



CODE OF SAFE PRACTICES

FIELD

13255 South St. Cerritos, CA 90703
Telephone 562-924-3364 • Fax 562-924-0521

Table of Contents

Safe Practices	4
General.....	4
Accident Reporting and Investigation.....	4
Requirements For Reporting A Work Related Injury	5
Requirements for a Return to Work.....	5
Accident Prevention Signs and Tags.....	5
Barriers and Warning Signs	6
Bonding and Grounding.....	6
Concrete	6
Cylinders	7
Electrical.....	8
Emergencies.....	8
Equipment and Machinery.....	9
Inspecting Equipment/Vehicles	9
Preventing Sling Failure.....	10
Excavations.....	10
Fall Protection.....	10
Fire Prevention.....	10
Fitness for Work.....	10
Flaggers	11
Flammable/Combustible/ Hazardous Materials	11
Fuel Safety Tips.....	11
Hazardous Materials.....	11
Heat Exhaustion/Sun Exposure.....	12
Heavy Equipment (Working Around)	12
Hoists	12
Housekeeping.....	12
Ladder Safety.....	13
Laser Equipment.....	13
Lifting.....	13
Lifting Equipment (chains, cables, ropes, slings, etc.).....	14
Personal Protective Equipment.....	14
Head Protection.....	15
Care & Maintenance.....	15

Eye Protection.....	15
Types of Eye and Face Protection	16
Hand Protection	16
Ear Protection.....	16
Selecting Hearing Protection Devices	16
Foot Protection.....	17
Types of Foot Protection.....	17
Respiratory Protection.....	17
Skin Problems (Dermatitis)	17
Tools & Equipment.....	17
Power Saws	18
Vehicle Operation.....	18

Safe Practices

We expect all of our employees to be safety conscious and to assist us in finding conditions that might cause an accident or incident. Report any unsafe conditions or any injury received while at work, even if slight to your supervisor.

General

- All persons shall follow these safe practices rules, render every possible aid to safe operations, and report all unsafe conditions or practices your supervisor.
- Management and supervisors shall insist on employee's observing and obeying every rule, regulation, and order as is necessary to the safe conduct of the work, and shall take such action as is necessary to obtain observance.
- Anyone known to be under the influence of drugs or intoxicating substances which impair the employee's ability to safely perform the assigned duties shall not be allowed on the job while in that condition
- Running, jumping, horseplay, scuffling, and other acts which tend to have an adverse influence on the safety or wellbeing of the employees shall be prohibited.
- Employees shall be instructed to ensure that all guards and other protective devices are in proper places and adjusted, and shall report deficiencies promptly to the supervisor.
- Employees shall not enter underground vaults, chambers, tanks, manholes, silos, or other similar confined places that receive little ventilation, unless it has been determined that it is safe to enter.
- Stay clear of heavy equipment. Remain aware of warning devices such as bells, horns or whistles.
- Never attempt an operation with which you are not familiar, ask first for specific instructions.
- Wear suitable work clothes at all times.
- Keep work areas free of debris, good housekeeping is essential.
- Remove or correct any hazards.
- Never work or pass under suspended loads or equipment.
- Never place yourself, or allow others to work in a dangerous position.
- Only qualified persons shall operate equipment and machinery.
- When in doubt about any safety practice, ask your supervisor. If a condition does not look safe to you, please notify your supervisor immediately.

Accident Reporting and Investigation

In order to provide prompt and adequate medical attention it is very important that you report all job related injuries to your supervisor and our Safety Coordinator immediately.

1. If you are injured but do not see a doctor until that evening or at a later date, tell your supervisor and our Safety Coordinator as soon as possible
2. If you are involved in or witness an accident in the office, please cooperate with your supervisor and our Safety Coordinator by helping determine what caused the accident. Your ideas about what caused the accident may help to prevent a similar occurrence. Safety is everybody's business. SAFETY IS NO ACCIDENT.
3. Supervisors are responsible for submitting reports on injuries, illnesses or accidents to our Safety Coordinator immediately.

Requirements For Reporting A Work Related Injury

1. All injuries whether minor or severe is to be reported - there are no exceptions.
2. The supervisor is to fill out an accident report in detail and give it to our Safety Coordinator.
3. If the injured employee needs medical attention, send to the designated treatment facility
4. If they hold the injured worker over at the medical facility or hospital, call our Safety Coordinator and report.
5. If the employee refuses medical attention, still fill out a report and note the employee refused treatment and then send the report to our Safety Coordinator.
6. If the injury or accident is questionable document this on your report and why you feel it did not happen at work or at all.
7. If the employee went to a medical facility or hospital for treatment, you must get a return to work slip - if it notes modified duty get in touch with our Safety Coordinator on a decision to put the employee back to work.
8. If needed take pictures of the area when it involves another employee, a third party or a serious injury.
9. All original paperwork, reports, return to work slips are to be given to our Safety Coordinator within 4 hours.

