

APPENDIX A

SKILLED CONSTRUCTION CRAFT LABORER

D.O.T. Code 869.463-580

O*NET Code 47-2061.00

Time-Based

A Skilled Construction Craft Laborer (SCCL) works independently and in support of other crafts on a wide variety of jobs in the construction industry. SCCLs work in virtually all sectors of the industry: Building Construction, Heavy/Highway and Utility Construction, Mason and Plaster Tending, Demolition and Deconstruction, Pipeline, Tunneling, Environmental Remediation, and Landscaping.

SCCLs use many different pieces of equipment while performing their job duties, including, but not limited to: chainsaws, soil compactors, compressors, mixers for concrete and masonry work, hoists, rough terrain forklifts, survey equipment, and a large number of hand and power tools.

Often, SCCLs find themselves working on numerous jobsites in different industry sectors throughout their apprenticeship and in their careers as journeyworkers. An apprentice may spend three months on a concrete crew working on a new high-rise office building; then go to work on a multi-lane highway project assisting in raking, placing and compacting asphalt; then spend a few months on an asbestos abatement project.

Some SCCLs, on the other hand, especially in larger metropolitan areas, spend their entire careers in one industry "concentration." Many SCCLs obtain career-long employment building scaffolding, mixing mortar, tending masons, and running rough terrain forklifts for masonry contractors.

This training outline is the current standard for Work Processes and Related Instruction. Changes in technology, regulations, and safety/health issues may result in the need for additional on-the-job or classroom-type learning.

WORK PROCESSES

All apprentices must complete the following Work Process:

Core Work Skills 2,000 Hours

Approximate Hours

A. Site preparation, layout, cleanup and security **400**

Core Work Skills - continued

B.	Use and understand basic blueprint symbols and views	25
C.	Recognize, secure and maintain job site safety	500
D.	Identify and work safely around potential or identified environmental hazards	25
E.	Erect, dismantle, maintain and work from scaffolds or lifts	100
F.	Operate and maintain hand and power tools used in the trade	300
G.	Operate and maintain equipment used in the Trade	125
H.	Identify, estimate, move, supply, stock, and store materials	500
I.	Use appropriate hand signals	25

Concentrations

Each apprentice must complete anywhere from 1 – 8 of the following concentrations. Selection of which concentration(s) will be completed is at the sponsor's option depending upon their particular needs.

<u>Number of Concentration(s) Selected</u>	<u>Hours per Concentration</u>
1	2,000
2	1,000
3	667
4	500
5	400
6	334
7	286
8	250

(Please note: Any apprentice choosing more than six Concentrations will need to use either a Blue Book which provides space for On-the-Job Training (OJT) in every Concentration chosen, or an Apprenticeship Training Central Office Approved Alternate Method of Recordkeeping. Your ATR can assist you in obtaining either of these documents.)

J. Building Construction

The following list of tasks is performed in connection with new building construction or maintenance of existing buildings. It includes many typical

Laborer job duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Mixing, placement and vibration of concrete. Removing and cleaning forms. Curing of concrete.
2. Pipe laying and making of connections for any utility piping.
3. Hoisting materials, tools, equipment and other trade-related items using such equipment as slings, well wheel pulleys, chain falls. Rigging of cranes from the "hook down".
4. Cutting and burning.
5. Traffic control/flagging. (*not to exceed 200 hours*)
6. Trenching and excavating (excluding operation of heavy equipment).
7. Grade setting/checking (if in keeping with area practice).
8. Clearing, bucking and falling.
9. Site preparation/cleanup and security (excluding operation of heavy equipment).
10. Laying out and staking (if in keeping with area practice).
11. Erecting, dismantling and maintaining scaffold.
12. Identifying, inspecting, using and maintaining all tools specific to this concentration: hand, electric, gas, pneumatic, powder.
13. Installing erosion control systems (excluding operation of heavy equipment).
14. Operating rough terrain forklift to assist in moving materials. Operating tow motor inside building (if applicable).
15. Operating aerial lift.

