



**SAFETY PROGRAM MANUAL**  
INJURY & ILLNESS PREVENTION PROGRAM

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## **POLICY STATEMENT ON SAFETY**

The management of Talisen Construction Corp. is very interested in working with you to provide a safe place in which to work. The prevention of accidents and injuries to our employees is the prime objective.

All company personnel and our subcontractors are expected to take an active and constant interest in the prevention of accidents. We call upon all employees at both Talisen and our subcontractors to use good common sense and in all their actions, take a second to think of the consequences to your fellow employees. We cannot overemphasize that all employees must do their part to minimize accidents.

Please show your support by demonstrating the following:

1. OBSERVING COMPANY SAFETY RULES.
2. KEEPING WORK AREAS FREE OF UNSAFE CONDITIONS.
3. AVOIDING AND ELIMINATING UNSAFE ACTS.
4. PROMPTLY REPORTING UNSAFE ACTS AND CONDITIONS.
5. REPORTING ALL ACCIDENTS IMMEDIATELY.

Accidents cause suffering and pain. We value each of you as individuals and hope you will cooperate with us in this important endeavor.

Any constructive criticism or suggestions toward improving safety on any of our jobs will be given prompt and careful consideration.

Sincerely,

Joseph Rigazio  
Principal & CEO  
Safety Program Administrator

Talisen Construction Corp  
213 West 35<sup>th</sup> St Suite 806  
New York, NY 10001  
(212) 244-4581



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## **DUTIES AND RESPONSIBILITIES**

A successful Safety and Injury and Illness Prevention Program can only be achieved and maintained when there is active interest, participation, and accountability at all levels of the organization. To ensure this, the company, delegates the following safety duties to all management personnel. In some cases employees will need to perform safety duties outside their regular responsibilities to prevent accidents.

The Safety Program Administrator must plan, organize, and administer the program by establishing policy, setting goals and objectives, assigning responsibility, motivating subordinates, and monitoring results. Company management will support and maintain an ongoing Safety and Injury and Illness Prevention Program through the following:

1. Providing clear understanding and direction to all management and employees regarding the importance of safety through the development, implementation, monitoring and revision of policy and procedures.
2. Providing financial support for the Safety / Injury and Illness Prevention Program through the provision of adequate funds for the purchase of necessary safety materials, safety equipment, proper personal protective equipment, adequate time for employee safety training, and maintenance of tools and equipment.
3. Overseeing development, implementation, and maintenance of the safety manual, IIPP, and other required safety programs.
4. Maintaining a company commitment to accident prevention by expecting safe conduct on the part of all managers, supervisors, and employees.
5. Holding all levels of management and employees accountable for accident prevention and safety.
6. Reviewing all accident investigations to determine corrective action.

Managers and Supervisors play a key role in the prevention of accidents on the job. They have direct contact with the employees and know the safety requirements for various jobs. Safety responsibilities for these individuals include:

1. Enforce all safety rules in the Code of Safe Practices and ensure safe work procedures.
2. Verifying corrective action has been taken regarding safety hazards and accident investigations.
3. Conducting periodic documented inspections of the work sites to identify and correct unsafe actions and conditions that could cause accidents.
4. Act as a leader in company safety policy and setting a good example by following all safety rules.
5. Becoming familiar with local, state, and federal safety regulations. The Safety Coordinator is available for assistance.

6. Train all new and existing employees in proper safety procedures and the hazards of the job.
7. Instruct all employees, under their supervision, in safe work practices and job safety requirements.
8. Hold weekly safety meetings with employees.
9. Ensure employee proficiency when assigning work requiring specific knowledge, special operations or equipment.
10. Ascertain that all machinery, equipment, and workstations are maintained in safe working condition and operate properly.
11. Correct unsafe acts and conditions that could cause accidents.
12. Communicate with all employees about safety and accident prevention activities.
13. Correct the cause of any accident as soon as possible.
14. Ascertain that proper first aid and fire fighting equipment is maintained and used when conditions warrant its use.
15. Maintain good housekeeping conditions at all times.
16. Investigate all injuries and accidents to determine their cause and potential corrective action.
17. Ascertain that all injuries involving our employees that require medical attention are properly treated and promptly reported to the office.

The Safety Program Administrator acts as a safety resource for the company and is responsible for maintaining program records. They will also be our primary person to deal with outside agencies regarding the safety program and its contents. Additional duties include:

1. Coordination of all loss prevention activities as a representative of management. Acting as a consultant to management in the implementation and administration of the Safety Program.
2. Develop and implement loss prevention policies and procedures designed to insure compliance with the applicable rules and regulations of all federal, state, and local agencies.
3. Review all accident reports to determine cause and preventability.
4. Conduct periodic reviews of the program and job sites to evaluate performance, discuss problems and help solve them.
5. Consult with representatives of our insurance companies in order that their loss control services will support the Safety Program.
6. Review Workers' Compensation Claims. Help supply the insurance carrier with information about injured employees in order to keep loss reserves as low as possible.

Every employee is responsible for working safely, both for self-protection and for protection of fellow workers. Employees must also support all company safety efforts. Specific employee safety responsibilities include:

1. If you are unsure how to do any task safely, ask your supervisor.
2. Read and abide by all requirements of the Safety Manual.
3. Know and follow the Code of Safe Practices and all company safety policies and rules.
4. Wear all required personal protective equipment.
5. Report all accidents and injuries, no matter how minor, to your supervisor immediately.
6. Do not operate any equipment you have not been trained and authorized to use.
7. Report any safety hazards or defective equipment immediately to your supervisor.
8. Do not remove, tamper with or defeat any guard, safety device or interlock.
9. Never use any equipment with inoperative or missing guards, safety devices or interlocks.
10. Never possess, or be under the influence of, alcohol or controlled substances while on the premises.
11. Never engage in horseplay or fighting.
12. Participate in, and actively support, the company safety program.

### **TALISEN CONSTRUCTION SUBSTANCE ABUSE POLICY**

Talisen Construction Corporation prohibits the use, possession, sale, purchase, manufacture, distribution, transfer or consumption of alcohol and all illegal drugs, including legally regulated drugs.

This program applies to all employees and potential employees of the company, as well as subcontractors at all tiers, including non-bargaining and bargaining unit employees.

#### **DEFINITIONS**

Banned Substances: Illegal substances, as defined by federal/state laws, including:

- a. Amphetamines
- b. Opiates
- c. Phencyclidine (PCP)
- d. Cocaine
- e. THC (Marijuana/Cannabinoids)
- f. Intoxicants (drug and alcohol)
- g. Synthetic drugs

Third-Party Administrator: Talisen currently retains Quest Diagnostics as a third-party administrator to perform testing and reporting procedures. Quest Diagnostics maintains all employee consent forms.

## **POLICIES AND PROCEDURES**

A urine drug screen shall be administered under the following circumstances.

1. **Testing for Cause.** All employees may be tested for cause when a reasonable suspicion exists that the employee appears to be under the influence of illegal drugs or illegally using prescription drugs, synthetic drugs and/or alcohol.
2. **Causal/Incident-Related.** All employees who are involved with, or may have contributed to, an incident that results in property damage or requires treatment beyond onsite first aid are required to submit to a drug screen and alcohol test.
3. **Mandated by Contract.** All employees who are involved with, or may contribute to, certain construction projects where a Client requests all employees to submit to a drug screen and alcohol test.

## **Confidentiality Statement**

Employee information, including drug screen results and rehabilitative programs, will be treated as medical records and will remain strictly confidential following HIPAA guidelines for patient confidentiality. Employee requests to release the results of drug screens to any party outside the company must be made in writing and given to the employee's immediate supervisor and designated safety officer.

## **COMPLIANCE AND ENFORCEMENT**

The compliance of all employees with our Safety Manual / IIPP is mandatory and shall be considered a condition of employment.

The following programs will be utilized to ensure employee compliance with the safety program and all safety rules.

- Training programs
- Retraining
- Disciplinary action
- Optional safety incentive programs

### Training Programs

The importance of safe work practices and the consequences of failing to abide by safety rules will be covered in the New Employee Safety Orientation and safety meetings. This will help ensure that all employees understand and abide by company safety policies.

## Retraining

Employees that are observed performing unsafe acts or not following proper procedures or rules will be retrained by their supervisor. A Safety Contact Report may be completed by the supervisor to document the training. If multiple employees are involved, additional safety meetings will be held.

## Safety Incentive Programs

Although strict adherence to safety policies and procedures is required of all employees, the company may choose to periodically provide recognition of safety-conscious employees and job sites without accidents through a safety incentive program.

## Employee Safety and Health Requirements

All employees will comply with the provisions of the OSHA Health Act of 1970. Therefore, any employee who knowingly commits an unsafe act or creates an unsafe condition, disregards the safety policy, or is a repeated safety or health offender, will be discharged. Grounds for immediate discharge are:

1. Drinking alcohol and/or drug abuse prior to or during working hours
2. Fighting
3. Theft
4. Willful damage to property
5. Failure to wear eye protection, hearing protection, hard hats, etc.
6. Not using safety harnesses and lanyards when there is a potential for falling
7. Removing and/or making inoperative safety guards on tools and equipment
8. Removing barriers and/or guardrails and not replacing them
9. Failure to follow recognized industry practices
10. Engaging in dangerous horseplay
11. Failure to notify Talisen Construction Corporation of a hazardous situation

The following safety and accident activities shall be adhered to:

1. Report all injuries immediately to your supervisor
2. Notify your supervisor should you become ill while on the job
3. Inform your supervisor if you have a disability or physical handicap
4. Never move an injured or ill person, unless to prevent further injury

## Employee Safety Rights

Employees have several important rights concerning safety, which are protected by federal, state and local laws of which every employee should be aware:

1. The right to a safe work-place free from recognized hazards.
2. The right to request information on safety and health hazards in the workplace, precautions that may be taken and procedures to be followed if an employee is injured or exposed to toxic substances.
3. The right to know about the hazards associated with the chemicals involved with an employee's work and the safety procedures an employee needs to follow to protect oneself from those hazards.



4. The right to question any instruction which requires an employee to disobey a safety rule, which puts the employee or another person in unnecessary danger or serious injury, or requires an employee to perform a task for which an employee has not been trained to safely perform.
5. The right of freedom from retaliation for demanding safety rights.