Requirements for a Return to Work

1. The supervisor is to receive a return to work slip from the doctor.
2. The return to work slip needs to state return to work no restrictions.
3. If the return to work slips states, “modified duty” do not put the employee to work call and talk with our Safety Coordinator.
4. If an injured employee wants to return to work without an okay from the doctor do not under any circumstances put him back to work. No exceptions.

Accident Prevention Signs and Tags

- ♦ **General:** Signs and symbols required shall be visible at all times when work is being performed, and shall be removed or covered promptly when the hazards no longer exist.
- ♦ **Danger Signs:** Danger signs shall be used only where an immediate hazard exists. Danger signs shall have red as the predominating color for the upper panel; black outline on the borders; and a white lower panel for additional sign wording.
- ♦ **Caution Signs:** Caution signs shall be used only to warn against potential hazards or to caution against unsafe practices. Caution signs shall have yellow as the predominating color; black upper panel and borders; yellow lettering of “caution” on the black panel; and the lower yellow panel for additional sign wording. Black lettering shall be used for additional wording. Standard color of the background shall be yellow; and the panel, black with yellow letters. Any letters used against the yellow background shall be black.
- ♦ **Exit Signs:** Exit signs, when required, shall be lettered in legible red letters, not less than 6 inches high, on a white field and the principal stroke of the letters shall be at least three-fourths inch in width.
- ♦ **Safety Instruction Signs:** Safety instruction signs, when used, shall be white with green upper panel with white letters to convey the principal message. Any additional wording on the sign

shall be black letters on the white background.

- ♦ **Directional Signs:** Directional signs, other than automotive traffic signs specified below, shall be white with a black panel and a white directional symbol. Any additional wording on the sign shall be black letters on the white background.
- ♦ **Traffic Signs:** Construction areas shall be posted with legible traffic signs at points of hazard. All traffic control signs or devices used for protection of construction workmen shall conform to the latest Manual on Uniform Traffic Control Devices (MUTCD) for Streets and Highways.
- ♦ **Accident Prevention Tags:** Accident prevention tags shall be used as a temporary means of warning employees of an existing hazard, such as defective tools, equipment, etc. They shall not be used in place of, or as a substitute for, accident

Barriers and Warning Signs

- When barriers are placed around safety hazards, barriers must be sturdily constructed and obvious to site workers and the general public. Barriers can be K-rail, guard rail, barrier vehicles or other physical means.
- Warning signs must be placed on or near safety hazards. “Danger” signs must be placed wherever an imminent hazard is present. “Caution” signs must be placed wherever the potential for an unsafe condition exists. Safety instruction signs must be placed wherever additional safety instructions regarding a hazard are appropriate. Wording of safety instruction signs must be positive not negative (“do,” not “don’t”).

Bonding and Grounding

- Static electricity is generated by the physical contact and separation of materials. Examples include the flow of gases or liquids through pipes or hoses; by blending, mixing and agitation operations; by rubber tires on vehicles, and by fast-moving belts. Greater static electrical charges are developed in cold and dry atmospheres.
- The principal hazards created by this condition are fire and explosion caused by sparks, igniting vapor, gases or dusts.
- Static sparks are dangerous wherever the air contains an ignitable mixture. Hazardous areas include the nozzles of flammable liquid fill pipes and delivery hoses, open containers of flammable liquids and around tank truck fill openings or barrel bungholes.
- To prevent spark-ignited fires and explosions, bond and ground flammable liquid containers.
- Bonding equalizes static electricity by creating a conductive connection between drums and receivers. A flexible conductor such as bonding strap or wire is adequate. Solid metal contacts between containers may also be used.
- Grounding lets static electricity flow harmlessly into the earth, eliminating its dangerous buildup. Grounding straps, cables or wires should be connected to known grounds such as water pipes, grounded metal structural parts of buildings and metal underground pipes. All grounding equipment should be tested periodically for effectiveness.

Concrete

- Safety glasses with side shields are worn when splashing of cement/water may occur.
- Protective equipment (gloves, clothing, safety glasses and/or respirators) are worn to prevent over-exposure to form oils, curing compounds, bond breakers, retarders, sealers, and other hazardous chemicals.

