NORTHERN ARIZONA UNIVERSITY | Environmental Health and Safety

Contractor Safety Program

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I. Program Goals and Objectives

This program establishes minimum guidelines for safety and accident prevention during construction, renovation, and maintenance activities at Northern Arizona University (NAU). And it identifies safety roles and responsibilities for construction/renovation stakeholders in accordance with University Environmental Health and Safety (EHS), OSHA, Contracts, Fire Marshal, and other applicable policies and regulations.

II. Scope and Application

The Contractor Safety Program applies to all contractors who perform construction or maintenance activities on behalf of NAU. The term 'Contractor' is to be construed liberally, to apply to all vendors who have on-site construction or maintenance activities as identified below. For the purposes of this program, the term 'Contractor' does not apply to subcontractors. Subcontractors are considered employees of the contractor and the contractor is responsible for subcontractors and their actions.

Construction and maintenance activities may include, but are not limited to, plumbing, electrical, carpentry, landscaping, telecommunications, recycling, elevator repair and maintenance, window washing or repair, roofing, machinery or equipment installation/removal, crane operations, hot work operations, utility plant services, HVAC, custodial services, painting, pest control, hazardous and universal waste handling and disposal, survey and investigation activities, and other similar activities when performed by a contractor.

Contractors retain primary responsibility for the safety of their worksites, employees, and the safety of any NAU staff, faculty, or students they come in contact with or who are affected by the work they perform. Contractors are accountable for maintaining regulatory compliance, implementing effective safety programs, providing adequate training to workers/site entrants, and adherence to all regulatory or campus reporting requirements.

Contractors must coordinate all work with their project manager, which is defined as their main point of contact for work being performed on university property (e.g., NAU, Project Manager, Trade Supervisor, Department head, Building Manager, other University Representative).

III. Roles and Responsibilities

A. Contractor

i. Adhere to this program, Applicable NAU technical standards, and the NAU EHS Policy.
ii. Adhere to the terms laid out in the signed contract, PO, task order, or other signature-required documents while executing work.
iii. Responsible for following and enforcing their own Safety and Health Program on all site entrants, and complying with all federal, state, and local laws. Responsible for complying with any site-specific requirements established within NAU's Contractor Safety Program or Hazard Communication documents.
iv. Provide an emergency contact list including a safety representative or individual responsible for addressing campus safety concerns.
v. Depending on the nature of the work, submit a site specific safety plan based on a documented worksite hazard assessment which addresses any known, anticipated, or potential safety hazards and

includes hazard control, training, and PPE requirements. The plan should be readily available to workers, site entrants, Project manager, and EHS.

vi. Ensure all employees have the proper knowledge and training to meet the general safety requirements for the project, as well as any required task-specific training, and access to required personal protective equipment. Proof of training must be available upon request.

vii. Ensure all subcontractors adhere to all safety and health requirements at all times.

viii. Report all incidents, injuries, and near misses to the NAU Project Manager and OSHA, if applicable.

B. NAU Employees and representatives

i. Project Managers and campus representatives who hire contractors

a. Ensure Contractor adherence to all contract documents and articulated safety requirements. Notify Contracts, Purchasing, Risk Management of all incidents, injuries, and near misses as well as serious or repeated violations of contract terms.

b. Coordinate between Contractor and appropriate campus authority and end users for shutdowns, lockout/tagout, hot work permits, confined space entries, fire protection or detection system impairments, or any other tasks requiring authorization, permitting, support, or intervention.

c. Partner with Risk Management, EHS, Fire Marshal, NAUPD, Access and Equity, and other authorities to address site safety concerns with the contractor.

d. Work with campus authorities to determine and notify contractors of known hazardous conditions and provide site-specific information, such as confined spaces, asbestos/lead/pcb, rooftop anchor certifications or similar.

e. Contact/coordinate with laboratory representatives/PI's to obtain hazard information, personal protective equipment requirements, and any other critical information when work involves access into laboratory spaces. Ensure the work can/will be performed safely before authorizing work to begin or continue.

f. Ensure NAU Staff entering the worksite adhere to contractor safety requirements including any required site orientation, PPE, or safety behaviors and code of conduct. Work with Contractor and NAU supervisors to enforce contractor safety requirements among NAU staff.