### Employee Safety Responsibilities

Employees also have personal responsibilities concerning safety. These are:

1. The responsibility of reporting all injuries and illnesses to the employee's supervisor, no matter how small.
2. The responsibility of reporting all near miss accidents.
3. The responsibility of always following the safety rules for every task performed.
4. The responsibility of reporting any visible hazards.
5. The responsibilities of helping co-workers recognize unsafe actions, or unsafe conditions caused by their actions.
6. The responsibility of asking about the safety rules about which you are unsure.

### Employee Safety Rules

It is impossible to list or include all safety rules for all the possible tasks an employee may have to perform. The following rules have been prepared to help an employee avoid hazards, which may cause injury while doing some of the more common tasks an employee may be asked to perform. Talisen Construction Corporation employees should study and follow the rules provided in this Program and ask supervisors for additional rules when asked to perform a task you are not familiar with and this Program does not address. Failure to follow safety rules and/or safe practices will result in disciplinary action, up to and including termination.

### General Safety Rules

1. Read and follow the safety notices and other information that are posted.
2. Observe and follow all safety instructions, signs and operational procedures.
3. Assist fellow employees when they ask for assistance especially when related to safety.
4. Never participate in "horseplay". Horseplay resulting in injury is often not covered by Workers' Compensation.
5. Clean up spills immediately.
6. Report all unsafe conditions, hazards, or equipment immediately. Make sure other people are warned of the problem so that they may avoid it. Wear personal protective equipment (PPE) as required to reduce injury potential. Use gloves, safety glasses, back support belts, etc., as necessary.
7. Never stand on chairs, furniture or anything other than an approved ladder or step stool.
8. Never consume intoxicating beverages or use controlled drugs before or during work.
9. Prescription medication should only be used at work with a doctor's approval.
10. No "FREE CLIMBING" is allowed at any time above 6 feet. Failure to follow this rule will lead to immediate termination of employment.

## Fire Safety

1. Immediately report all fire hazards to your supervisor.
2. Firefighting equipment shall be used only for firefighting purposes.
3. Smoking is not permitted at any time in the areas where "No Smoking" signs are posted.
4. Do not block off access to firefighting equipment.
5. Keep doors, aisles, fire escapes and stairways completely unobstructed at all times.
6. In the case of a fire, an employee's first consideration must be the safety of all persons, then attention should be directed to the protection of property if permissible.
7. If any clothing materials are soaked with oil, gasoline, paint thinner or any other flammable liquid, that clothing should be immediately removed, placed into a plastic bag and stored away from heat or ignition sources.
8. Know how to report a fire and how to turn on a fire alarm.
9. Know the location of all fire extinguishers and how to use them.
10. Know the fire exits to be used in an emergency.

## **Employee Orientation**

### Purpose

Orientation of new employees and part-time employees will begin the first day of employment on the job. The orientation will provide an orientation of Talisen Construction Corporation policies and rules and will include a thorough safety briefing; which shall include a tour of the facility or jobsites to acquaint the employee with the entire operation. The employee should also be advised how his/her job is important to the total operation.

### Procedure

The immediate supervisor and/or the safety manager of the employee will thoroughly instruct him/her in job safety requirements. The employee shall be given a hard copy of the Talisen Construction Corporation Safety Program Manual to become familiar with all safety requirements they will need for work in the field. A Safety Orientation checklist must be completed by checking each item as it is covered, to be signed by the supervisor and employee, which shall be returned to the corporate office for placement into the employee's file. The employee responsibility list will also be reviewed with the employee by his supervisor. A test will be taken on the Talisen Construction Corporation Safety Program Manual to ensure the employee is knowledgeable in all safety areas in the performance of their job.

All new employees will be given all required training prior to ever working on site at a project. This training will be a hands-on explanation of the Talisen Construction Corporation Safety Program Manual as well as any specific production training (as needed) for the safe completion of all tasks and include but not limited to:

- a. First Aid and CPR certifications
- b. Talisen Construction Corporation Safety Program Manual
- c. PPE use and requirements
- d. Lockout/Tagout program
- e. Rigging certification
- f. All company protocols
- g. Hazardous Communication Program (include MSDS training)
- h. Certifications to run any equipment to be used by the employee

## **Employee Safety Orientation**

Federal and State laws require employers to provide each employee with information and training necessary to safely complete his/her job assignment. As part of the employee orientation, the supervisor or safety manager is responsible for completion of the safety checklist for each new employee.

1. Company Safety Rules – All new employees shall receive a copy of the Talisen Construction Corporation Safety Program Manual and general safety rules on their first date of employment.
2. Emergency Procedures – Instruction will be given on specific actions to take in the event of an emergency or on the job site.
3. First Aid/Medical Treatment Procedures – The new employee shall be instructed to notify his/her immediate superintendent/supervisor when an accident occurs and to contact the emergency unit by calling the appropriate posted number. Employees shall be briefed on each job site as to the appropriate emergency number.
4. Reporting Injury, Illness, Unsafe Act or Condition – Instruction will be given as to how, where and when to report injuries and unsafe conditions or practices.
5. Personal Protective Equipment (PPE) – If personal protective equipment is required for the new employee's job assignment, the appropriate PPE shall be issued to the employee by the superintendent/supervisor. Specific training shall be given on use, care and limitations of all PPE.
6. Job Safety Procedures – The superintendent/supervisor shall instruct the new employee in correct job safety procedures. This training will be consistent with the standard operating procedures (SOP) for the specific task. Safety managers shall emphasize the need for ongoing safety awareness and provide timely safety training, as well as hold safety meetings with employees and distribute safety related information.

## **Disciplinary Action**

The failure of an employee to adhere to safety policies and procedures can have a serious impact on everyone concerned. An unsafe act can threaten not only the health and well being of the employee committing the unsafe act but can also affect the safety of his/her coworkers and customers. Accordingly, any employee who violates any of the company's safety policies will be subject to disciplinary action.

Note: Failure to promptly report any on-the-job accident or injury, on the same day as occurrence, is considered a serious violation of the Company's Code of Safe Practices. Any employee who fails to immediately report a work-related accident or injury, no matter how minor shall be subject to disciplinary action.

Employees will be disciplined for infractions of safety rules and unsafe work practices that are observed, not just those that result in an injury. Often, when an injury occurs, the accident investigation will reveal that the injury was caused because the employee violated an established safety rule and/or safe work practice(s). In any disciplinary action, the supervisor should be cautious that discipline is given to the employee for safety violations, and not simply because the employee was injured on the job or filed a Workers' Compensation claim.

Violations of safety rules and the Code of Safe Practices are to be considered equal to violations of other company policy. Discipline for safety violations will be administered in a manner that is consistent with the company's system of progressive discipline. If, after training, violations occur, disciplinary action will be taken as follows:

1. Oral warning. Document it, including date and facts on the "Safety Contact Report" form. Add any pertinent witness statements. Restate the policy and correct practice(s).
2. Written warning. Retrain as to correct procedure/practice.
3. Written warning with suspension.
4. Termination

As in all disciplinary actions, each situation is to be carefully evaluated and investigated. The particular step taken in the disciplinary process will depend on the severity of the violation, employee history, and regard to safety. Managers and supervisors should consult with the office if there is any question about whether or not disciplinary action is justified. Employees may be terminated immediately for willful or extremely serious violations. Union or contract employees are entitled to the grievance process specified by their contract.

Note: You must be consistent in the enforcement of all safety rules.

## **SAFETY COMMITTEE**

### Purpose

The purpose of the safety committee is to promote workplace safety and health by increasing the communication, education, and involvement of company personnel. The Safety Program Administrator holds permanent membership in the safety committee in order to ensure that responsibility is delegated appropriately.

### Membership

The safety committee membership shall be represented by the safety program administrator, supervisory and non-supervisory employees, with non-supervisory employees being the majority. The employees on the committee will be volunteers and will serve on the committee for a two-year term (except for the safety program administrator).

### Meetings

There will be one committee meeting every quarter. The dates will be determined by the members' schedules. All committee meetings and training will be conducted during working hours. All committee members will be compensated at their normal rate of pay during the meetings, committee specific training, and any other committee related duties.

### Emergency Meetings

The committee may conduct an emergency meeting if the majority of the members feel that such a meeting is necessary. If an emergency meeting is called outside regular working hours, the non-salaried employees will be compensated at their overtime rate.

### Recordkeeping

Complete and accurate records of the functions and proceedings of the safety committee will be maintained by the Corporate Office with copies distributed to each worksite.

Meetings will be recorded and minutes will be prepared following each committee meeting. Copies of the minutes will be kept at each worksite. These documents will be made available for inspection upon request by any employee.

### Communication

All original written communications between the company and the committee, or true copies thereof, will be maintained at each jobsite and made readily available for inspection by government agencies.

The company shall issue a timely written response to all written questions and recommendations from the safety committee.

## **COMMUNICATION**

This section establishes procedures designed to develop and maintain employee involvement and interest in the Safety Manual. These activities will also ensure effective communication between management and employees on safety related issues that is of prime importance to the company. The following are some of the safety communication methods that may be used:

1. Periodic safety meetings with employees that encourage participation and open, two-way communication.
2. New employee safety orientation and provision of the Code of Safe Practices.
3. Provision and maintenance of employee bulletin boards discussing safety issues, accidents, and general safety suggestions.
4. Written communications from management or the Safety Program Manager, including memos, postings, payroll stuffers, and newsletters.
5. Anonymous safety suggestion program.

Employees will be kept advised of highlights and changes relating to the safety program. Management shall relay changes and improvements regarding the safety program to employees, as appropriate. Employees will be involved in future developments and safety activities, by requesting their opinions and comments, as necessary.

All employee-initiated safety related suggestions shall be properly answered, either verbally or in writing, by the appropriate level of management. Unresolved issues shall be relayed to the program manager or safety committee members.

All employees are encouraged to bring any safety concerns they may have to the attention of management. The company will not discriminate against any employee for raising safety issues or concerns.

The company also has a system of anonymous notification whereby employees who wish to inform the company of workplace hazards without identifying themselves may do so by phoning or sending written notification to the main office.