- Grounding and bonding procedures are used when dispensing flammable curing agents, bond breakers and retardants.
- Workers wear safety glasses or goggles when working with form oils, curing agents, bond breakers, and retardants.
- Workers using epoxy sealants and bonding agents have been trained in the hazards of their use and take care to keep them off their skin.

For your protection, the following precautions should be adhered to when working with concrete:

- Always wear safety glasses. The lime and cement dust can be very irritating to the eyes. If it enters your eyes, rinse for 15 minutes. If eyes are still irritated, seek medical attention.
- Always wear gloves and a long sleeve shirt, if possible, when working with concrete. The cement can cause irritation when it comes into contact with skin. Lime burns are common in the industry but can be lessened by barrier creams or gloves to protect hands and forearms from industrial dermatitis.
- Read and heed the manufacturers' recommendations on concrete additives, acids for etching, form release oils, or other chemicals used in conjunction with concrete.
- Handles on bull floats must be of non-conductive materials or insulated with a non-conductive sheath when used around energized electrical conductors to prevent electrical shock.
- When using a powered or rotating type troweling machine, the control switch will automatically shut off the power when the operator removes his hands from the handle - DO NOT USE "TIE-DOWNS" on the control switches.
- Riding concrete buckets for any purposes is prohibited.
- Vibrator crews must not work under concrete buckets suspended from cranes or cableways.
- When discharging concrete on a slope, make sure the ready-mix truck wheels are blocked and the brakes set to prevent movement.
- Gloves, eye protection and personal protective equipment should be used when needed.
- All equipment, hand and power, should be checked and in safe working condition before use. Replace or repair all defective equipment.
- If concrete splatters on the skin, wash off as soon as possible.

All workers should be alert to the potential hazards associated with concrete operations. Among the most critical unsafe practices are:

- Premature removal of formwork
- Failure to brace masonry walls
- Failure to adequately support pre-cast panels
- Inappropriate operation of equipment
- Failure to guard the end of reinforcing steel

Cylinders

- Check all safety devices on compressed air systems.
- Never direct compressed air towards a person.
- It is prohibited to use compressed air to clean up or move combustible dust if such action could cause the dust to be suspended in air and cause a fire or explosion hazard.
- Drain compressed air receivers of moisture and oil.
- Keep inlet of air receivers and piping systems free from accumulated oil and carbonaceous materials.

- Make sure all cylinders are legibly marked.
- Place valve protectors on cylinders when they are not connected or in use.
- Only transport cylinders on carts designed for that purpose and with the safety caps tightly screwed-on. Secured bottles and self-contained breathing apparatus cylinders may be transported individually with both hands.
- Never allow cylinders to remain freestanding. Cylinders must be secured by chain, rack, bracket, or other means so as to prevent falling or rolling.
- Never tamper with safety devices, such as safety rupture disks, on valves or cylinders.
- Always open valves slowly with the valve outlet pointing away from you.
- Valves should be closed when cylinders are not in actual use. The valve protection cap should be securely in place whenever the cylinder is not connected.
- Full and empty cylinders are not to be stored together because an empty cylinder mistakenly attached to a pressurized system can dangerously "suck back." Clearly identify and isolate full and empty cylinders.
- Cylinders should not be subjected to temperatures in excess of 125 degrees Fahrenheit and are not be stored in direct sunlight or near sources of heat.
- Do not swap fittings on regulators. Do not fashion adapters. Every gas regulator is designed for a specific use. Only use the correct regulator for the cylinder.
- Cylinders of oxygen should not be stored indoors within 20 feet of cylinders containing flammable gases (such as hydrogen) or highly combustible materials unless separated by a fire-resistant partition with a minimum of a one-half hour rating.

Electrical

- All employees must be aware of any overhead or underground power lines in or near the work area.
- When working in the vicinity of overhead, high voltage wires, all high reach equipment (hoes, cranes, etc.) must be the proper distance away from the wires.

Voltage	Min. Clearance	Voltage	Min. Clearance
750 – 50K	10’	175K – 250K	17’
50K – 75K	11’	250K – 370K	21’
75K – 125K	13’	370K – 550K	27’
125K – 175K	15’	550K – 1,000K	42’

- Underground power cables must be carefully located by hand before using power driven excavation or boring equipment. It is important to insure the full dimension of the cable or duct structure is exposed.
- All electrically operated power tools, appliances and related equipment must be properly grounded before use.
- When electrical equipment is serviced, maintained or adjusted, the necessary switches must be opened, locked-out and tagged whenever possible (see Lockout/Tagout Program).