g. Participate in hazard awareness training for any potentially encountered worksite hazards.

ii. Contracts, Purchasing, Risk Management, EHS, Fire Marshal, NAUPD, other campus safety authorities

a. In cooperation with Project Managers, maintain and make available to campus staff any supplied Contractor Safety Program documents, contact lists, site control/entry requirements, or other pertinent worksite safety information.

b. Provide guidance and technical assistance as needed, including assisting staff in interpreting contractor safety plans, and notifying contractors if safety violations or safety program gaps are noted.

c. Represent NAU safety and liability interests during scheduled project planning and OAC meetings.

d. Perform periodic scheduled or unscheduled site visits to audit contractor compliance with contractual and regulatory requirements and ensure safety of NAU site entrants (This is not a management or policing activity and is not intended to override the contractors responsibility for site safety).

e. Exercise stop work authority (see section IV. - D) when immediate dangers to NAU staff, students, faculty, campus visitors, or property are identified and time to remedy the situation is required before restarting work.
f. Provide hazard awareness or performance based training to NAU employees who may encounter worksite hazards either through entrance/proximity, or by performing work in contractor-controlled worksites. (This training may not satisfy contractor requirements and does not supersede any contractor specified orientation or training requirements).
g. Review, audit, and revise this program as necessary.

iii. Campus staff

a. Adhere to all NAU and Contractor site safety requirements when visiting/entering contractor-controlled worksites.
b. Participate in all required safety training, site orientation, or task specific instruction required by the contractor or NAU before entering or working in contractor controlled worksites.
c. Use all required PPE or safety devices while entering, inspecting, or working in contractor-controlled worksites.
d. Report any noted unsafe conditions, incidents, injuries, or near misses to the NAU project manager and employee supervisor. Injuries must be reported through the NAU online Report of Injury (ROI) system.

IV. General Requirements

The general requirements apply to all contractors subject to this program.

A. Housekeeping

i. Work areas, passageways, and doors must be kept free of debris, combustible waste materials, and other hazards to allow for unobstructed egress at all times.
ii. Debris should be removed daily and should be eliminated in all areas where there is not an active sprinkler system.
iii. Separate waste containers must be maintained for flammable or hazardous wastes, including (not limited to) oily and used rags.

B. Pandemic safety plans and procedures

i. During public health crises, such as COVID-19, contractors site-specific safety plans and procedures are expected to address guidelines and best practices provided by the Centers for Disease Control and Prevention (CDC) the Occupational Safety and Health Administration (OSHA), and any ordinances and executive orders set forth by the federal, state, or local government.
ii. Plans and procedures must at least comply with applicable NAU policies or procedures and must be implemented prior to the commencement of work.
iii. Plans and procedures must be communicated to employees and any other affected personnel (e.g., subcontractors, NAU staff, faculty, students).

C. Site safety

i. Contractors must have and adhere to a safety program applicable to the work performed at NAU. Contents and requirements of the safety program must be based on a thorough job site/hazard assessment). Both the safety program and hazard assessment must be available at the site and must be provided to the Project Manager prior to the start of work for distribution to NAU staff who enter the work site.

ii. Establish and enforce site specific personal protective equipment requirements for all personnel, visitors, and NAU employees.
iii. Worksites must have fire extinguishers readily available.
iv. Smoking, including the use of electronic cigarettes and vaping, is prohibited on NAU property, including occupied buildings, buildings under renovation, within 25-feet of building entrances, as well as in designated outdoor facilities.
v. Safety Data Sheets (SDS) must be readily available for all hazardous materials present at the worksite.
vi. An emergency action plan must be developed for the worksite and must be available at the site as well as provided to the Project Manager prior to the start of work.
vii. Do not prop or leave doors open in work areas when the area is not attended.
viii. On construction and renovation worksites, contractors must post a sign indicating the worksite safety representative's contact name and phone number, in a conspicuous location.

D. Stop-work authority

i. NAU employees have the authority to stop work or request that the contractor safety representative stop work if unsafe acts or conditions are observed.
ii. Contractors are required to stop work immediately if requested.
iii. It is the responsibility of the contractor to take corrective actions to ensure that conditions are safe prior to resuming work.