## **CODE OF SAFE PRACTICES**

### **GENERAL RULES**

#### **All Employees**

##### Ergonomics and Video Display Terminals

1. Take periodic rest breaks from repetitive or prolonged activities by standing up and stretching.
2. Use a chair that is padded, is stable, mobile, swivels, and allows operator movement.
3. Sit straight up in your chair, and when needed use a footrest that has an adjustable height and is large enough to allow operator movement.
4. Adjust your computer screen and keyboard so that they are directly in front of you. Use a table large enough to hold keyboard, the display screen and all necessary documents.
5. Place the keyboard low enough so that the operator is not required to reach up or out to the keys.
6. Keep wrists and hands in a straight position while key stroking by keeping forearms parallel to the floor and elbows at your sides.

##### Housekeeping

1. Do not place materials such as boxes or trash in walkways and passageways.
2. Sweep up shavings from around equipment such as drill presses, lathes, or planers by using a broom and a dustpan.
3. Mop up water around drinking fountains and drink dispensing machines immediately.
4. Do not store or leave items on stairways.
5. Do not block or obstruct stairwells, exits, or accesses to safety and emergency equipment such as fire extinguishers or fire alarms.
6. Do not block the walking surfaces of elevated working platforms with tools or materials that are not being used.
7. Straighten or remove rugs and mats that do not lie flat on the floor.
8. Remove protruding nails or bend them down into the lumber by using a claw hammer.
9. Return tools to their storage places after using them.
10. Use caution signs or cones to barricade slippery areas such as freshly mopped floors.

##### Ladders and Step Ladders

1. Read and follow the manufacturer's instruction label affixed to the ladder.
2. Do not use ladders that have loose rungs, cracked, or split side rails, missing rubber footpads, or are otherwise visibly damaged.
3. Keep ladder rungs clean and free of grease. Remove buildup of material such as dirt or mud.

4. Do not place ladders in a passageway or doorway without posting warning signs or cones that detour pedestrian traffic away from the ladder. Lock the doorway that you are blocking with the ladder and post signs that will detour traffic away from your work.
5. Do not place a ladder at a blind corner or doorway without diverting foot traffic by blocking or roping off the area.
6. Allow only one person on the ladder at a time.
7. Face the ladder when climbing up or down it.
8. Maintain a three-point contact by keeping both hands and one foot or both feet and one hand on the ladder at all times when climbing up or down the ladder.
9. When performing work from a ladder, face the ladder and do not lean backward or sideways from the ladder.
10. Do not stand on tables, chairs, boxes or other improvised climbing devices to reach high places. Use the ladder or stepstool.
11. Do not stand on the top two rungs of any ladder.
12. Do not stand on a ladder that wobbles, or that leans to the left or right of center.
13. When using a straight or extension ladder, extend the top of the ladder at least 3 feet above the edge of the landing.
14. Secure the ladder in place by having another employee hold it if it cannot be tied to the structure.
15. Do not move a rolling ladder while someone is on it.
16. Do not place ladders on barrels, boxes, loose bricks, pails, concrete blocks, or other unstable bases.
17. Do not carry items in your hands while climbing up or down a ladder.
18. Do not try to "walk" a ladder by rocking it. Climb down the ladder, and then move it.
19. Do not use a ladder as a horizontal platform.

#### Lifting Procedures

1. Plan the move before lifting; ensure that you have an unobstructed pathway.
2. Test the weight of the load before lifting by pushing the load along its resting surface.
3. If the load is too heavy or bulky, use lifting and carrying aids such as hand trucks, dollies, pallet jacks and carts, or get assistance from a co-worker.
4. If assistance is required to perform a lift, coordinate and communicate your movements with those of your co-worker.
5. Position your feet 6 to 12 inches apart with one foot slightly in front of the other.
6. Face the load.
7. Bend at the knees, not at the back.
8. Keep your back straight.
9. Get a firm grip on the object using your hands and fingers. Use handles when they are present.
10. Hold the object as close to your body as possible.
11. While keeping the weight of the load in your legs, stand to an erect position.
12. Perform lifting movements smoothly and gradually; do not jerk the load.
13. If you must change direction while lifting or carrying the load, pivot your feet and turn your entire body. Do not twist at the waist.
14. Set down objects in the same manner as you picked them up, except in reverse.
15. Do not lift an object from the floor to a level above your waist in one motion. Set the load down on a table or bench and then adjust your grip before lifting it higher.
16. Never lift anything if your hands are greasy or wet.
17. Wear protective gloves when lifting objects that have sharp corners or jagged edges.

## **OFFICE SAFETY**

### General Rules

1. Do not stand on furniture to reach high places.
2. Do not kick objects out of your pathway; pick them up or push them out of the way.
3. Do not jump from ladders or step stools.
4. Do not block your view by carrying large or bulky items; use the dolly or hand truck or get assistance from a fellow employee.
5. Do not throw matches, cigarettes or other smoking materials into trash baskets.
6. Do not tilt the chair you are sitting in. Keep all chair legs on the floor.
7. Use the ladder or step stool to retrieve or store items that are located above your head.

### Doors

1. Keep doors in hallways fully open or fully closed.
2. Use the handle when closing doors.

### Files

1. Open only one file cabinet drawer at a time. Close the filing cabinet drawer you are working in before opening another filing drawer in the same cabinet.
2. Put heavy files in the bottom drawers of file cabinets.
3. Use the handle when closing drawers and files.

### Sharp Objects

1. Store sharp objects, such as pens, pencils, letter openers or scissors in drawers or with the tips pointing down in a container.
2. Carry pencils, scissors, and other sharp objects with the tips pointing down.

### Paper Cutter/Shredder

1. Position hands and fingers on the handle of the paper cutter before pressing down on the blade.
2. Keep the paper cutter handle in the closed or locked position when it is not being used.
3. Do not use paper-cutting devices if the finger guard is missing.
4. Do not place your fingers in or near the feed of a paper shredder.

### Staplers

1. Point the ejector slot away from yourself and bystanders when refilling staplers.
2. Keep fingers away from the ejector slot when loading or testing stapling devices.  
Use a staple remover, not your fingers, for removing staples.

### Electrical

1. Do not use frayed, cut, or cracked electrical cords.
2. Do not plug multiple electrical cords into a single outlet.
3. Do not use extension or power cords that have the ground prong removed or broken off.
4. Use a cord cover or tape the cord down when running electrical cords across aisles, between desks or across entrances or exits.
5. Turn the power switch to "Off" and unplug office machines before adjusting, lubricating or cleaning them.

### Fans

1. Do not use fans that have excessive vibration or missing guards.
2. Do not place floor type fans in walkways, aisles, or doorways.



### Stairs

1. Use the handrails when ascending or descending stairs or ramps.
2. Do not run on stairs or take more than one-step at a time.

### Phone Use

1. Sit up straight in your chair.
2. Keep your feet on floor.
3. If the chair height is too high, use a book or other object as a footrest.
4. If you use a traditional handset, do not hold the receiver by bending your neck to trap the receiver between your head and shoulder. Hold the receiver with your hand.
5. Use your headset for extended phone use.
6. For additional lower back support, place a pillow or bundled clothing in the chair at the small of your back.

### Carts

1. Do not exceed the rated load capacity noted on the manufacturer's label on the cart.
2. Ask a spotter to help guide carts around corners and through narrow aisles.
3. Do not stand on a cart or float or use it as a work platform.

### Hand Truck Operations

1. When loading hand trucks, keep your feet clear of the wheels.
2. Do not exceed the manufacturer's load rated capacity. Read the capacity plate on the hand truck if you are unsure.
3. Place the load so that it will not slip, shift, or fall. Use the straps, if they are provided, to secure the load.
4. For extremely bulky or pressurized items such as gas cylinders, strap or chain the items to the hand truck.
5. Tip the load slightly forward so that the tongue of the hand truck goes under the load.
6. Push the tongue of the hand truck all the way under the load that is to be moved.
7. Keep the center of gravity of the load as low as possible by placing heavier objects below the lighter objects.
8. Push the load so that the weight will be carried by the axle and not the handles.
9. If your view is obstructed, ask a spotter to assist in guiding the load.
10. Do not walk backward with the hand truck, unless going up stairs or ramps.
11. When going down an incline, keep the hand truck in front of you so that it can be controlled at all times.
12. Move hand trucks at a walking pace.
13. Store hand trucks with the tongue under a pallet, shelf, or table.

### Hazardous Materials

1. Follow the instructions on the label and in the corresponding Material Safety Data Sheet (MSDS) for each chemical product you will be using in your workplace.
2. Use personal protective clothing or equipment such as goggles, face shield, neoprene gloves, rubber boots, shoe covers, and rubber aprons, when using chemicals labeled "Flammable", "Corrosive", and "Caustic" or "Poisonous".
3. Do not use protective clothing or equipment that has split seams, pinholes, cuts, tears, or other visible signs of damage.
4. Do not use chemicals from unlabeled containers or unmarked cylinders.
5. Do not drag containers labeled "Flammable."
6. Do not store chemical containers labeled "Oxidizer" with containers labeled "Corrosive" or "Caustic".

#### Storeroom/Stockroom:

1. Use long handled snips when cutting strapping bands away from a shipping container.
2. Wear your safety glasses when cutting strapping bands, uncrating materials, and driving nails.
3. Stand to the side of the strapping band when cutting it. Use extreme care when removing bands from pipe on round stock loads. Chock or block loads before removing band to prevent a load shift.
4. Do not use pallets or skids that are cracked or split or have other visible damage.
5. Stack heavy or bulky storage containers on middle and lower shelves of the storage rack.
6. Do not run on stairs or take more than one-step of a staircase at a time.
7. Do not jump from elevated places such as truck beds, platforms, or ladders.
8. Do not lift slippery or wet objects; use a hand truck.
9. Follow the safe handling instructions listed on the label of the container or listed on the corresponding Material Safety Data Sheet when handling each chemical stored in the stockroom.
10. Do not handle or load any containers of chemicals if their containers are cracked or leaking.