Emergencies

- Inform your supervisor of the nature of the emergency as soon as is possible.
- Before you dial "911" you should be sure that you can readily identify the location where the emergency has occurred.
- See our Emergency & Fire Prevention Program for more details.

Equipment and Machinery

Only authorized persons shall operate machinery or equipment. The condition of the equipment must be checked before operations begin. Any defect should be reported immediately. Never begin operations with a defect that could cause an accident.

- Loose or frayed clothing, or long hair, dangling ties, finger rings, etc., shall not be worn around moving machinery or other sources of entanglement.
- Machinery shall not be serviced, repaired or adjusted while in operation, nor shall oiling of moving parts be attempted, except on equipment that is designed or fitted with safeguards to protect the person performing the work.
- Where appropriate, lock-out procedures shall be used.
- Employees shall not work under vehicles supported by jacks or chain hoists, without protective blocking that will prevent injury if jacks or hoists should fail.
- Air hoses shall not be disconnected at compressors until hose line has been bled.
- All excavations shall be visually inspected before backfilling, to ensure that it is safe to backfill.
- Excavating equipment shall not be operated near tops of cuts, banks, and cliffs if employees are working below.
- Equipment shall not operate where there is possibility of overturning in dangerous areas like edges of deep fills, cut banks, and steep slopes.
- The most important safety device on any piece of heavy equipment is the operator. The safe operation of the equipment is strictly the responsibility of the operator. He or she must know both the capabilities and the limitations of the equipment being used. Much of this information can be found in the manufacturer's manual.
- You are the operator and must dress appropriately. Loose clothing can get caught on controls or in moving parts. Check fluid levels, such as fuel, oil, and coolant. Watch your step when getting on or off the equipment.
- Wear all necessary personal protective equipment.
- Environmental hazards must also be considered. Check that all gas, electric, water, sewer, and telephone lines are clearly marked. Know exactly where overhead power lines are located. Buried vaults, culverts, etc. can present serious cave-in problems.

Inspecting Equipment/Vehicles

Equipment operators have a tremendous responsibility to safeguard their operations so that no injury or damage occurs. An important part of this responsibility is to insure that the equipment is in safe operating condition. The following rules should be considered by everyone operating equipment:

- Be sure the machine is properly lubricated. See that fuel, lubricating oil, coolant, and hydraulic reservoirs are filled to the proper levels.
- Walk around the equipment daily to check for missing guards or plates and for any maintenance required. Report inspection results to the person in charge. Never operate a machine with unsafe conditions.
- Visually inspect the machine for evidence of physical damage, such as cracking, bending, or deformation of plates or welds. Inspect carefully for cracking or flaking of paint, which may indicate a dangerous crack in the structure beneath. Do not operate until repairs are made.
- Loose or missing hardware, bolts or nuts, should be properly tightened or replaced with manufacturer's specified hardware.

- Check for fluid leaks. Hydraulic system leaks must be corrected before this machine is operated. Inspect all hydraulic hoses, especially those which flex in service, and replace if necessary. Secure all caps and filler plugs for all systems.
- Inspect air system lines, valves, drain cocks, and other components and see that air pressure is correct and that there are no air leaks.
- Be sure that all tires are properly inflated.
- Be sure there is adequate clearance for the operation. Barricade the area if necessary.

Preventing Sling Failure

Slings are essential for moving heavy materials on the job. Unfortunately, slings are too often taken for granted and subject to severe abuse by people who use them. A sling that has been abused can fail under the stress of a heavy load causing damage to material being lifted or severe injuries to employees working in the area.

There are some critical safety tips that we should all keep in mind when working with slings. These tips will prolong the life and prevent unexpected failures.

- Never pick up materials that are heavier than the specified safe working load limit of the sling, hook and hoist. If you do not know the safe load limit, find out. This practice can cause fatigue in the sling even for a short time.
- Loads should be raised vertically. Do not try to drag heavy loads with an overhead hoist. It puts a severe strain on the hook at the sling.
- Avoid dragging sling over the floor or ground. It could cause serious wear.
- Always be sure that the load is properly set in the bowl of the hook. Loading on the point can overload the hook causing it to spread.
- When not in use, store the slings properly.
- Always inspect the sling before you use it. If you doubt the safety of the sling or hook report the conditions and do not use.
- When working around hoists and slings, stay alert. The major source of injury is crushed fingers and hands that are placed into pinch points. Keep your hands clear of pinch points and keep your mind on the job.

Excavations

- See our Trenching & Excavation Guidelines for more details.

Fall Protection

- See our Fall Protection Program for more details.