V. Specific Requirements

The specific requirements apply to contactors subject to this program who are performing work in any of the following categories. This list represents some of the most commonly encountered hazards/requirements, but is not exhaustive. It is the contractor's responsibility to be aware of and ensure compliance with any applicable safety or environmental compliance regulations while performing work on campus.

A. Aerial work platforms

i. Contractors must at a minimum adhere to NAU's Aerial Work Platform program.
ii. Operators must be trained and authorized, and training documentation must be readily available upon request.
iii. Aerial work platforms must be up to date on all routine service and inspections, and must be inspected by the authorized operator prior to operation.

B. Confined spaces (29 CFR 1926 Subpart AA and CFR 1910.146)

i. Notify the project manager prior to any activities involving confined spaces.
ii. Contractors must have a program that meets or exceeds NAU's Confined Spaces Program and must adhere to OSHA Guidelines for Contractors Working in Confined Spaces. All confined space pre-entry evaluation and monitoring must be properly documented.

iii. No entry may be performed until EHS and the Project Manager are notified and have confirmed that the appropriate pre-entry procedures have been completed.
iv. The project manager must authorize the entry prior to its occurrence.
v. For construction projects, contractors must adhere to OSHA construction standards and notify the project manager of the addition, removal, or change to confined spaces on NAU property.

C. Cranes and rigging

i. Crane lift and logistics plans must meet the requirements of NAU's crane safety program and be submitted to the NAU Project Managers for review if the operations take place outside of the controlled worksite. Critical lifts, which are defined as:

a. Loads 75% or more of the rated crane capacity
b. 2 or more cranes required to perform a lift
c. Movement of crane carriage with a load
d. Use of personnel platforms
e. Sensitive loads
f. Hoisting loads over occupied buildings, or
g. Work involving encroachment on a public right-of-way

must be reviewed and approved on a case-by-case basis by the contractor safety representative and coordinated with NAU through the Project Manager. Documentation of review and approval shall be kept on-site and made available upon request.
ii. Lift plans must include swing radius protection, nearby power lines, overhead hazards, pedestrian/vehicle traffic, taglines, methods of communication, weather operating parameters, staging/hoisting areas, and safety procedures.
iii. Building floors directly below any rooftop landing area or any other work area below hoisting operations must be evacuated during operations.
iv. The NAU Fire Marshal and/or fire department must be notified if crane operations will block or partially block fire lanes.
v. Coordinate with NAU Utilities department to locate underground tunnels, utilities, and hazards and verify ground conditions can support crane operations prior to commencement.
vi. Cranes and equipment must be current on all routine maintenance and inspections, and be inspected by the crane operator prior to each shift.
vii. Crane equipment certifications must be current and valid. Copies of certifications must be kept on-site and be available upon request.
viii. Crane operators, riggers, and signal persons must have valid licenses and certifications and must be available upon request.
ix. Coordinate with the project manager to ensure that interim measures are developed for building occupants when any building exit is blocked by crane operations. The NAU Fire Marshal must approve Interim Life Safety Measures.
x. Crane lifts that occur within construction worksites controlled by the contractor must:

a. Adhere to items ii-x of this section.
b. Notify the project manager of any critical lifts as defined in this section.

D. Control of hazardous energy - lockout/tagout (29 CFR 1926.417 and 1910.147)

i. Contractors must coordinate all lockout/tagout activities with project managers and at a minimum must meet OSHA's Control of Hazardous Energy (Lockout/Tagout) requirements for all service and maintenance requiring the isolation and de-energization of hazardous energy sources.
ii. Lockout/tagout activities must be completed as a group lockout/tagout if multiple persons, vendors, or entities are involved. NAU Facilities will shut down machines, equipment, and systems, or work with contractors to ensure proper shut down prior to start of work. Then all parties will apply their locks.
iii. Contractors are responsible for supplying their own locks and tags. These devices must meet OSHA requirements.