### **CARPENTRY**

#### **ELECTRICAL POWERED TOOLS**

1. Do not use power equipment or tools on which you have not been trained.
2. Keep power cords away from the path of drills, saws, vacuum cleaners, floor polishers, mowers, slicers, knives, grinders, irons, and presses.
3. Do not carry plugged-in equipment or tools with your finger on the switch.
4. Do not carry equipment or tools by the cord.
5. Disconnect the tool from the outlet by pulling on the plug, not the cord.
6. Turn the tool off before plugging or unplugging it.
7. Do not leave tools that are "On" unattended.
8. Do not handle or operate electrical tools when your hands are wet or when you are standing on wet floors.
9. Do not operate spark inducing tools such as grinders, drills, or saws near containers labeled "Flammable" or in an explosive atmosphere such as a paint spray booth.
10. Turn off electrical tools and disconnect the power source from the outlet before attempting repairs or service work. Tag the tool "Out of Service."
11. Do not connect multiple electrical tools into a single outlet.
12. Do not run extension cords through doorways, through holes in ceilings, walls, or floors.
13. Do not drive over, drag, step on or place objects on a cord.
14. Do not operate a power hand tool or portable appliance with a two-pronged adapter or a two-conductor extension cord.
15. Do not use a power hand tool while wearing wet cotton gloves or wet leather gloves.
16. Never operate electrical equipment barefooted. Wear rubber-soled or insulated work boots.
17. Do not operate a power hand tool or portable appliance while holding a part of the metal casing or holding the extension cord in your hand. Hold all portable power tools by the plastic handgrips or other nonconductive areas designed for gripping purposes.
18. Do not operate a power hand tool or portable appliance that has a frayed, worn, cut, improperly spliced, or damaged power cord.
19. Do not operate a power hand tool or portable appliance if the ground pin from the three-pronged power plug is missing or has been removed.

## **GARAGE DOORS**

1. Do not use undersized rods or other improvised tools to wind garage door springs.
2. Engage garage door lock in the "locked" position before winding the springs.
3. Do not attempt to adjust winding cones or bars when the garage door is in the full open position.

## **HAND TOOLS**

1. Use tied-off containers to keep tools from falling off scaffolds and other elevated work platforms.
2. Keep the blades of all cutting tools sharp.
3. Carry all sharp tools in sheaths or holsters.
4. Tag worn, damaged, or defective tools "Out of Service" and do not use them.
5. Do not use a tool if its handle has splinters, burrs, cracks, splits or if the head of the tool is loose.
6. Do not use impact tools such as hammers, chisels, punches, or steel stakes that have mushroomed heads.
7. When handing a tool to another person, direct sharp points and cutting edges away from yourself and the other person.
8. Do not chop at heights above your head when working with a hand axe.
9. Do not carry sharp or pointed hand tools such as screwdrivers, scribes, aviation snips, scrapers, chisels or files in your pocket unless the tool or pocket is sheathed.
10. Do not perform "make-shift" repairs to tools.
11. Do not use "cheaters" on load binders or "boomers."
12. 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.
13. Do not throw tools from one location to another, from one employee to another, from scaffolds or other elevated platforms.

## **Chisels**

1. Keep the cutting edge of the chisel sharp.
2. Do not use chisels with damaged striking ferrules.
3. Hold a chisel with a tool holder if possible.
4. Clamp a small work piece in a vise and chip towards the stationary jaw when working with a chisel.

## **Clamps**

1. Do not use the C-clamp for hoisting materials.
2. Do not use the C-clamp as a permanent fastening device.

## **Files/Rasps**

1. Do not use a file as a pry bar, hammer, screwdriver, or chisel.
2. When using a file or a rasp, grasp the handle in one hand and the toe of the file in the other.
3. Do not hammer on a file.

## **Hammers**

1. Use a claw hammer for pulling nails and driving nails.
2. Do not strike nails or other objects with the cheek of the hammer.
3. Do not strike a hardened steel surface, such as a cold chisel, with a claw hammer.
4. Do not strike one hammer against another hammer.
5. Do not use a hammer if your hands are oily, greasy, or wet.
6. Do not use a hammer as a wedge, a pry bar or for pulling large spikes.
7. Use only a sledge-type hammer on a striking face wrench.

### **Knives/Sharp instruments**

1. When handling knife blades and other cutting tools, direct sharp points and edges away from you.
2. Store knives in knife blocks or in sheaths after use.
3. Do not use knives with dull blades.
4. Do not use honing steels that do not have disc guards.
5. Do not attempt to catch a falling knife.
6. Use knives for the operation for which they are named.
7. Do not use knives with broken or loose handles.
8. Do not use knives as screwdrivers, pry bars, can openers or ice picks.
9. Do not pick up knives by their blades.
10. Carry knives with their tips pointed towards the floor.

### **Pliers**

1. Do not attempt to force pliers by using a hammer on them.
2. Do not slip a pipe over the handles of pliers to increase leverage.
3. Use pliers with insulated handles for electrical work.
4. Do not use pliers that are cracked, broken, or sprung.
5. When using diagonal cutting pliers, shield the loose pieces of cut material from flying into the air by using a cloth or your gloved hand.

### **Saws**

1. Do not use an adjustable blade saw such as a hacksaw, coping saw, keyhole saw, or bow saw, if the blade is not taut.
2. Do not use a saw that has dull saw blades.
3. Keep hands and fingers away from the saw blade while using the saw.
4. Do not carry a saw by the blade.
5. When using a handsaw, hold the work piece firmly against the worktable.
6. Do not use woodworking equipment such as circular saws, radial saws, or jointers if they do not have guards on the saw blade.
7. Keep control of saws by decreasing downward pressure at the end of the stroke.
8. When operating scroll saws, stop the machine before removing scrap pieces from the table.
9. Clamp work when using a hole saw.

### **Screwdrivers**

1. Always match the size and type of screwdriver blade to fit the head of the screw.
2. Do not hold the work piece against your body while using a screwdriver.
3. Do not put your fingers near the blade of the screwdriver when tightening a screw.
4. Use an awl, drill or a nail to make a starting hole for screws.
5. Do not force a screwdriver by using a hammer or pliers on it.
6. Do not use a screwdriver as a punch, chisel, pry bar or nail puller.
7. Use a screwdriver that has an insulated handle for electrical work.
8. Do not use a screwdriver if your hands are wet, oily, or greasy.
9. Do not use a screwdriver to test the charge of a battery.
10. When using a spiral ratchet screwdriver, push down firmly and slowly.

### **Snips**

1. Wear safety glasses or safety goggles when using snips to cut materials.
2. Wear work gloves when cutting materials with snips.
3. Do not use straight cut snips to cut curves.

4. Keep the blade aligned by tightening the nut and bolt on the snips.
5. Do not use snips as a hammer, screwdriver, or pry bar.
6. Use the locking clip on the snips after use.

### **Vises**

1. When clamping a long work piece in a vise, support the far end of the work piece by using an adjustable pipe stand, sawhorse, or box.
2. Position the work piece in the vise so that the entire face of the jaw supports the work piece.
3. Do not use a vise that has worn or broken jaw inserts, or has cracks or fractures in the body of the vise.
4. Do not slip a pipe over the handle of a vise to gain extra leverage.

### **HAZARDOUS MATERIALS**

1. Follow the instructions on the label and in the corresponding Material Safety Data Sheet (MSDS) for each chemical product used in your workplace.
2. Do not use chemicals from unlabeled containers and unmarked cylinders.

### **HOUSEKEEPING**

1. Do not place material such as boxes or trash in walkways and passageways.
2. Sweep up shavings from around equipment such as drill presses, lathes, or planers by using a broom and a dustpan.
3. Do not block or obstruct stairwells, exits or accesses to safety and emergency equipment such as fire extinguishers or fire alarms.
4. Keep walking surfaces of elevated working platforms, such as scaffolds, clear of tools and materials that are not being used.
5. Remove protruding nails or bend them down into the lumber by using a claw hammer.
6. Return tools to their storage places after use.
7. Do not use gasoline for cleaning purposes.

### **LADDERS AND STEP LADDERS**

1. Read and follow the manufacturer's instructions label affixed to the ladder if you are unsure how to use the ladder.
2. Do not use ladders that have loose rungs, cracked or split side rails, missing rubber footpads, or are otherwise visibly damaged.
3. Keep ladder rungs clean and free of grease. Remove material buildup such as dirt or mud.
4. Do not use a metal ladder on rooftops or within 50 feet of electrical power lines.
5. Allow only one person on the ladder at a time.
6. Face the ladder when climbing up or down.
7. Maintain a three-point contact by keeping both hands and one foot or both feet and one hand on the ladder at all times when climbing up or down.
8. When performing work from a ladder, face the ladder and do not lean backward or sideways from the ladder.
9. Do not stand on the top two rungs of any ladder.
10. Do not stand on a ladder that wobbles, or that leans to the left or right.
11. When using a straight ladder, extend the top of the ladder at least 3 feet above the edge of the landing.
12. Do not move a rolling ladder while someone is on it.
13. Do not place ladders on barrels, boxes, loose bricks, pails, concrete blocks, or other unstable bases.
14. Do not carry items in your hands while climbing up or down a ladder.
15. Do not try to "walk" a ladder by rocking it. Climb down the ladder, and then move it.

16. Do not use a ladder as a horizontal platform.

### **LIFTING PROCEDURES**

1. Plan the move before lifting; remove obstructions from your chosen pathway.
2. Test the weight of the load before lifting by pushing the load along its resting surface.
3. If the load is too heavy or bulky, use lifting and carrying aids such as hand trucks, dollies, pallet jacks and carts, or get assistance from a co-worker.
4. If assistance is required to perform a lift, coordinate and communicate your movements with those of your co-worker.
5. Position your feet 6 to 12 inches apart with one foot slightly in front of the other.
6. Face the load.
7. Bend at the knees, not at the back.
8. Keep your back straight.
9. Get a firm grip on the object with your hands and fingers. Use handles when present.
10. Never lift anything if your hands are greasy or wet.
11. Wear protective gloves when lifting objects with sharp corners or jagged edges.
12. Hold objects as close to your body as possible.
13. Perform lifting movements smoothly and gradually; do not jerk the load.
14. If you must change direction while lifting or carrying the load, pivot your feet and turn your entire body. Do not twist at the waist.
15. Set down objects in the same manner as you picked them up, except in reverse.
16. Do not lift an object from the floor to a level above your waist in one motion. Set the load down on a table or bench and then adjust your grip before lifting it higher.
17. Slide materials to the end of the tailgate before attempting to lift them off of a pick-up truck. Do not lift over the walls or tailgate of the truck bed.