Fire Prevention

- See our Emergency & Fire Prevention Program for more details.

Fitness for Work

- Employees are expected to report for work without physical or mental impairment that may endanger themselves or their fellow workers. Employees are expected to maintain themselves in such condition throughout the work shift.

- If an employee is observed to be acting in an impaired or otherwise unsafe manner, the circumstances should be reported to a supervisor as soon as is possible. Should the supervisor be acting in such a manner, then the circumstances should be reported to our Safety Coordinator.

Flaggers

- Supervisors will instruct flaggers in proper traffic control techniques and in situations peculiar to each project.
- Flaggers will be supplied with all necessary protective clothing. Personnel working in or adjoining areas with vehicular traffic are required to wear bright/reflective Type III retro-reflective clothing (shirts, vests or jackets) for night work.
- Use appropriate devices to control or otherwise direct traffic through the jobsite and report problems to their foreman immediately.
- If two or more flaggers are being used to direct traffic, they must have good visual control and/or radio communication.
- The safety of the public and fellow workers is dependent on proper traffic control. Make sure you understand and follow instructions and ask for clarification when necessary

Flammable/Combustible/ Hazardous Materials

- See our Hazard Communications Program for more details.

Fuel Safety Tips

- Use metal containers that are specifically designed to hold fuel and are so labeled.
- Place the container on the ground before filling it.
- Make sure the fuel nozzle touches the container or fuel filler neck during filling. This disperses static electricity that normally accumulates during filling.
- Avoid overfilling, which allows insufficient room for gasoline to expand and dangerous spills. Fill containers and tanks to no more than 95% capacity.

Hazardous Materials

Hazardous materials are those defined as:

- Flammables, such as paints and solvents.
- Explosives, such as munitions or elements which, when combined, form an explosive mixture.
- Toxins, such as industrial cleaners, non-flammable solvents, or metallic compounds.
- Irritant substances, such as dusts, fumes, vapors and gases.
- Corrosives, such as acids, and caustics.
- Poisons, such as cyanide.

Use these guidelines when near or handling such materials:

- Know what you are doing! Never handle any hazardous material without specific safety instructions and authorization from your supervisor. If you have any doubts, ask.
- Know the proper and safe use of any product containing hazardous materials.
- Follow the instructions on the label and in the corresponding Safety Data Sheet (SDS) for each chemical product you will be using in your workplace.
- See our written program for more information.

Heat Exhaustion/Sun Exposure

- See our Heat Illness Prevention Program for more details.

Heavy Equipment (Working Around)

When construction equipment is operating, stay alert and aware of your surroundings at all times. The only way to avoid a serious accident is if both construction/ground workers and equipment operators stay aware of the activity around them. Safety tips include:

- Never take for granted that the equipment operator sees you.
- Don't depend solely on hearing a horn or other audible warning signal that equipment is backing up.
- Stay out of the equipment operator's blind spot. If you can't see the operator, the operator can't see you.
- Stay out the swing radius of the equipment.
- Do not walk under loads – it might drop!
- Always wear your safety vest.

Hoists

- Overhead electric hoists must be equipped with a limit device to stop the hook travel at its highest and lowest point of safe travel.
- Each hoist must automatically stop and hold any load up to 125 percent of its rated load, if its actuating force is removed.
- The rated load of each hoist must be legibly marked and visible to the operator.
- The controls of hoists must be plainly marked to indicate the direction of travel or motion.
- All hoist chains or ropes must be of sufficient length to handle the full range of movement for the application while still maintaining two full wraps on the drum at all times
- Nip points or contact points between hoist ropes and sheaves which are permanently located within seven feet of the floor, ground or working platform, must be guarded.
- It is prohibited to use chains or rope slings that are chinked or twisted.
- It is prohibited to use the hoist rope or chain wrapped around the load as a substitute, for a sling.
- It is prohibited to carry loads over people.
- Tag lines must be attached to all hoisted loads.
- Ropes and hand lines used near exposed energized parts must be nonconductive.
- When using man lifts, body harnesses will be worn and each worker will be tied off.

Housekeeping

- Spilled liquids or other materials must be cleaned up immediately. Throw trash and scrap in proper waste containers.
- Clean paths, without obstruction, of entry to and egress from the work area are to be maintained at all times.
- Working areas are to be kept free of all debris, waste and combustible materials. All scrap is to be removed and deposited in proper containers. Keep all material piled and stored neatly. Nails, bolts, nuts, etc. should be kept in their containers.
- Sharp protruding nails and wire must be removed or bent.
- Employees may not perform housekeeping duties at close distances to energized electrical contact hazards, unless adequate safeguards are in place.