E. Dust / odor control

In the event demolition and construction activities may potentially create dust and odors that adversely affect contractor personnel, staff, students or people in adjacent areas, contractors must:
i. Develop and implement a dust/odor control plan during demolition or other dust/odor generating work.
ii. Evaluate the spaces and areas they will be working in and identify hazards that will contribute to airborne particulates or odors.
iii. Utilize the appropriate personal protective equipment for dust and particulate related work.
iv. Identify and implement effective dust and odor control methods, such as water, ventilation, tools equipped with dust collection systems, sweeping compound, or barriers, prior to the start of work.
v. Monitor adjacent areas as work proceeds. Modify dust and odor control measures if found to be ineffective.
vi. When demolishing or using products with crystalline or fused silica, contractors must have a silica exposure control plan.

F. Electrical (29 CFR 1926 Subpart K and 1910 Subpart S)

i. All electrical work must be performed de-energized. If that is not feasible, the contractor must adhere to OSHA and NFPA 70e regulations for energized electrical work.
ii. Control access to passageways, mechanical rooms, and other worksites where electrical work is being performed.

G. Fall protection (https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.501 and https://www.osha.gov/laws-regs/regulations/standardnumber/1910/1910.140)

i. Contractors must at a minimum meet OSHA Fall Protection requirements.
ii. Establish and implement a fall protection plan under the supervision of a competent person, and provide fall protection when workers will be exposed to fall hazards 4-feet or greater in height (e.g., roofing work, steel erection leading edges, or similar).
iii. Protect employees from fall hazards with the use of guardrails, gates, covers, personal fall protection systems, lifelines, or other effective means deemed appropriate to eliminate or reduce the hazard.

H. Fire detection and protection impairments

i. Impairments to existing sprinkler systems, fire detection systems, fire pumps, special fire protection systems, or similar must be performed by qualified personnel and only upon approval from the NAU Fire Marshal.
ii. Notify the Project Manager if any impairment is necessary.

iii. When possible, plan impairments when the building or affected area is not occupied.
iv. Plan for temporary protection as necessary including, but not limited to, a fire watch and extra fire extinguishers. Temporary measures and fire watches should meet the requirements of IFC chapter 33.
v. Hot work is prohibited while fire detection and protection systems are impaired. Requests for exceptions must be submitted to the Project Manager and approved by the Fire Marshal.

I. Fire prevention

i. Contractors must adhere to NAU's Fire Prevention program (https://in.nau.edu/wp-content/uploads/sites/139/2019/09/FIRE-SAFETY-MANUAL-9-2019.pdf) and to IFC Chapter 33.
ii. Provide fire extinguishers appropriate for the conditions and hazards present in construction areas.
iii. Remove all trash and refuse from worksites daily.
iv. If a fire prevention deficiency is noted by the Fire Marshal, Project Manager, or other authority, work shall be stopped until the deficiency is addressed.
v. Temporary heating devices on construction sites must be located at least 10-feet from combustible materials, such as tarpaulins, canvas, or similar coverings. Fresh air must be supplied in sufficient quantities to maintain the health and safety of workers. Contractors must adhere to manufacturer guidelines for safe use on worksites. Solid fuel salamanders are prohibited inside buildings and enclosed spaces.

J. Hazard communication

(https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&cad=rja&uact=8&ved=2ahUKEwiPtpbLhZLwAhWIvJ4KHc87CWEQFjAAegQIAhAD&url=https%3A%2F%2Fwww.osha.gov%2Fpls%2Foshaweb%2Fowadisp.show_document%3Fp_id%3D10099%26p_table%3DSTANDARDS&usg=AOvVaw2C8zYIGiJA6qFVb0hTmzcE)

i. Contractors must make note of and be prepared to address hazard information provided through NAU's Worksite Hazard Communication program.
ii. Contractors are responsible for Hazard Communication to all employees, subcontractors, inspectors, and other site entrants.
iii. Chemical inventories and SDSs must be readily available upon request.
iv. Properly remove all unused and waste chemical products.

K. Hazardous waste / universal waste (https://in.nau.edu/environmental-health-and-safety/safety-programs/hazardous-waste-management/)

i. Contractors are responsible for adhering to NAU's Hazardous Waste program and coordinating with EHS for appropriate disposal of all hazardous waste generated or removed from the worksite.
ii. Hazardous and universal waste must be labeled, handled, stored, and disposed of in accordance with applicable regulations.
iii. Hazard Mitigation/abatement of asbestos/lead/pcb will be managed by NAU unless otherwise specified. The contractor is responsible for cooperating with NAU personnel or contractors who are performing hazard mitigation. In rare cases where abatement is managed by the contractor, copies of all regulatory permits, third party inspection/monitoring and abatement closeout reports, and waste manifests must be provided to EHS and the Project Manager.