K. Heavy/Highway and Utility Construction

The following tasks are performed in association with the construction of infrastructure such as roads, railroads, bridges, docks, locks, dams and utility installation. It includes many typical Laborer job duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Mixing, placing, vibrating concrete. Removing and cleaning forms. Curing concrete.
2. Cutting and coring concrete.
3. Pipelaying and making of connections for any utility piping.
4. Hoisting tools, materials, equipment and other

- trade-related items using such equipment as slings, well wheel pulleys, chain falls. Rigging of cranes from the “hook down”.
5. Traffic control/flagging. (*not to exceed 200 hours*)
 6. Trenching and excavating (excluding operation of heavy equipment).
 7. Grade setting/checking (if in keeping with area practice).
 8. Laying out and staking (if in keeping with area practice).
 9. Site preparation/cleanup and security (excluding operation of heavy equipment).
 10. Drilling, using air-track drill or jackhammer.
 11. Preparing base, raking, placing, and compacting asphalt using such tools and equipment as: rake, shovel, walk-behind remote controlled rollers and tampers (excluding operation of heavy equipment).
 12. Building railroad beds and all related bridges and tunnels; installing tracks (excluding operation of heavy equipment).
 13. Erecting, dismantling and maintaining scaffold.
 14. Identifying, inspecting, using and maintaining all tools specific to this concentration: hand, electric, gas, pneumatic, powder.
 15. Installing erosion control systems (excluding operation of heavy equipment).
 16. Operating rough terrain forklift to assist masons and to move materials. Operating tow motor inside building (if applicable).
 17. Operating aerial lift.
 18. Site/roadside remediation (excluding operation of heavy equipment).

L. Masonry Tending

The following tasks are performed to assist masons with such work as new construction, renovation and refractory. It includes many typical Laborer job duties, but it is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Erecting/dismantling and maintaining scaffold.
2. Estimating, stocking and maintaining supply areas.
3. Identifying, inspecting, using and maintaining tools specific to this concentration: hand, electric, gas, pneumatic.
4. Operating rough terrain forklift to assist in moving materials. Operating tow motor inside building (if applicable).
5. Operating aerial lift.
6. Mason tending/ Plasterer tending:

- a. Bracing walls.
- b. Mixing mortar or plaster, including colored versions.
- c. Estimating and stocking masonry units.
- d. Cutting masonry units.
- e. Supplying, stocking and dispensing mortar, plaster, block/brick, reinforcing materials , other trade-related materials.
- f. Operating and maintaining plaster or grout pump.
- g. Layout and cleaning of plaster or grout pump.
- h. Fireproofing Operations (if in keeping with area practice).
- h. Tending application of exterior insulation finish systems, such as Dryvit system.
- i. Tending interior plaster restoration operations.
7. Cleaning masonry walls, using scaffold/personnel lift, bucket, hose (if in keeping with area practice). Removing algae stains and efflorescence from masonry walls.

M. Demolition and Deconstruction

The following list of tasks are performed in connection with the demolition or deconstruction of buildings and other structures. It includes many typical Laborer job duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Identifying and working safely around potential environmental hazards.
2. Erecting/dismanting and maintaining scaffold.
3. Cutting and burning.
4. Hoisting materials, tools, equipment and other trade-related items using such equipment as slings, well wheel pulleys, chain falls. Rigging of cranes from the "hook down".
5. Trenching and excavating (excluding operation of heavy equipment).
6. Operating aerial lift.
7. Site preparation/cleanup and security (excluding operation of heavy equipment).
8. Identifying, inspecting, using and maintaining all tools specific to this concentration: hand, electric, gas, pneumatic.
9. Conducting fire watch.
10. Cutting concrete using such equipment as saws, high-pressure water jet, or burning wand.
11. Operating walk-behind crawler-mounted dingo.
12. Handling and managing demolition debris (recycling, reuse, disposal). Using such equipment as: rough terrain forklift, power buggy, skid steer, hanging

chute, poly sheeting. Palletizing and tagging for reuse.