- Electrically conductive cleaning materials (e.g., steel wool, metalized cloth, silicon carbide, and conductive liquid solutions) may not be used in proximity to energized parts unless procedures are utilized which prohibit electrical contact.
- Oily rags and containers that have held flammable liquids are a fire hazard. Properly dispose of these as soon as you can.
- Do not block or obstruct stairwells, exits, walkways or accesses to safety and emergency equipment such as fire extinguishers or fire alarms.
- Do not use gasoline for cleaning purposes.

Ladder Safety

- Inspect the ladder before using it. If it is broken, place a tag on it and return it to the shop. Never repair a broken ladder, get a new one. Keep portable stairways, ladders and step stools in good condition and only use them in a safe manner.
- Do not place ladders in passageways, doorways, or any location where they might be hit or jarred, unless protected by barricades or guards.
- Ladder rungs and steps must be kept free of grease, oil, mud, or other slippery substances.
- Be certain the hands and feet are dry and free from grease and dirt before climbing a ladder.
- Arrange your work so you are able to face the ladder and use both hands while climbing. Do not carry tools or equipment while climbing a ladder. Climb the ladder, and then hoist the tools or equipment with a line or a hoisting device.
- Secure portable ladders in place and at a pitch so the leveling indicator is in alignment or the distance from the wall to the base of the ladder is at least 1' for every 4' of height.
- Straight ladders shall be tied off at the top of the ladder to prevent slipping.
- Do not stand on or work on or above the 3rd rung from the top.
- Extension ladders shall extend at least 36" above the level being accessed.
- Make sure non-slip feet are on the ladder and not missing.
- Take the time to get the appropriate ladder for the job.
- Always face the ladder when climbing up or down.
- Always keep a three-point contact with the ladder (one hand-two feet, two hands-one foot).
- Do not use ladders that have loose rungs, cracked or split side rails, missing rubber foot pads, or are otherwise visibly damaged.
- Allow only one person on the ladder at a time.

Laser Equipment

- Only qualified employees may operate laser equipment.
- Employees who may be exposed to laser light greater than 5 milliwatts must wear eye protection devices.
- Warning signs must be posted in areas where lasers are used.
- Equipment must be turned off or shielded when unattended and not in use.
- Laser beams must never be pointed or directed at persons.
- Lasers must have a label indicating their maximum output.

Lifting

Safe lifting is one aspect of material handling, transporting the load safely is the other. How you move or carry and put down the load is just as important as how you pick it up.

Chances are you will need to lift and carry various objects on the job every day. Picking up even the lightest of materials incorrectly can lead to serious injury. Try to commit these six important steps to memory.

- ♦ **First examine the load** - is it too heavy or bulky, should I break it into separate loads, should I ask a co-worker to help, or will I need a step ladder
- ♦ **If you have determined that you can lift the load yourself, you should then stand close to the load with your feet apart.** This will help your body remain balanced as you lift.
- ♦ **Next, squat down, bending at the hips and knees.** You should never bend at the waist with your legs straight, because doing so even with a light load could put undue stress and strain on your back.
- ♦ **Now grip the load and arch your lower back inward by pulling your shoulders back and sticking out your chest.** This posture distributes the weight of the load more evenly by taking pressure off the spine and lower back and allowing the bulk of the weight to be borne by the leg muscles.
- ♦ **Keep the load close to your body while you lift and your head up.** The closer the weight is to your body as you lift, the less strain it puts on your back, arms, neck and shoulders.
- ♦ **Finally, when you set the load down, squat down, bending at the hips and knees, keeping your lower back arched inward.** Putting a load down incorrectly could result in injury just as easily as lifting it improperly in the first place.
- ♦ Inspect the object you are going to lift for sharp corners, nails or other things that may cause injury.

Lifting Equipment (chains, cables, ropes, slings, etc.)

- Do not use chain slings if links are cracked, twisted, stretched or bent.
- Do not shorten slings by using make-shift devices such as knots or bolts.
- Do not use a kinked chain.
- Protect slings from the sharp edges of their loads by placing pads over the sharp edges of the items that have been loaded.
- Do not place your hands between the sling and its load when the sling is being tightened around the load.
- Do not alter or remove the safety latch on hooks. Do not use a hook that does not have a safety latch, or if the safety latch is bent.

Personal Protective Equipment

In order for PPE to protect you, it needs to be correctly used. This is a summary, and it will be the responsibility of the supervisor to do an evaluation of the equipment needed to protect employees against the hazards at the project.

