, or moving of loads.

1.3 Modifications and Exemptions

In cases of practical difficulties, unnecessary hardships, or new developments, exceptions to the literal requirements may be granted by the enforcing authority to permit the use of other devices or methods, but only when it is clearly indicated that the equivalent protection is thereby secured.

1.4 Limitations

This standard does not apply to the training required to be qualified as an operator of powered equipment. This standard does not apply to transportation of loads or maintenance or repair of powered or manual hoists, cranes, winches, or other hoisting equipment.

Commentary: While the qualified rigger is required to know the basic principles and limits of lifting and hoisting equipment, he or she is expected to rely on qualified operators, mechanics, suppliers, engineers, managers, and others involved for valid information, and for competent performance by these other persons in their respective roles. For instance, a rigger may be responsible to determine loads and the farthest radius of a pick, but then must rely on a crane operator to know the safe crane capacity for the configuration and setup of that crane. This principle also applies to operators of hoists, winches, helicopters, etc. Similarly, if a rigger determines that a 5-ton picking beam is

needed, he or she can rely on a manager, an engineer who provides specifications, or a supplier who provides a product for the rigger's use.

1.5 Mandatory and Advisory Rules

Mandatory rules of this standard are characterized by the word "shall." If a rule is of an advisory nature, it is indicated by the word "should," or is stated as a recommendation or commentary. The Appendixes are advisory.

1.6 Equivalent

The word "equivalent" in this standard shall mean alternative materials, designs, or features that will provide an equal degree of strength and safety.

2 Definitions

2.1 ANSI: American National Standards Institute

2.2 attachment: A device other than conventional forks or load backrest extension, mounted permanently or removably on the elevating mechanism of a fork truck for handling the load. Popular types are fork extension clamps, rotating devices, side shifters, load stabilizers, rams, and booms.

2.3 cable: A term loosely applied to wire ropes, wire strands, manila ropes, and electrical conductors.

2.4 clip: A fitting used to clamp two parts of wire rope (also known as wire rope clip, wire rope clamp).

2.5 competent person: One who is capable of identifying existing and predictable hazards in the surroundings or working conditions that are unsanitary, hazardous, or dangerous to employees, and who has authorization to take prompt corrective measures to eliminate them.

2.6 crane: A machine used for lifting and lowering a load vertically and moving it horizontally