### **PERSONAL PROTECTIVE EQUIPMENT**

1. Do not paint or drill holes in hard hats.
2. Do not wear hard hats that are dented or cracked.
3. Wear safety glasses, goggles, or face shield when using chippers, grinders, lathes, or sanders.
4. Wear earplugs or earmuffs in areas posted "Hearing Protection Required."

### **PNEUMATIC TOOLS**

1. Do not point a compressed air hose at bystanders or use it to clean your clothing.
2. Do not use tools that have handles with burrs or cracks.
3. Do not use compressors if their belt guards are missing. Replace belt guards before use.
4. Turn the tool "off" and let it come to a complete stop before leaving it unattended.
5. Disconnect the tool from the airline before making any adjustments or repairs to the tool.
6. Engage positive locks on hoses and attachments before use.
7. Shut off pressure valve and disconnect airline when not in use.
8. Tag damaged or defective pneumatic tools "Out of Service" to prevent usage of the tool by other employees.

### **POWDER ACTUATED TOOLS**

1. Only employer-authorized personnel, with a valid certification card may operate powder-actuated tools.
2. Wear safety glasses, goggles, or face shields when operating powder actuated tools.
3. Wear earplugs or earmuffs when making fastenings.
4. Do not permit bystanders in the area when using a powder-actuated tool.
5. Do not load tool until ready to make a fastening.
6. Keep tool pointed in a safe direction (away from personnel).

7. Post a sign alerting co-workers that a powder actuated tool is being used.
8. After use, lock powder actuated tools and powder loads in a container and store in a safe place such as a locker or the trunk of a car.

## **SCAFFOLDING**

1. Follow the manufacturer's instructions when erecting the scaffold.
2. Do not work on scaffolds outside during stormy or windy weather.
3. Do not climb on scaffolds that wobble or lean to one side.
4. Initially inspect scaffold prior to mounting. Do not use a scaffold if any pulley, block, hook, or fitting is visibly worn, cracked, rusted, or otherwise damaged. Do not use a scaffold if any rope is frayed, torn, or visibly damaged.
5. Do not use any scaffold tagged "Out of Service."
6. Do not use unstable objects such as barrels, boxes, loose brick or concrete blocks to support scaffolds or planks.
7. Do not use a scaffold unless guardrails and all flooring are in place.
8. Level the scaffold after each move. Do not extend adjusting leg screws more than 12 inches.
9. Do not walk or work beneath a scaffold unless a wire mesh has been installed between the midrail and the toe board or planking.
10. Use safety belts and lanyards when working from scaffolds that are higher than 10 feet and that do not have top and mid-guard rails.
11. Do not climb the cross braces for access to the scaffold. Use a ladder.
12. Do not jump from, to, or between scaffolding.
13. Do not slide down cables, ropes or guys used for bracing.
14. Keep both feet on the decking. Do not sit or climb on the guardrails.
15. Do not lean out from the scaffold. Do not rock the scaffold.
16. Keep the scaffold free of scraps, loose tools, tangled lines and other obstructions.
17. Do not throw anything "overboard" unless a spotter is available. Use debris chutes or lower things by hoist or by hand.
18. Do not move a mobile scaffold with anyone on the scaffold.
19. Lock and chock wheels on rolling scaffolds before using.

## **STAIRWAYS, FLOORS AND OPENINGS**

1. Do not work on open sided floors, elevated walkways or elevated platforms if there are no guardrails in place.
2. Stand clear of floor openings if guardrails or covers are removed or displaced.

## **HEAVY EQUIPMENT OPERATORS**

### Site Safety

1. Do not start work until barricades, barrier logs, fill or other protection have been installed to isolate the work area from local traffic.
2. Do not work outdoors during lightning storms.
3. Drink plenty of clear liquids during your breaks.
4. Take breaks in shaded areas.

### Heavy Equipment Safety

#### General

1. No passengers are permitted on heavy equipment.
2. Keep windows and windshield clean.
3. Do not use heavy equipment if its horn or backup alarm does not sound.
4. Turn off the engine before leaving heavy equipment unattended.
5. Do not jump off of or onto any heavy equipment.

6. Keep heavy equipment in gear when going down grade. Do not use neutral.
7. Display the "Slow Moving Vehicle" sign when operating heavy equipment on roads.
8. Do not operate backhoes, power shovels and other heavy equipment within two (2) feet from the edge of an excavation.

#### Backhoe/Power Shovel Operations

1. Do not use a bucket or other attachments for a staging or temporary platform for workers.
2. Do not operate backhoe over or across underground utilities that are marked by paint, flagged, or staked.
3. Set swing brake of the bucket arm when moving the vehicle to and from the digging site.
4. Stay in the compartment during operation of the backhoe or power shovel. Do not reach in or attempt to operate controls from outside the backhoe or power shovel.

#### Forklifts Pre-Use Inspection

Do not use forklift if any of the following conditions exist:

1. The mast has broken or cracked weld-points.
2. The roller tracks are not greased or the chains are not free to travel.
3. Forks are unequally spaced or cracks exist along the blade or at the heels.
4. Hydraulic fluid levels are low.
5. Hydraulic line and fitting have excessive wear or are crimped.
6. Fluid is leaking from the lift or the tilt cylinders.
7. The hardware on the cylinders is loose.
8. Tires are excessively worn, split, or have missing tire material.
9. Air filled tires are not filled to the operating pressure indicated on the tire.
10. Batteries have cracks or holes, uncapped cells, frayed cables, broken cable insulation, loose connections, or clogged vent caps.

#### Starting the Forklift

1. Apply the foot brake and shift gears to neutral before turning the key.

#### Picking Up a Load

1. Square up on the center of the load and approach it straight on with the forks in the travel position.
2. Stop when the tips of your forks are about a foot from the load.
3. Level the forks and slowly drive forward until the load is resting against the backrest of the mast.
4. Lift the load high enough to clear whatever is under it.
5. Back up about one foot, then slowly and evenly tilt the mast backwards to stabilize the load.

#### Putting a Load Down

1. Square up and stop about one foot from desired location.
2. Level the forks and drive to the loading spot.
3. Slowly lower the load to the floor.
4. Tilt the forks slightly forward so that you do not hook the load.
5. When the path behind you is clear of obstructions, back straight out until the forks have cleared the pallet.

#### Stacking One Load on Top of Another

1. Stop about one foot away from the loading area and lift the mast high enough to clear the top of the stack.



2. Slowly move forward until the load is squarely over the top of the stack.
3. Level the forks and lower the mast until the load is no longer supported by the forks.
4. Look over both shoulders for obstructions and back straight out if the path is clear.

#### Forklift Safety Rules

1. Do not exceed the lift capacity of the forklift. Read the lift capacity plate on the forklift if you are unsure.
2. Follow the manufacturer's guidelines concerning changes in the lift capacity before adding attachments, such as wedges, to a forklift.
3. Lift the load an inch or two to test for stability: If the rear wheels are not in firm contact with the floor, take a lighter load or use a forklift with a higher lift capacity.
4. Do not raise or lower a load while you are en-route. Wait until you are in the loading area and have stopped before raising or lowering the load.
5. After picking up a load, adjust the forks so that the load is tilted slightly backward for added stability.
6. Drive with the load at a ground clearance height of 4-6 inches at the tips and 2 inches at the heels in order to clear most uneven surfaces and debris.
7. Drive at a walking pace and apply brakes slowly to stop when driving on slippery surfaces such as icy or wet floors.
8. Approach angle. □ railroad tracks at a 45
9. Do not drive over objects in your pathway.
10. Do not drive into an area with a ceiling height that is lower than the height of the mast or overhead guard.
11. Steer wide when making turns.
12. Do not drive up to anyone standing or working in front of a fixed object such as a wall.
13. Do not drive along the edge of an unguarded elevated surface such as a loading dock or staging platform.
14. Obey all traffic rules and signs.
15. Sound horn when approaching blind corners, doorways, or aisles to alert other operators and pedestrians.
16. Do not exceed a safe working speed of five miles per hour. Slow down in congested areas.
17. Stay a minimum distance of three truck lengths from other operating mobile equipment.
18. Drive in reverse and use a signal person when your vision is blocked by the load.
19. Look in the direction that you are driving; proceed when you have a clear path.
20. Do not use bare forks as a man-lift platform.
21. Do not drive the forklift while people are on the attached man-lift platform.
22. Drive loaded forklifts forward up ramps.
23. Raise the forks an additional two inches to avoid hitting or scraping the ramp surface as you approach the ramp.
24. Drive loaded forklifts in reverse when driving down a ramp.
25. Drive unloaded forklifts in reverse going up a ramp and forward going down a ramp.
26. Do not attempt to turn around on a ramp.
27. Do not use "Reverse" to brake.
28. Lower the mast completely, turn off the engine, and set the parking brake before leaving your forklift.

#### **HEAVY EQUIPMENT OPERATORS**

##### Personal Protective Equipment

1. Wear hard hats, hearing protection and safety goggles while operating heavy equipment.
2. Do not wear hard hats that are dented or cracked.

3. Do not continue to work if your safety glasses become fogged. Stop work and clean the glasses until the lenses are clear and defogged.

#### General Hand Tool Safety

1. Keep the blade of all cutting tools sharp.
2. Do not use a tool if its handle has splinters, burrs, cracks, splits or if the head of the tool is loose.
3. Tag worn, damaged, or defective tools "Out of Service" and do not use them.
4. Do not use impact tools such as hammers or chisels that have mushroomed heads.
5. When handing a tool to another person, direct sharp points, and cutting edges away from yourself and the other person.
6. When using knives, shears or other cutting tools, cut in a direction away from your body.
7. Carry all sharp tools in a sheath or holster.
8. Do not perform "make-shift" repairs to tools.
9. Do not use "cheaters" on load binders or "boomers."
10. Do not carry tools in your hand when climbing. Carry tools in tool belts or hoist the tools to the work area using a hand line.
11. Do not throw tools from one location to another or from one employee to another.

#### Pneumatic Tools

1. Do not point a charged compressed air hose at bystanders or use it to clean your clothing.
2. Lock and/or tag tools "Out of Service" to prevent usage of the tool.
3. Do not use tools that have handles with burrs or cracks.
4. Do not use compressors if their belt guards are missing. Replace belt guards before using the compressor.
5. Turn the power switch of the tool to "Off" and let it come to a complete stop before leaving it unattended.
6. Disconnect the tool from the airline before making any adjustments or repairs to the tool.

