



NATIONAL RIGGING & CRANE TRAINING LLC

CONSTRUCTION-INDUSTRIAL-SAFETY SERVICES

Contact : 716-818-4720

Peter.Cooke@nrctpro.com

www.nrctpro.com

About US

Why Choose NRCT?

NRCT is owned and operated by Peter Cooke. Peter holds a bachelors degree in Industrial Engineering. His career has spanned over 20 years as an Engineer and Training Manager for the Columbus McKinnon Corporation. For over two decades he designed below the hook lifting devices, specialty forged rigging equipment and slings. As the corporate training manager, he developed training certification programs for rigging, hoist & crane, operations, repair and inspections. Mr. Cooke serves on the ASME B30.9 Slings sub committee. He is also a Board of Director and Chairman of the Rigging Certification Committee for Crane Institute Certification, assisting with Rigger and Master Rigger Certification development and exam writing. He also served on NCCCO Rigging Certification task force and helped develop their Level 1 and 2 rigging certification exams. NRCT is very excited to share over 20 years of industry knowledge and experience through sound training programs.

Get Trained by the best!

Get trained by the person with first hand industry knowledge. You want the best we got the best!

Mission Statement

Forging elite riggers, crane operators and inspectors throughout the industrial world.



Training and Services

Rigger Qualification

Certified Rigger/Signalperson
Advanced Rigging
Lift Planner
Load Securement

Overhead Crane - Operator Qualification

Crane Operator Basic 4 hour
Crane Operator Train the Trainer
Lift Supervisor-Crane Owner Management

Mobile Crane:

Mobile Crane Operator (Late Summer 2017)

Inspector Certification

Certified Level 1 Rigging Gear
Certified Level 2 Rigging Gear and Manual Hoist
Certified Level 3 Overhead Crane/Hoist & Rigging
Frequent Monthly Inspections
Electric Hoist Troubleshooting
Static Stepless Crane Controls

Services

Accident Investigation and Litigation Support
Site Material Handling Safety Audits
Consultation-ASME & OSHA Interpretation



NATIONAL RIGGING & CRANE TRAINING LLC

CONSTRUCTION-INDUSTRIAL-SAFETY SERVICES

Contact : 716-818-4720

Peter.Cooke@nrctpro.com

www.nrctpro.com

1 day: Certified Rigging Gear/Sling Inspector

Regular periodic inspections of slings and rigging equipment by a qualified person has a direct impact on rigging safety. This comprehensive course will cover in detail OSHA 1910.184, and applicable ASME and manufactures inspections requirement of sling and rigging equipment. Hands on assessment and written test at conclusion of course

Inspection of:

- alloy steel chain
- wire rope
- metal mesh
- natural or synthetic fiber rope (conventional three strand construction)
- synthetic web (nylon, polyester, and polypropylene).
- Eyebolts,
- Hoist Rings
- Turnbuckles
- Wire Rope Clips
- Rings
- Swivels
- Hooks-Rigging Blocks
- Below the hook lifters



NATIONAL RIGGING & CRANE TRAINING LLC

Contact : 716-818-4720
Peter.Cooke@nrctpro.com
www.nrctpro.com

Basic Rigging 4 hr.

This class is for riggers who are lifting routine type loads. Load weights, center of gravity and share of load on pick points are known. Production type lifts

- Inspection
- Hitches
- Sling Configurations: Chain, Wire Rope, Synthetics
- Interpretation of Load Charts
- D/d Ratios
- Shackle Applications
- Lift points
- Eyebolts and Swivel hoist ring use
- Plate Clamps
- Written test



NATIONAL RIGGING & CRANE TRAINING LLC

Contact : 716-818-4720

Peter.Cooke@nrctpro.com

www.nrctpro.com

Rigger- Signal Person

1 day Training: Level 1 rigger Signal Person 8 hr.

This class is for riggings who are lifting routine type loads. Load weights, center of gravity and share of load on pick points are known.

- Inspection
- Hitches
- Sling Configurations: Chain, Wire Rope, Synthetics
- Interpretation of Load Charts
- D/d Ratios
- Shackle Applications
- Lift points
- Eyebolts and Swivel hoist ring use
- Plate Clamps
- Sling Tensions
- Knots
- Hand Signals
- Written Test



NATIONAL RIGGING & CRANE TRAINING LLC

Contact : 716-818-4720

Peter.Cooke@nrctpro.com

www.nrctpro.com

Certified Rigger Signal Person

1 day Training: Level 1 rigger Signal Person 8 hr.

This class is for riggings who are lifting routine type loads. Load weights, center of gravity and share of load on pick points are known. This class is a prerequisite for level 2 advanced rigging and lift planning. Crane Institute Certification Exam Given the 2rd day.