N. Pipeline

The following list of tasks are performed in connection with the construction and maintenance of pipelines for the transmission and distribution of gas, oil, and other materials. It includes many typical Laborer job duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Hoisting materials, tools, equipment and other trade-related items using such equipment as slings, well wheel pulleys, chain falls. Rigging. Rigging of cranes from the “hook down”.
2. Trenching and excavating (excluding operation of heavy equipment).
3. Site preparation/cleanup and security (excluding operation of heavy equipment).
4. Identifying, inspecting, using and maintaining all tools specific to this concentration: hand, electric, gas, pneumatic.
5. Grade setting/checking (if in keeping with area practice).
6. Laying out and staking (if in keeping with area practice).
7. Clearing and maintaining right-of-way (excluding operation of heavy equipment).
8. Dewatering, sometimes using submersible pumps.
9. Locating underground utilities by reading plans and specifications, using metal scope, potholing (daylighting) using such methods as: hand digging, air or water vacuum excavation.
10. Laying out/erecting/maintaining/dismantling temporary protective fencing.
11. Loading and unloading pipe.
12. Filling and placing sandbags manually.
13. Loading, unloading and placing skids (wooden beams on which piping will sit).
14. Installing erosion control systems (excluding operation of heavy equipment).
15. Preparing pipe surface by cleaning with rag, wire brush, wire wheel, or sandblasting using regular compressor.
16. Applying pipe coating using methods including: powder coating operations, brushing on epoxy, applying shrink sleeve, applying tape.
17. Inspecting pipe visually and using a “holiday” detector.
18. Patching pipe.

19. Installing pipe coating protection, using methods such as laying foam into ditches or “wrapping” pipe with a rock shield.
20. Preventing pipe corrosion by attaching cathodic protection.
21. Assisting operators or techs with “pigging” pipe.
22. Remediating right-of-way (excluding operation of heavy equipment).

O. Tunneling

The following list of tasks may be performed in connection with all work underground or in compression chambers, including tending of the outer air lock. It includes many typical Laborer job duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Drilling using air tracks, jack legs, jack hammers.
Assisting with operation of tunnel boring machines.
2. Identifying, inspecting, using and maintaining all tools specific to the concentration: hand, electric, gas, pneumatic.
3. Hoisting materials, tools, equipment and other trade-related items using such equipment as slings, well wheel pulleys, chain falls. Rigging of cranes from the “hook down”.
4. Operating and maintaining concrete pump.
5. Installing services such as: track laying, conveyors, vents, water, compressed air pipes, etc.
6. Installing tunnel supports (steel ribs, mesh, rock bolts) manually, including drilling and tying mesh.
7. Grouting shaft and tunnel, using grout pumps.
8. Applying shotcrete/gunite (if in keeping with area practice).
9. Cutting and burning.

P. Environmental Remediation

The following list of tasks is performed in connection with the remediation of areas, buildings and materials contaminated with chemical, biological and physical hazards. It includes many typical Laborer job duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Abating asbestos.
2. Remediating hazardous waste.
3. Abating lead.
4. Remediating microbial contamination including: mold,

- fungi, bacteria.
5. Performing radiation protection and handling radioactive materials; including screening off appropriate areas, decontaminating, abating, and moving of materials.
 6. Assisting in restoration of water/fire-damaged structures. *(Asbestos, lead, and hazardous waste awareness should be prerequisites).*
 7. Erecting/dismantling and maintaining scaffold.
 8. Identifying, inspecting, using and maintaining all tools specific to this concentration: hand, electric, gas, pneumatic.
 9. Operating aerial lift.

Q. Landscaping

The following list of tasks is performed in connection with landscape work in commercial applications. It includes many typical Laborer duties, but is not meant to be all-inclusive. The specific tasks that will be completed are at the option of the sponsor.

1. Trimming and pruning hedges, trees and shrubs.
2. Seeding and sodding lawns.
3. Installing irrigation systems.
4. Installing retaining walls made of timbers, rocks, stone using tools including: shovel, pick, chain saw, demolition saw.
5. Applying fertilizers and pesticides, both those used traditionally and newer alternative “green” products.
6. Planting and maintaining flowers and ground covers.
7. Assisting skilled tradespersons in installing all kinds of fences. Installing and maintaining planters. Constructing, maintaining, and installing playgrounds, gazebos and fountains (may work as part of a composite crew of two or more trades).
8. Maintaining and repairing small engines.
9. Identifying, inspecting, using and maintaining all tools specific to this concentration: hand, electric, gas, pneumatic.
10. Controlling traffic/flagging. *(not to exceed 200 hours)*
11. Operating landscape equipment related to the occupation, such as: power buggies, seed spreaders, hydroseeders (excluding driving). *(Excluding operation of heavy equipment).*

TOTAL HOURS

4,000

(Core Skills: 2,000 hours + Concentration(s): 2,000 hours = minimum of 4,000 hours)

Apprenticeship work processes are applicable only to training curricula for apprentices in approved programs. Apprenticeship work processes have no impact on classification determinations under Article 8 or 9 of the Labor Law. For guidance regarding classification for purposes of Article 8 or 9 of the Labor Law, please refer to <http://www.labor.state.ny.us/workerprotection/publicwork/PDFs/Article8FAQS.pdf>.