#### Lifting Equipment

1. Do not use chain slings if links are cracked, twisted, stretched, or bent.
2. Do not shorten slings by using makeshift devices such as knots or bolts.
3. Do not use a kinked chain.
4. Protect slings from the sharp edges of their loads by placing pads over the sharp edges of the items that have been loaded.
5. Wear work gloves when handling rough, sharp-edged, or abrasive chains, cables, ropes, or slings.
6. 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.

#### When Lifting

1. Do not place your hands between the sling and its load when the sling is being tightened around the load.
2. Lift the load from the center of hooks, not from the point.

### **GENERAL LABOR PERSONNEL**

#### Site Safety

1. Do not start work until barricades, barrier logs, fill or other protection have been installed to isolate the work area from local traffic.
2. Reflective warning vests must be worn by traffic flagmen who are assigned to controlling traffic.

3. Do not approach any heavy equipment until the operator has seen you and has signaled to you that it is safe to approach.
4. Walk around or step over holes, rocks, roots, materials or equipment in your pathway.
5. Do not work outdoors during lightning storms.
6. Drink plenty of clear liquids during your breaks.
7. Take breaks in shaded areas.

#### Knives/Sharp Instruments

1. Use knives for the operation for which they are made.
2. Do not use knives that have broken or loose handles.
3. Do not use knives as screwdrivers, pry bars, can openers or ice picks.
4. When handling knife blades and other cutting tools, direct sharp points and edges away from you.
5. Cut in the direction away from your body when using knives.

#### Hand Tool Safety

##### General

1. Keep the blade of all cutting tools sharp.
2. Do not carry sharp or pointed hand tools such as screwdrivers, scribes, chisels or files in your pocket unless the tool or pocket is sheathed.
3. Tag worn, damaged, or defective tools "Out of Service" and do not use them.
4. Do not use a tool if its handle has splinters, burrs, cracks, splits or if the head of the tool is loose.
5. Do not use impact tools such as hammers, steel stakes, or chisels that have mushroomed heads.
6. Do not perform "make-shift" repairs to tools.
7. Do not throw tools from one location to another or from one employee to another.
8. Transport hand tools only in toolboxes or tool belts. Do not carry tools in your clothing.

##### Hammers

1. Do not use a hammer if your hands are oily, greasy, or wet.
2. Do not strike objects with the cheek of the hammer.
3. Do not strike one hammer against another hammer.

##### Pliers

1. Do not attempt to force pliers by using a hammer on them.
2. Do not use pliers that are cracked, broken, or sprung.

##### Saws

1. Keep control of saws by releasing downward pressure at the end of the stroke.
2. Do not use a saw that has dull saw blades.
3. Oil saw blades after each use.
4. Keep hands and fingers away from the saw blade while you are using the saw.
5. Do not carry a saw by the blade.
6. When using a handsaw, hold the work piece firmly against the worktable.

#### Electrical Powered Tools

1. Do not use power equipment or tools on which you have not been trained.
2. Keep power cords away from path of power saws.
3. Do not use cords that have splices, exposed wires, or cracked or frayed ends.

4. Do not carry plugged in equipment or tools with your finger on the switch.
5. Do not carry equipment or tools by the cord.
6. Turn the tool off before plugging or unplugging it.
7. Do not leave tools that are "On" unattended.
8. Do not handle or operate electrical tools when your hands are wet or when you are standing on wet floors or wet ground.
9. Do not use extension cords or other grounded three pronged power cords that have the ground prong removed or broken off.
10. Do not use an adapter that eliminates the ground such as a cheater plug.
11. Do not drive over, drag, step on or place objects on a cord.

#### General Power Saw Safety

1. Wear the prescribed personal protective equipment such as goggles, gloves, dust masks, and hearing protection when operating the power saw.
2. Do not use a power saw that has cracked, broken, or loose guards or other visible damage.
3. Turn off the saw before making measurements, adjustments, or repairs.
4. Keep your hands away from the exposed blade.
5. Operate the saw at full cutting speed with a sharp blade to prevent kickbacks.
6. If the saw becomes jammed, turn the power switch of the saw to "OFF" before pulling out the incomplete cut.
7. Do not alter the anti-kickback device or blade guard.
8. When using the power saw, do not reach across the cutting operation.
9. When using the power saw, do not hold the work piece against your body when making the cut.

#### Pneumatic Tools/Compressed Air

1. Do not point a compressed air hose at bystanders or use it to clean your clothing.
2. Do not use pneumatic tools that have handles with burrs or cracks.
3. Lock and/or tag tools "Out of Service" to prevent usage of the tool.
4. Do not use compressors if their belt guards are missing. Replace the belt guards before using the compressor.
5. Turn the power switch of the tool to "Off" and let it come to a complete stop before leaving it unattended.
6. Disconnect the tool from the airline before making any adjustments or repairs to the tool.

#### Personal Protective Equipment

1. Do not wear hard hats that are dented or cracked.
2. Do not continue to work if your safety glasses become fogged. Stop work and clean the glasses until the lenses are clear and defogged.
3. Wear your earplugs or earmuffs in areas posted "Hearing Protection Required."
4. Wear heavy leather-faced work gloves when handling wire-mesh.

#### Hazardous Materials

1. Follow the instructions on the label and in the corresponding Material Safety Data Sheet (MSDS) for each chemical product you will be using in your workplace.
2. Do not use protective clothing or equipment that has split seams, pinholes, cuts, tears, or other visible signs of damage.
3. Each time you use your gloves, wash them, before removing the gloves, using cold tap water and normal hand washing motion. Always wash your hands after removing the gloves.
4. Do not use chemicals from unlabeled containers or unmarked cylinders.
5. Always use chemical goggles and a face shield before handling chemicals labeled "Corrosive" or "Caustic."

6. Do not store chemical containers labeled "Oxidizer" with containers labeled "Corrosive" or "Caustic."
7. Do not smoke while handling chemicals labeled "Flammable".

#### Vehicle/Trailer Safety

##### Vehicle Safety

- A. Drive on the graded roadways that have been leveled for this purpose.
- B. Turn on low-beam headlights when driving on the site.
- C. Hold onto vehicle when stepping out of it onto loose ground, holes, or rocks.
- D. Tools and materials shall be secured to prevent movement when transported in the same compartment with employees.
- E. Do not exceed the maximum number of people for which the vehicle is designed to transport.
- F. Do not operate a loaded vehicle or load it, by means of cranes, power shovels, loaders, or similar equipment, if the vehicle does not have a cab shield and/or canopy to protect you from shifting or falling materials.

#### G. Fueling Vehicles

- Turn the vehicle off before fueling.
  - Do not smoke while fueling a vehicle.
  - Wash hands with soap and water if you spill gasoline on them.
  - Do not carry extra fuel on any vehicle except in a properly mounted fuel tank approved by your employer.
- H. Driving Rules
- Shut all doors and fasten your seat belt before moving the vehicle.
  - Obey all traffic patterns and signs at all times.
  - Maintain a three point contact using both hands and one foot or both feet and one hand when climbing into and out of vehicles.
  - Drive up the slope or down the slope not across the slope.

##### Trailer Safety

- A. Set the parking brake in the towing vehicle and use wheel blocks to chock the wheels of the trailer before removing the kettle from the trailer.
- B. Permit no one to ride in the trailer.
- C. Use ramps to load and unload kettles and equipment from the trailer.
- D. Take slow, wide turns when towing trailers.
- E. Do not exceed the load capacity as posted on the trailer door of the trailer.
- F. Do not place all the heavy equipment on one side of the trailer.
- G. Secure equipment and fuel tanks to the vehicle with chains or straps to eliminate or minimize shifting of the load.
- H. Do not mount or dismount equipment on the traffic side.

#### LATHERS

##### Lifting Safety (Bags, Cans, Buckets)

- A. Position your feet 6 to 12 inches apart with one foot slightly in front of the other.
- B. Face the load.
- C. Bend at the knees, not at the back.
- D. Keep your back straight.
- E. Get a firm grip on the object with your hands and fingers. Use handles when present.
- F. Perform lifting movements smoothly and gradually; do not jerk the load.

- G. Hold objects as close to your body as possible.
- H. If you must change direction while lifting or carrying the load, pivot your feet and turn your entire body. Do not twist at the waist.
- I. Set down objects in the same manner as you picked them up, except in reverse.
- J. Slide materials to the end of the tailgate before attempting to lift them off a pick-up truck. Do not lift over the walls or tailgate of the truck bed.

### **Sandblasting**

- A. Only authorized personnel may use blasting equipment.
- B. Wear your eye protection, respirator, and protective clothing when blasting.
- C. Visually inspect hoses or fittings on blasting equipment for wear and tear prior to use. Do not use if the hose or fitting is cracked or otherwise damaged.
- D. Post area, "Unauthorized personnel keep out".
- E. When working outdoors, keep shirts on to avoid bruises, dehydration, and sunburn.

### **Restoration Job and Asbestos is Suspected**

- A. Do not perform asbestos removal operations, unless you have been trained, qualified, and certified in asbestos removal procedures.
- B. Use the respirator that has been fit tested and assigned to you by your supervisor.
- C. Always assume that materials used prior to 1976, such as plaster and blown insulation contain asbestos.
- D. Do not use sanders or power devices that may create dust or airborne particles.
- E. Do not dry scrape, bead blast or mechanically pulverize any existing plaster or blown insulation.

### **Fiberglass Batts or Sprayed-on Insulation**

- A. Do not take work clothes home when exposed to sprayed-on insulation or fiberglass batts.
- B. Change your work clothes before leaving the job site.
- C. Place work clothes contaminated with fiberglass or sprayed-on insulation in a closed labeled container approved by your employer.
- D. Use your respirator when working with sprayed-on insulation or fiberglass.

### **Respiratory Protection**

- A. Shave daily to prevent facial hair from interfering with the face seal of the respirator.
- B. Clean and return respirators to their carrying cases or cartons and store them in your locker or in a designated storage area as instructed by your employer when the work is completed.
- C. Only use the respirator that has been fitted and issued to you.

### **Infection Control**

- A. Wash your hands after removing your gloves with soap or mild detergent and water before eating, smoking, using the toilet, or any areas of the body that may have contacted cementitious mixtures, pastes or spray-on insulation at the end of each workday.
- B. Use a mechanic's cream hand cleaner such as "Go-Jo" or "Humus" where water is not readily available.