- Inspection
- Hitches
- Sling Configurations: Chain, Wire Rope, Synthetics
- Interpretation of Load Charts
- D/d Ratios
- Shackle Applications
- Lift points
- Eyebolts and Swivel hoist ring use
- Plate Clamps
- Sling Tensions
- Knots
- Hand Signals
- Certification Test Preparation



NATIONAL RIGGING & CRANE TRAINING LLC



Contact : 716-818-4720

Peter.Cooke@nrctpro.com

www.nrctpro.com

3 day Course: Level 2 Qualified Rigger/Rigging Inspection & Signal Person: 24 hr

The Level 2 Qualified Rigger Signal Person is known as a "professional rigger", "Advanced" or "Master Rigger" . This type of rigger if lifting continually involved with non routine lifts, responsible for getting equipment and materials in place for construction or repair of facilities A level 2 will be able to calculate load weights, center of gravity, share of load on lift points, calculate sling tensions, size and reach. In addition, they also have the ability to calculate mechanical advantage using snatch blocking, including line pull and load pull on pulley systems. Level 2 riggers may incorporate chainfalls and lever tools as part of their sling systems and use them as compensators or perform load drifts. Rigging and Signal Person Certification is available as an option through Crane Institute Certification.

Course Content

- Rigging Gear Inspection
- Sling Inspection
- Below the hook lifter Inspection
- Load Chart Interpretation
- Sling applications
- Proper Use of Shackles
- Lift Points-Swivel Hoist Rings-Eyebolts
- Sling Tension Calculations
- Load Weight Calculations
- Finding the Center of Gravity
- Share of load
- Load Drifting
- Hoist Compensators
- Tensioning
- Snatch blocking



NATIONAL RIGGING & CRANE TRAINING LLC

Overhead Crane Operator Safety 4 hr

Proper Operation training by a qualified person will have a direct impact on safety and the operating life of the crane. OSHA and ASME B30.2 and B30.17 require all crane operators to be trained, competent and qualified. This safety course is for production type lifts, jibs and hoist. Proper crane safety rules will be taught.

Course outline

- Operator Requirements
- Crane and Hoist components overview
- Pre-Operational Inspections
- Basic Proper Rigging techniques
- Identifying unsafe situations



NATIONAL RIGGING & CRANE TRAINING LLC



Qualified Overhead Crane Operator 8 hr

Proper Operation training by a qualified person will have a direct impact on safety and the operating life of the crane. OSHA and ASME B30.2 and B30.17 require all crane operators to be trained, competent and qualified. Training must consist of a written test and practical evaluations.

Course outline

- Operator Requirements
- Crane and Hoist components overview
- Pre-Operational Inspections
- Basic Proper Rigging techniques
- Identifying unsafe situations
- Hand Signals
- Written Test
- Hands on evaluation



NATIONAL RIGGING & CRANE TRAINING LLC



Qualified Overhead Crane Operator –Rigger and Signaling 16 hr.

Proper Operation training by a qualified person will have a direct impact on safety and the operating life of the crane. OSHA and ASME B30.2 and B30.17 require all crane operators to be trained, competent and qualified. Training must consist of a written test and practical evaluations.



Course outline: Day 1

- Operator Requirements
- Crane and Hoist components overview
- Pre-Operational Inspections
- Identifying unsafe situations
- Hand Signals
- Written Test
- Hands on evaluation

Day 2: Qualified Rigger -Signaling

- Inspection
- Hitches
- Sling Configurations: Chain, Wire Rope, Synthetics
- Interpretation of Load Charts
- D/d Ratios
- Shackle Applications
- Lift points
- Eyebolts and Swivel hoist ring use
- Plate Clamps
- Sling Tensions
- Knots
- Hand Signals
- Written Test



NATIONAL RIGGING & CRANE TRAINING LLC

Qualified Overhead Crane Operator –Level 2 : Advanced Rigger and Signaling 24 hr.

Proper Operation training by a qualified person will have a direct impact on safety and the operating life of the crane. OSHA and ASME B30.2 and B30.17 require all crane operators to be trained, competent and qualified. Training must consist of a written test and practical evaluations. Course is designed for those making non routine lifts.

Crane Operations: Day 1

- Operator Requirements
- Crane and Hoist components overview
- Pre-Operational Inspections
- Identifying unsafe situations
- Hand Signals
- Written Test
- Hands on evaluation



Day 2: Qualified Rigger -Signaling

- Inspection
- Hitches
- Sling Configurations: Chain, Wire Rope, Synthetics
- Interpretation of Load Charts
- D/d Ratios
- Shackle Applications
- Lift points
- Eyebolts and Swivel hoist ring use
- Plate Clamps
- Sling Tensions
- Knots
- Hand Signals
- Written Test

Day 3: Advanced Rigger

- Load Weight Calculations
- Finding the Center of Gravity
- Share of load
- Load Drifting
- Hoist Compensators
- Tensioning
- Snatch blocking
- Jacking
- Written Test



Overhead Crane and Hoist Inspection Certification: 3 days

Proper inspections and maintenance by a qualified person have a direct impact on the safety and operating life of a crane. This comprehensive course covers the requirement for periodic inspection for monorail, top running underhung hoist and trolley, top running multiple girder top running hoist and trolley. Students will thoroughly review OSHA 1910.179, ASME, CMAA and manufacturers requirements. A written test will be administered at the conclusion of the course.