DRAFT

APPENDIX B

SKILLED CONSTRUCTION CRAFT LABORER

RELATED INSTRUCTION

CORE SKILLS

Each apprentice must complete all 175 hours of the Core Skill Related Instruction

OSHA 10-hour Construction Safety and Health
Hazard Communication/Right-to-Know
Fall Protection
Scaffold User
Confined Space Awareness
First Aid/CPR – minimum 6.5 hours every 3 years
Craft Orientation
 Introduction to the General Construction Industry (if available)
 Building a Career as a Laborer (if available)
 Good Work Habits
 Productivity
 Growth Areas in Construction Employment (if available)
General Laborer Skills:
 Work and Role of a Laborer (if available)
 Jobsite Safety
 Measurement
 Basic Construction Math
 Safe Hand and Power Tool Operation
 Identification and Handling of Materials
Blueprint Reading
 Basics of Reading and Interpreting
 Symbols
 Line Conventions
 Views
Signaling methods: hand, traffic, flagging
Sexual Harassment Prevention Training – minimum 3 hours

Minimum Total Hours 175

CONCENTRATIONS

Each apprentice must complete a total of 125 hours of Related Instruction for all of his/her concentrations combined.

Building Construction Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Rough Terrain Forklift
Scaffold Builder
Aerial Lift
Hoisting and Rigging
Fire Watch
Cutting and Burning
Concrete
Pipe Laying
Line and Grade
Elective Course(s) - *see list at end of Appendix B*

Heavy/Highway and Utility Construction Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Rough Terrain Forklift
Aerial Lift
Hoisting and Rigging
Concrete
Pipe Laying
Line and Grade
Asphalt
Traffic Control
Drilling
Scaffold Builder
Elective Course(s) – *see list at end of Appendix B*

Masonry Tending Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Rough Terrain Forklift
Scaffold Builder
Aerial Lift

Mason/Bricklayer/Plasterer Tending
Elective Course(s) – see list at end of Appendix B

Demolition and Deconstruction Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Scaffold Builder
Aerial Lift
Hoisting and Rigging
Demolition/Deconstruction
Fire Watch
Cutting and Burning
Elective Course(s) – see list at end of Appendix B

Pipeline Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Hoisting and Rigging
Line and Grade
Pipeline
Elective Course(s) – see list at end of Appendix B

Tunneling Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Hoisting and Rigging
Fire Watch
Cutting and Burning
Shotcrete
Tunnel Worker
Drilling
Elective Course(s) – see list at end of Appendix B

Environmental Remediation Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Aerial Lift
Asbestos Worker – successful completion of a course approved by the New York State Department of Health for “Asbestos Handler (Worker)” and obtaining, and keeping current, an “Asbestos Handler (Worker)” Certificate from the New York State Department of Labor
HAZWOPER – 40-hour Certification and successful completion of annual

refresher course
Microbial Remediation
Lead Abatement Worker – 16 hours – approved by the United States
Environmental Protection Agency (EPA)
Elective Course(s) – *see list at end of Appendix B*

Landscaping Concentration

Sponsor may choose from the topics below. Choices should match the work the apprentice is doing on the job as much as possible.

Landscaping
Landscape Equipment Operation
Brick Paver Installation (if in keeping with area practice)
Retaining Wall Installation
Irrigation Installation
Elective Course(s) – *see list at end of Appendix B*

Elective Courses

In addition, any course listed for a concentration the apprentice will not be completing may also be treated as an Elective Course.

Construction Math
Disaster Site Worker
Aboveground Drilling, e.g. “air tracks” and jackhammers
Green Construction and Its Effects on the Laborer Trade
Green Roofs (installing/maintaining such items as waterproof membranes, root barriers, growing media, vegetation, drainage and irrigation systems)
Lead and Silica in Bridges
Lead Renovation, Repair and Painting (training by an EPA-approved provider)
Material Hoist Attendant (“BellRinger”)
Metric Measurement in Construction
Laborer Work in Nuclear Power Plants or Areas Controlled for Radiological Purposes
Permit Required Confined Space
Radiation Remediation
Respiratory Protection
Restoration Technician (Fire/Flood Damage)
Silica Awareness
Solar Panel Installation (excluding electrical hookup)
Underground Storage Tank Removal
(non-transportation fuel tanks only; excluding use of heavy equipment)