L. Hot work (https://in.nau.edu/wp-content/uploads/sites/139/2019/09/FIRE-SAFETY-MANUAL-9-2019.pdf)

i. Contractors must adhere to NAU's Hot Work Permit program and IFC chapter 33/35 requirements for hot work.

ii. Prior to commencement of hot work, the contractor must notify the project manager and request a hot work permit from the NAU Office of the Fire Marshal/Fire Life Safety department. Follow the instructions and safeguards on the permit and post the permit at the work site. Completed permits must be returned to the project manager.

iii. A signed copy of the permit must be posted near the work site.

iv. For renovations or work on existing buildings, coordinate with the project manager to verify fire protection systems are operational and available.

v. Utilize a trained and competent fire watch with appropriate extinguishers for one hour after the completion of work.

M. Material handling equipment (https://www.osha.gov/laws-regs/regulations/standardnumber/1910/1910.176)

i. Contractors must adhere at a minimum to OSHA's Material Handling requirements.

ii. Equipment operators must be properly trained and authorized.

iii. Material handling equipment must be up to date on all routine maintenance and inspections, and be inspected by the authorized operator prior to operation.

N. Scaffolding and ladders (https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.451 and https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.1053

i. Contractors must adhere at a minimum to all OSHA Fall Protection/scaffold/ladder safety requirements.

ii. Erect and disassemble scaffolding under the direction of a competent person; scaffolding must support 4 times the intended load. Scaffolds must be certified prior to initial use and inspected routinely/daily in accordance with applicable regulations. Proof of certification/inspection must be present at the work location.

iii. Employees must be protected from falling on scaffolds 4-feet or greater in height.

iv. Falling object prevention must be utilized including, but not limited to, guardrails, toeboards, netting, or barricading.

v. Job-made ladders are discouraged, but if necessary, must be constructed and maintained to current ANSI and OSHA standards.

O. Trenching and excavations (https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.651)

i. Notify the project manager prior to any trenching or excavation.

ii. Adhere to all NAU (https://in.nau.edu/facility-services/dp-contract/) and Arizona Blue Stake requirements and OSHA 1926 Subpart P – Excavations before and during trench/excavation activities.

iii. Mark out the planned excavation site on NAU forms and maps, and on the ground with white chalk paint or flags (black when snow is present) prior to requesting blue stake.

iv. It is the responsibility of the contractor to maintain the integrity of blue stake markings throughout the duration of the project. Fading or damaged marks must be refreshed to avoid unanticipated utility encounters and maintain compliance with ACC regulations.
v. The Project Manager will provide written or verbal approval to commence digging once utilities have been located and the contract between NAU and the contractor is fully executed.
vi. Trenching and excavating activities must be performed under the supervision of a competent person.
vii. Identify material for protection of personnel (e.g., bracing, shoring, shielding, and trench boxes) as determined by soil type. It is the contractor's responsibility to ensure regulatory compliance and worker safety.
viii. Barricades or other controls must be in place for the duration of the excavation project to protect equipment, workers, passers-by, and vehicles from fall or collapse hazards. Controls must be effective and adequate to the conditions.

P. Working on or near live utilities (29 cfr 1926, subpart cc [1407-1444])
i. Contractors must adhere to OSHA power line safety requirements when working on or near live utilities (e.g., electrical, steam).
ii. Perform all utility work de-energized unless de-energizing creates a greater safety hazard. Use of Lockout/Tagout procedures (see section V-D above) are required when de-energizing utilities.
iii. If it is not safe/possible to de-energize utilities, notify the project manager to request/propose alternatives to be vetted by campus authorities.
iv. NAU authorization and safe operating procedures are required for all work on or near live utilities.

VI. Research Laboratory Access

NAU research laboratories may contain chemical, radiological, biological, laser, strong magnetic fields, or other hazards. It is imperative that contractors and subcontractors obey all signage requirements, restrictions, and follow all protocols set forth by NAU to ensure a safe working environment at all times. Hazard signage is required but should not be relied on as the sole source of information.