If at any time you have any questions or concerns, please make sure you always check with your supervisor. If at any time it is established that the level of protection is not significant or a hazard has appeared that was not foreseen, we will re-evaluate and revise the required protection.

The following is a brief but basic list of requirements:

- Hard hats shall be worn at all times.
- Steel toe shoes or protective footwear will be worn when operating a jackhammer.

- No soft shoes (jogging, tennis, loafer, etc.) are permitted.
- All employees will wear shirts (buttoned) at all times and will wear full-length trousers, preferably heavy-duty denim.
- No loose jewelry shall be permitted while on the job site
- No extremely long hairstyles shall be permitted on the job site unless properly secured to prevent entanglement in machinery and equipment.
- Gloves can prevent blisters and minor pinch injuries and protect from concrete burns etc., but can also decrease dexterity. Know when to wear and when not to.
- Eye protection shall be worn when required.
- Ear protection shall be worn when working on or near loud equipment or machinery such as jackhammers, loaders, saws, etc., and when operating the equipment or machinery.

Head Protection

- Only ANSI approved hard hats will be acceptable.
- Metal hard hats will not be allowed.
- Hard hats should be visually inspected for damage regularly.
- Hard hats are not designed to be worn backwards on the head unless welding.
- The suspension of the hard hat, which consists of the strapping and headband, is even more critical for absorbing impact. It must be personally adjusted to fit your head and to keep the shell a minimum distance of 1 1/4 inches above your head.

Care & Maintenance

Damaged or worn hardhats will not give you the protection your head needs. If your hard hat does not pass all three inspections listed below, the hat should not be worn and should be replaced with a new one. You are responsible for the care and maintenance of your hard hat.

1. The hard outer shell - This part protects your head from sharp objects such as falling tools and debris. This also absorbs part of the force and impact. Make sure the shell of your hat does not have any gouges, chips or cracks. You should also check for color changes that may mean a sign of weakening.
2. The suspension system - This includes the straps and headband inside the hat. This distributes and absorbs the force of an impact. Make sure you check for worn, cut or frayed straps. Also make sure that the straps are properly connected to the outer shell.
3. The hard hat's flexibility - Squeeze the hat in about one inch and then let it go. The hat should return to its original shape without cracking. The common polyethylene hat is flexible.

Eye Protection

Proper eye protection will be required at all times (100%) on our jobs. For outdoor work during daylight, safety glasses may be tinted to protect against the glare of the sun, but no mirrored safety glasses are allowed. Safety glasses or safety goggles are the basic form of eye protection. You are responsible for the care and maintenance of the eye protection issued to you. If damaged, have it repaired or replaced immediately.

You should always use the correct eye and face protection if your job exposes you to:

1. Liquid chemicals, gases and vapors.
2. Flying particles and fragments from operations such as chiseling, caulking, hammering, grinding and welding.

3. Lasers used for checking grade.
4. High dust areas, mists, fumes, paint spraying, light grinding, sanding, metal work and small particles from woodworking.
5. Heat from welding, cutting, intense infrared and ultraviolet light, electrical arching and sparks.

Types of Eye and Face Protection

1. Safety Glasses - Protects you against flying objects, and should have full side shields.
2. Safety Goggles - Goggles provides a secure shield around the entire area of the eye.
3. Face Shields - These are to be worn with protective eye wear not instead. This protects the face from heat, glare and chemical hazards.
4. Welding Helmets - This protects against sparks, splatter and infrared and ultraviolet rays. Safety glasses should be worn under the helmets. It also recommended that helmets be worn during all welding operations.

Hand Protection

- Employees whose work involves unusual and excessive exposure to cuts, burns, harmful physical or chemical agents that are encountered and capable of causing injury, shall wear hand protection.

Ear Protection

Some of our work does produce high levels of noise for limited to sustained periods of times. In addition, some of the areas we work in produce high levels of noise.

Remember that excessive noise does not have to produce discomfort or distraction to be harmful. Loss of hearing can be a gradual process that occurs without discomfort, and without a person being aware of what is taking place. Hearing protection is provided for all employees. A hearing protection device is anything that can be worn to reduce the level of sound entering the ear. You need to protect your ears when:

- Signs indicating hearing protection are required.
- The sound in your work area is irritating.
- You need to raise your voice to be heard by someone closer than two feet from you.
- There are short bursts of sound that can cause hearing damage.

It is the Company's responsibility to tell employees when ear protection is mandatory; it is up to each individual employee to determine when they need limited protection.