## **FINISHING PERSONNEL-(tapping, bedding, sanding) Hazardous Materials**

### Mixing Cementitious Components

- A. Apply Vaseline to exposed skin surfaces on your arms and hands prior to handling plaster, lime or any cementitious mixtures.
- B. Do not handle lime or cementitious mixtures if you have open cuts or scratches on exposed skin surfaces such as your arms or hands.
- C. Use personal protective clothing or equipment such as canvas gloves and protective eyewear, to avoid cement poison or burns.
- D. Open doors, windows, and turn the power switch of the local exhaust fans to "On" when working indoors.

### **Applying Exterior Finishes (scratch coats, coquina, stucco installations, etc.)**

- A. Do not use a metal ladder on rooftops or within 50 feet of electrical power lines.
- B. Do not block the walking surfaces of elevated working platforms, such as scaffolds, with tools or materials that are not being used.
- C. When working outdoors, drink plenty of fluids and keep shirts on to avoid dehydration and sunburn.

### **Using Joint Compounds**

- A. Wear protective gloves when handling compounds or chemicals from containers labeled "Flammable," "Toxic," "Caustic" or "Poisonous" and wash your hands after removing the gloves.
- B. Follow the instructions on the label and in the corresponding Material Safety Data Sheet (MSDS) for each joint compound or chemical product used in your workplace.
- C. Each time you use your gloves, wash your gloves before removing them using cold tap water and normal hand washing motion. Always wash your hands after removing the gloves.
- D. Do not use joint/filler compounds or chemicals from unlabeled containers.
- E. Do not store chemical containers labeled "Oxidizer" with containers labeled "Corrosive" or "Caustic."
- F. Always use goggles and gloves when handling joint/filler compounds or chemicals labeled "Corrosive" or "Caustic."

### **Applying Finishes: Plaster, Coquina, Popcorn, or other**

- A. Do not smoke or eat while performing stucco or "popcorn" finishes.
- B. Stand clear of mixing or blowing operations.
- C. Do not stand, work, or operate pneumatic equipment such as blowers with hoses within three feet of any unprotected roof opening or within five feet of any unprotected roof edge.

### **Job Site Safety**

- A. Do not walk on or under partially demolished walls or floors.
- B. Stop working outdoors and seek shelter during lightning storms.
- C. Walk around or duck under protruding framing or ductwork and limbs.
- D. Do not walk on fallen trees; walk on the ground.
- E. Keep combustible liquids stored and covered in approved containers.

### **Personal Protective Equipment**

- A. Wear your safety glasses when mixing plaster ingredients and additives, applying spackling, finishing ceilings, or sanding.
- B. Wear dust mask or respirator when emptying sacks of dry material such as additives for fireproofing or plaster ingredients.
- C. Use lifelines, safety harnesses, or lanyards when you are working higher than 6 feet off the ground.
- D. Wear safety glasses while plastering, applying mud, or sanding.
- E. Wear safety goggles when using power tools or when applying a finishing material.

### **Manual Stacking and Handling Material**

- A. Store all wallboard flat.
- B. Do not store boards vertically, this practice will damage the edges creating unstable stacks.
- C. Stand each board vertically on its side as close to the edge of the pile as possible, tilt the board toward the stack, and let the board drop freely on top of the stack.
- D. Do not allow boards to overhang more than an inch. Align flush all boards, to keep the boards from becoming unstable and topple on someone while restacking.
- E. Use a co-worker to assist handling the boards when stocking. coordinate and communicate your movements with those of your co-worker.

### **Stacking Material (Sheet rock, gypsum, foam boards, etc.)**

- A. When stacking panels by hand, position the panels sideways slightly in front of you, so you do not have to reach over your head or twist your body to lift these materials.
- B. Position panels to lean flat against a wall and do not wobble or slide.
- C. Push and slide panels along their edge or get assistance from a co-worker.

### **ELECTRICIANS**

#### Hot Line Safety

1. Clean all protective line equipment after each use, prior to storage.
2. Wear rubber gloves or use hot sticks when removing tree branches, limbs, or similar objects from contact with high voltage lines, panels, or equipment.
3. Do not wear rubber protective gloves while climbing or descending a pole.
4. Wear 100% cotton or flame resistant shirts or jumpers (with sleeves rolled down) and protective hats when working on or near live parts, lines, and panels or when climbing poles.
5. Wear body belts with straps or lanyards when working at an elevated position (poles, towers, etc.).
6. Visually inspect body belts and straps before use for defects, wear, and damage.
7. When working with lines of 600 volts or more:
  - Wear rubber gloves or use hot sticks when placing protective equipment on/around energized voltage conductors.
  - Do not work on the line that is removed from service until the line is cleared, tagged, tested, and grounded.
  - Treat bare wire communication conductors on structures as energized lines unless they are protected by insulated conductors.



8. Treat bare wire communication conductors on power poles and structures as energized lines (with voltages in excess of 600 volts) unless the conductors are protected by insulating materials.
9. Do not remove any ground until all employees are clear of the temporary grounded lines or equipment.
10. After a capacitor has been disconnected from its source of supply, wait five minutes before short-circuiting and grounding it.
11. Do not contact the terminals, jumpers, or line wires connected directly to capacitors until the capacitors have been short-circuited and/or grounded.
12. Visually inspect and wipe down all hot line tools each day before use.
13. Do not wear rubber gloves with protectors while using hot line tools.
14. Do not use defective hot line tools. Mark them as defective and turn them in for repair or replacement.

#### Stringing/Removing Deenergized Conductors

1. Keep conductors that are being strung in or removed under positive control to prevent accidental contact with energized circuits.
2. Do not exceed the load rating for stringing lines, pulling lines, sock connections or load-bearing hardware and accessories.
3. Do not use defective pulling lines or defective accessories. Mark the defective items and turn them in for repair or replacement.
4. Do not use conductor grips on wire ropes unless the grips are designed for that particular purpose.
5. If an existing line that crosses over a conductor is to be deenergized, ground the line on both sides of the crossing or treat the conductor being crossed as energized.

#### Bus/Bus Room Safety

1. Do not enter or work in the bus room alone.
2. Do not leave the bus room doors open.
3. Do not carry any tools or materials above your waist while in the bus room.
4. Do not work on any bus, bus structure, cable, or disconnect switch unless it is grounded.

#### General Electrical Device/Fixture Installation Safety

1. Assume all electrical wires as live wires.
2. Turn the main switch to "Off" before removing and replacing power fuses.
3. Do not wear watches, rings or other metallic objects that could act as conductors of electricity around electrical circuits.
4. Before leaving the job, test insulators, and equipment to ensure they are free from defects.
5. Do not work near any circuit that is in service without first installing barricades approved by your supervisor.
6. Do not touch field brushes or a synchronous motor until the motor is up to synchronous speed and the field switch is closed.

### **PAINTING PERSONNEL**

#### Painting Safety

1. Store rags that have oil or paint on them in closed metal containers labeled "oily rags".
2. Press the pressure relief valve on painting canisters and painting guns prior to disconnecting them.
3. Do not store food or eat where spray painting is being performed.
4. Close the lids of containers of paint and thinner tightly after each use or when not being used.

## **PLUMBERS**

### **General Installation Rules & Guidelines**

1. Do not begin working until barricades, warning signs or other protective devices have been installed to isolate the work area from local traffic.
2. Do not walk under partially demolished walls or floors.
3. Stop working outdoors and seek shelter during lightning storms.
4. When working outside, keep shirts on to avoid dehydration and sunburn.
5. Drink plenty of clear liquids during your breaks.
6. If you discover a wasp nest or bee hive while installing or servicing equipment, use the long distance aerosol insecticide labeled "Wasp and Bee Insecticide" to spray the nest. Test with the stick or pole once again to ensure that all bees/wasps are gone before continuing work.
7. Seek first aid immediately if bitten or stung by wasps or bees. Follow First Aid Procedures.
8. Do not handle caterpillars or other insects with your bare hands.
9. Do not use a metal ladder within 50 feet of electrical power lines.
10. Do not block the walking surfaces of elevated working platforms, such as scaffolds, with tools or materials that are not being used.
11. Do not stand on sinks, toilets, or cabinets; use a stepladder.
12. Do not work on open sided floors, elevated walkways, or elevated platforms if there are no guardrails in place.
13. Do not handle hot items such as hot water heaters or water/steam lines with your bare hands; use cloth gloves.
14. Open the gate valve to release the pressure from the steam lines and turn off the boiler before servicing piping equipment.

## **ROOFING PERSONNEL**

### Housekeeping

1. Do not place materials such as tools, boxes, buckets, or trash in walkways and passageways.
2. Do not kick objects out of your pathway; pick them up or push them out of the way.
3. Do not throw matches, cigarettes or other smoking materials into trash bins.
4. Do not store or leave items on stairways.
5. Do not block or obstruct stairwells, exits, or accesses to safety and emergency equipment such as fire extinguishers or fire alarms.
6. Do not leave loose tools, lunch boxes or other items on rooftop. Return tools to their storage places after use.
7. Keep walking surfaces of elevated working platforms, such as scaffolds and equipment access pads on roofs, clear of tools and materials that are not being used.
8. Remove protruding nails or bend them down into the lumber by using a claw hammer.
9. Do not use gasoline for cleaning purposes.
10. Sweep up scraps and debris from around equipment such as drill presses, punches, or power shears by using a broom and a dustpan.
11. Do not drop debris through roof top openings unless the area below has been barricaded at least 6 feet out from all edges of the opening.
12. Do not use gasoline for cleaning purposes.

### Lifting Procedures

#### General

1. Plan the move before lifting; remove obstructions from your chosen pathway.
2. Test the weight of the load before lifting by pushing the load along its resting surface.
3. If the load is too heavy or bulky, use lifting and carrying aids such as hand trucks, dollies, pallet jacks, and carts or get assistance from a co-worker.

4. If assistance is required to perform a lift, coordinate and communicate your movements with those of your co-worker.
5. Never lift anything if your hands are greasy or wet.
6. Wear protective gloves approved by your supervisor when lifting objects with sharp corners or jagged edges.
7. Do not lift an object from the floor to a level above your waist in one motion. Set the load down on a table or bench and then adjust your grip before lifting it higher.