Contractors must obtain authorization and hazard information from a laboratory representative, such as the principal investigator, lab manager, or safety designate, prior to entry into any laboratory space and before any work can commence. If contractors are working under the direction of a NAU project manager, the project manager is responsible for obtaining authorization for contractors prior to entry and commencement of work.

Do not leave doors to research lab areas open/unsecured when not attended.

Contractors are not to disturb or move any materials or equipment in the laboratory space unless a laboratory representative provides specific approval to carry out such tasks. If hazardous or unexpected conditions become present in the laboratory space, stop all work, exit the space, and notify a laboratory representative, the Project Manager, and EHS immediately.

VII. Incident Reporting

Contractors must report all incidents (e.g., injuries, near misses, property damage) to the project manager. Contractors must conduct incident investigations to determine root cause and corrective

actions and submit to the Project Manager and EHS. EHS will contact the contractor with any questions related to the investigation. All contractors and subcontractors are responsible for cooperating with NAU investigations and reporting injuries, medical emergencies, fires, property damage, or any other reportable incidents to NAU and regulatory authorities, if applicable. All incidents, including near misses, must be reported within 24 hours.

VIII. Recordkeeping

NAU and contractors must follow all regulatory requirements for recordkeeping.

IX. Regulatory Authority

NAU and contractors will comply with Occupational Health and Safety Administration (OSHA), Environmental Protection Agency (EPA), NFPA, and other applicable codes and standards.

X. Contact

For questions, contact your Project Manager or NAU EHS (nauehs@nau.edu)

Appendix 1 – Contractor Safety Program Reference Index

Content	Website Address
Asbestos/Lead/PCB policy	https://in.nau.edu/environmental-health-and-safety/safety-programs/asbestos-lead-and-pcbs/
Fall Protection/Aerial Work Platform Program	https://in.nau.edu/wp-content/uploads/sites/226/2020/04/NAUFS_fallprotectionsection0160-1.pdf
Confined Space Entry Program	https://in.nau.edu/environmental-health-and-safety/safety-programs/confined-spaces/ https://in.nau.edu/wp-content/uploads/sites/226/2020/03/NAUentrychecklist.pdf
Hazardous Waste Program	https://in.nau.edu/environmental-health-and-safety/safety-programs/hazardous-waste-management/
Control of Hazardous Energy (Lockout / Tagout) Program	https://in.nau.edu/wp-content/uploads/sites/226/2020/03/NAULOTOprogram2014.pdf
NAU Fire Safety Manual	https://in.nau.edu/wp-content/uploads/sites/139/2019/09/FIRE-SAFETY-MANUAL-9-2019.pdf
Hazard Inspection/ Communication Program	https://www.nau.edu/hazard-inspection
Hot Work Permit Program	See Fire Safety manual: https://in.nau.edu/wp-content/uploads/sites/139/2019/09/FIRE-SAFETY-MANUAL-9-2019.pdf
Incident Reporting and Investigation resources	Contact NAU EHS (nauehs@nau.edu) or www.nau.edu/ehs
Material Handling/Ergonomics Program	https://in.nau.edu/environmental-health-and-safety/safety-programs/ergonomics/
Crane Safety Program	https://in.nau.edu/wp-content/uploads/sites/226/2020/05/NAU-crane-safety-Section-I-contractor-5.13.20.pdf
Guidance for Working On or Near Live Utilities	https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.1407 https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.1408 https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.1410 https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.1410 https://www.osha.gov/laws-regs/regulations/standardnumber/1926/1926.1411 https://www.google.com/url?sa=t&rct=j&q=&esrc=s&source=web&cd=&ved=2ahUKEwiqi5WbpdLwAhWnIDQIHcUNDhIQFjAAegQIFRAD&url=https%3A%2F%2Fwww.aps.com%2F-%2Fmedia%2FAPS%2FAPSCOM-PDFs%2FAbout%2FConstruction-and-Power-Line-

	Siting%2FConstruction-Services%2FContractor-Safety%2FDetailedReqsOSHA_CranesDerricks&usg=AOvVaw2GAWLkbSLA1Ssre5LMiY72