Selecting Hearing Protection Devices

1. Earplugs - Earplugs offer the most protection and if the fit snugly they are most effective. Roll the plug into a small diameter and place it well into the ear canal. After you have inserted it, hold the plug in your ear for a few seconds to ensure a good fit.
2. Earmuffs - They have cushioned ear cups that form a seal around the outer ear. The cups of the earmuffs should be made of sponge to give a good seal. The seal they form around the ear limits their effectiveness.

You the worker should select which hearing protection device is most effective for you based on the following:

- Your hearing ability
- Your exposure to noise
- Proper fit
- Communication needs
- Any other constraints specific to your job's tasks

Foot Protection

Employees will wear appropriate foot protection while on the job. We only require steel toe shoes on specific job sites and when using tools where they are required such as when using a jack hammer (foot guards and ankle shields).

Types of Foot Protection

1. When work involves handling heavy materials - A steel-reinforced box toe is suggested to protect your foot from being crushed or pierced.
2. When there is a danger of stepping on sharp objects - Consider boots with steel plates in the shoes. They now require that many safety boots have puncture resistant soles.
3. When working with or around corrosive chemicals - Boots that are rubber or synthetic may be needed. Avoid wearing leather shoes or boots when working with caustic chemical because these substances can eat through the leather right to your foot.
4. When working around electrical currents - Metal free non-conductive shoes or boots.
5. When working on the job sites that are slippery due to rain or water line breakage - Boots or shoes with soles that provide the greatest degree of traction.

Remember that no matter which foot protection you wear, make sure they fit your feet properly.

Respiratory Protection

- See our Respiratory Protection Program for more details.

Skin Problems (Dermatitis)

- Chemicals such as caustics, solvents, adhesives, detergents, and agents such as heat, moisture, and friction can injure your skin.
- To protect your skin:
- Keep clothing dry and free of cutting oils, solvents, adhesives, and other chemicals.
- Change and launder soiled work clothes daily.
- Use only approved creams, gloves, and protective equipment.
- Use soap and water to wash any contaminant off your skin as soon as possible. Never wash with a solvent.
- For maximum skin protection, follow the directions on barrier cream containers.
- Any skin problems should be reported immediately to your supervisor/superintendent.

Tools & Equipment

- All tools and equipment will be maintained in good condition by the employee it was issued to.
- Damaged tools or equipment will be removed from service and tagged defective & returned to yard for replacement or repair.
- Hand tools such as hammers and screwdrivers should be kept protected and used for their intended purposes only.

- Files will be equipped with handles and not used to punch, pry or as a screwdriver.
- When using lasers, proper warning signs must be in place.
- Do not use a tool if its handle has splinters, burrs, cracks, splits or if the head of the tool is loose.
- Do not perform “make-shift” repairs to tools.
- Do not throw tools from one location to another, from one employee to another, from scaffolds or other elevated platforms.
- Do not carry tools in your hand when climbing. Carry tools in tool belts or hoist the tools to the work area with a hand line.
- Transport hand tools only in toolboxes or tool belts. Do not carry tools in your clothing.
- In locations where the use of a portable power tool is difficult, the tool shall be supported by means of a rope or similar support of adequate strength.
- Guards shall be in place and operable at all times while the tool is in use. The guard may not be manipulated in such way that will compromise its integrity or compromise the protection in which intended. Guarding shall meet the requirements set forth in ANSI.
- Employees using hand and power tools and exposed to the hazard of falling, flying, abrasive, and splashing objects, or exposed to harmful dust, fumes, mists vapors, or gases shall be provided with particular PPE necessary to protect them from the hazard.
- Any tool not in compliance with this part shall either be identified as unsafe by tagging or locking the controls to render them inoperable or shall be physically removed from its place of operation.

Power Saws

- Wear safety goggles, protective gloves, a dust mask and hearing protection when operating a power saw.
- Do not wear loose clothing or jewelry.
- Clean any residue from the blade or cutting head before making a new cut with the power saw.
- Do not use a power saw that has cracked, broken, or loose guards or other visible damage.
- Keep your hands away from the exposed blade.
- Operate the saw at full cutting speed, with a sharp blade, to prevent kickbacks.
- Do not alter the anti-kickback device or blade guard.
- Do not perform cutting operations with the power saw while standing on a wet or slippery floor.
- When using the power saw, do not reach across the cutting operation.
- Cut away from your body and below your shoulder level when you are using a power saw.
- If the saw becomes jammed, turn the power switch of the saw to “Off” before pulling out the incomplete cut

Vehicle Operation

- Do not operate a company vehicle without a proper, valid state operator's license and authorization.
- See our written program