Course Content

- OSHA 1910.179 Requirements
- ASME B30.2 Requirements
- ASME B30.17 Requirements
- ASME B30.16 Requirements
- ASME B30.21 Requirements
- CMAA 70-74-78
- Periodic/Frequent Inspection of Hoist and Trolleys
- Periodic Inspection/Frequent Inspection of Hooks
- Periodic Inspection/Frequent Inspection of Chain and Wire Rope
- Monthly Inspections
- Load Testing procedures
- Safety Devices
- Crane Structures-Bridge, end trucks, runways
- Control mechanisms-pendant-radio-cab
- Brakes- mechanical-electrical
- Electrical Component overview
- Gears
- Below the hook devices
- Rigging Equipment



Powered Hoist Periodic Inspection-Maintenance-Troubleshooting

1 Day Course

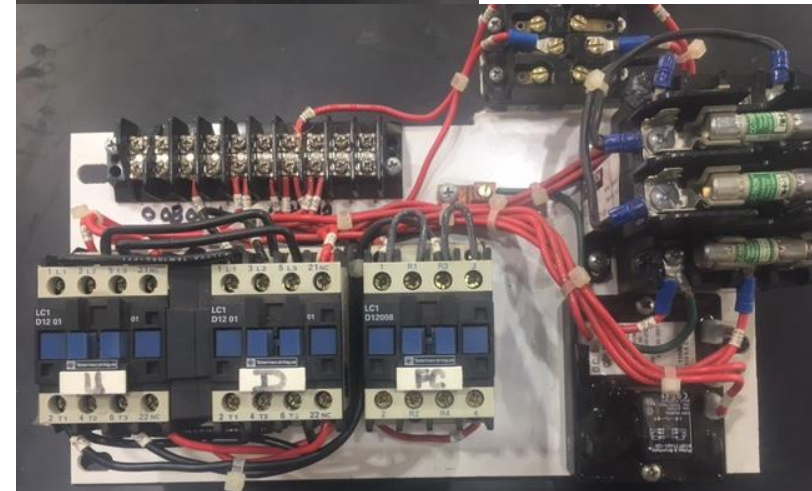
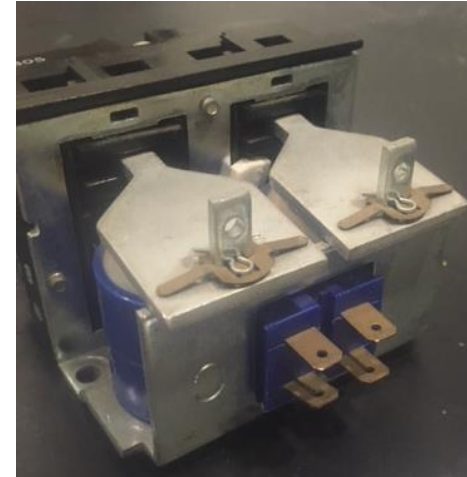
This Course will cover in detail the proper ways to conduct periodic inspections and troubleshooting of powered hoists. It is required by ASME B30.16 that inspectors and maintenance technicians be properly trained. A large emphasis will be on understanding hoist electrical circuits and troubleshooting.

Course Content

- ASME B30.16 requirements
- Manufacturer requirements
- How a powered hoist works
- Understanding-Reading electrical schematic
- Control Circuits
- Limit switch types and settings
- How air hoist work
- Upper and lower hook inspections
- Chain Inspections
- Wire Rope Inspections
- Identification requirements
- Hoist applications-cycling
- Mechanical Load Brakes
- Electrical Holding brakes
- Gear Box Inspection
- Lift wheel or Drum Inspection
- Lubrication
- Load Testing Requirements



NATIONAL RIGGING & CRANE TRAINING LLC



1 day: Manual Hoist Periodic Hoist Inspection and Troubleshooting

This course will cover in detail the proper ways to conduct periodic inspections and repair of chainfalls and lever hoists.

Course Content. It is required by ASME B30.16 and ASME B30.21 that inspectors and maintenance be properly trained.

- ASME B30.16 requirements
- Manufacturer requirements
- Upper and Lower Hook Inspections
- Chain Inspection
- Identification requirements
- Weston Brake Inspection
- Suspension Components
- Lubrication
- Load Testing Requirements
- Operational Inspections
- Documentation
- Gear housing inspection
- Lift wheel Inspection
- Written Test administered at conclusion of training



NATIONAL RIGGING & CRANE TRAINING LLC