#### When Lifting

1. Position your feet 6 to 12 inches apart with one foot slightly in front of the other.
2. Face the load.
3. Bend at the knees, not at the back.
4. Keep your back straight.
5. Get a firm grip on the object with your hands and fingers. Use handles when present.
6. Perform lifting movements smoothly and gradually; do not jerk the load.
7. Hold objects as close to your body as possible.
8. If you must change direction while lifting or carrying the load, pivot your feet and turn your entire body. Do not twist at the waist.
9. Set down objects in the same manner as you picked them up, except in reverse.
10. Slide materials to the end of the tailgate before attempting to lift them off a pick-up truck. Do not lift over the walls or tailgate of the truck bed.

#### Ladder and Step Ladder Safety

1. Do not use ladders that have loose rungs, cracked or split side rails, missing rubber footpads or are otherwise visibly damaged.
2. Keep ladder rungs clean of grease. Remove buildup of material such as dirt, debris, or mud.
3. When performing work from a ladder, face the ladder and do not lean backward or sideways from the ladder.
4. Do not stand on the top two rungs of any ladder.
5. Do not stand on a ladder that wobbles or that leans to the left or right.
6. Do not try to "walk" a ladder by rocking it. Climb down the ladder, and then move it.
7. One person shall be on the ladder at a time.
8. Do not use a ladder as a horizontal platform.
10. Secure the ladder in place by having another employee hold it.
12. Face the ladder when climbing up or down.
13. Maintain a three-point contact by keeping both hands and one foot or both feet and one hand on the ladder at all times when climbing up or down.
14. Do not carry items in your hands while climbing up or down a ladder.
15. Read and follow the manufacturer's instructions label affixed to the ladder if you are unsure how to use the ladder.
16. Do not use a metal ladder on rooftops or within 50 feet of electrical power lines.
17. Do not jump from rooftops, chimneystacks, or ladders.
18. Do not use scrap lumber, bundles of shingles, or any other types of makeshift stacks or bundles of building materials as improvised climbing devices.

#### Personal Protective Equipment

1. Do not drill holes in or paint your hard hat.
2. Do not wear hard hats that are dented or cracked.
3. Wear the chemical goggles when using, applying, or handling chemical liquids or powders from containers labeled "Caustic" or "Corrosive."

4. Do not continue to work if your safety glasses become fogged. Stop work and clean the glasses until the lenses are clear and defogged.
5. Wear your earplugs or earmuffs in areas posted "Hearing Protection Required."
6. When handling hot tar, wear clothing made of cotton or non-synthetic fibers. Wear long sleeve shirts, long pants, and gloves.
7. Use lifelines, safety harnesses, or lanyards when you are working higher than 6 feet off the ground.
8. Wear safety goggles while reaming, drilling, welding or cutting metal.
9. Wear leatherwork gloves when handling rough, sharp-edged, or abrasive material such as chains, cables ropes, or slings. Wear snug fitting gloves with cuffs that will extend up under the buttoned shirtsleeves.
10. Wear laced high-top work boots at all times except when working on roofs steeper than 4:12 or when applying special roofing materials that require other types of shoes.
11. Wear your hard hats at all times when someone is working above you.
12. Wear safety goggles when tearing off roofs, when using power tools or when installing coal tar pitch roofing material.
13. Use face cream when working with coal tar pitch.
14. Do not take work clothes home when exposed to coal tar pitch volatiles.
15. Change your work clothes before leaving the job site.
16. Place work clothes contaminated with coal tar pitch volatiles in a closed labeled container approved by your employer.

#### When Respirators are Provided

1. Shave daily to prevent facial hair from interfering with the face seal of the respirator.
2. Do not wear contact lenses when wearing a respirator.
3. Clean and return respirators to their carrying cases or cartons and store them in your locker or in a designated storage area as instructed by your employer when the work is completed.
4. Only use the respirator that has been fitted and issued to you.
5. Use your respirator when working with coal tar pitch.

#### Infection Control

1. Wash your hands after removing your gloves with soap or mild detergent and water before eating, smoking, using the toilet, or any areas of the body that may have contacted these volatiles at the end of each workday.
2. Use a mechanic's cream hand cleaner such as "Go-Jo" or "Humus" where water is not readily available.

#### Scaffolding

1. Follow the manufacturer's instructions when erecting the scaffold.
2. Do not work on scaffolds outside during stormy or windy weather.
3. Do not climb on scaffolds that wobble or lean to one side.
4. Initially inspect the scaffold prior to mounting it. Do not use a scaffold if any pulley, block, hook, or fitting is visibly worn, cracked, rusted, or otherwise damaged. Do not use a scaffold if any rope is frayed, torn, or visibly damaged.
5. Do not use any scaffold tagged "Out of Service."
6. Do not use unstable objects such as bundles of shingles, steel drums or cans, crates, loose brick or concrete blocks to support scaffolds or planks.
7. Do not work on platforms or scaffolds unless they are fully planked.
8. Do not use a scaffold unless guardrails and all flooring are in place.
9. Do not use strips of felt or any building material as a makeshift guardrail. Utilize guardrail system as outlined per manufacturers' instructions.

10. Level the scaffold after each move. Do not extend adjusting leg screws more than 12 inches.
11. Do not walk or work beneath a scaffold unless a wire mesh has been installed between the midrail and the toe board or planking.
12. Use your safety belts and lanyards when working on scaffolding at a height of 10 feet or more above ground level. Attach the lanyard to a secure member of the scaffold.
12. Do not climb the cross braces for access to the scaffold. Use the ladder.
13. Do not jump from, to or between scaffolding.
14. Do not slide down cables, ropes or guys used for bracing.
15. Keep both feet on the decking. Do not sit or climb on the guardrails.
16. Do not lean out from the scaffold. Do not rock the scaffold.
17. Keep the scaffold free of roofing material scraps, loose tools, and other obstructions.
18. Do not throw anything "overboard" unless a spotter is available. Use the debris chutes or lower things by hoist or by hand.
19. Do not move a mobile scaffold if anyone is on the scaffold.
20. Prior to using a rolling scaffold, chock the wheels with wheel blocks and lock them by using your foot to depress the wheel lock.

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

1. Do not use chain slings if links are cracked, twisted, stretched, or bent.
2. Fabricate all wire in wire rope slings by using thimbles; do not form eyes by using wire clips or knots.
3. Do not shorten slings by using makeshift devices such as knots or bolts.
4. Do not use a kinked chain.
5. Protect slings from the sharp edges of their loads by placing pads over the sharp edges of the items that have been loaded.
6. Do not place your hands between the sling and its load when the sling is being tightened around the load.
7. Wear work gloves when handling rough, sharp-edged, or abrasive material such as chains, cables, ropes, or slings.
8. 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.
9. Lift the load from the center of the hooks, not from the point.
10. Do not use a ground-operated hoist in which the safety latch on the hook has been removed, is bent, or is otherwise visibly damaged.

#### Forklift Safety

##### General

1. Only authorized and trained personnel are allowed to operate the forklifts.
2. Apply the foot brake and shift gears to neutral before turning the key.
3. Do not use bare forks as a man-lift platform.
4. Steer the forklift wide when making turns.
5. Sound the forklift horn when approaching blind corners, doorways, or aisles to alert other operators and pedestrians.

##### Lifting

1. Do not exceed the lift capacity of the forklift. Read the lift capacity plate on the forklift if you are unsure.
2. Follow the manufacturer's guidelines concerning changes in the lift capacity before adding an attachment to a forklift.
3. Lift the load an inch or two to test for stability; if the rear wheels are not in firm contact with the floor, take a lighter load or use a forklift that has a higher lift capacity.

4. Do not raise or lower a load while you are enroot. Wait until you are in the loading area and have stopped before raising or lowering the load.
5. After picking up a load, adjust the forks so that the load is tilted slightly backward for added stability.
6. Raise the forks an additional two inches to avoid hitting or scraping the ramp surface as you approach the ramp.
7. Do not drive the forklift while people are on the attached man-lift platform.
8. Drive unloaded forklifts in reverse when going up a ramp and forward when going down a ramp.
9. Drive a loaded forklift in a forward gear when going up a ramp. Upon approaching the ramp, raise the forks an additional two inches to avoid hitting or scraping the ramp surface.
10. Do not attempt to turn the forklift around on a ramp.
11. Do not use a gear for the opposite direction of travel as a means to slow down or stop the forklift.
12. Lower the mast completely, turn the engine off, and set the parking brake before leaving your forklift.

### Specific Operations

#### Picking up a Load

1. "Square up" on the center of the load and approach it straight on with the forks in the travel position.
2. Stop when the tips of your forks are about a foot from the load.
3. Level the forks and slowly drive forward until the load is resting against the backrest of the mast.
4. Lift the load high enough to clear whatever is under it.
5. Back up about one foot, and then slowly and evenly tilt the mast backwards to stabilize the load.

#### Putting a Load Down

1. "Square up" and stop about one foot from the desired location.
2. Level the forks and drive to the loading spot.
3. Slowly lower the load to the floor.
4. Tilt the forks slightly forward so that you do not hook the load.
5. When the path behind you is clear of obstructions, back straight out until the forks have cleared the pallet.

### Stacking One Load on Top of Another

1. Stop about one foot away from the loading area and lift the mast high enough to clear the top of the stack.
2. Slowly move forward until the load is squarely over the top of the stack.
3. Level the forks and lower the mast until the forks no longer support the load.
4. Look over both shoulders for obstructions and back straight out if the path is clear.

### Job Site Safety

1. Do not walk under partially demolished walls or floors.
2. Stop working outdoors and seek shelter during lightning storms.
3. Do not begin working until barricades, warning signs or other protective devices have been installed to isolate the work area.
4. Do not throw or toss debris outside barricaded areas.
5. Walk around or step over holes, rocks, and roots in your pathway.

6. Stay clear of all trucks, forklifts, cranes, and other heavy equipment when in operation.
7. Do not approach any heavy equipment until the operator has seen you and has signaled to you that it is safe to approach.
8. Walk around or duck under protruding branches and limbs.
9. Do not walk on fallen trees; walk on the ground.
10. Do not clear brush by hand within 100 ft. of heavy equipment operations.
11. Keep combustible liquids stored and covered in approved containers.

#### Vehicular Safety (trucks and all terrain vehicles).

##### General

1. Drive on the graded roadways that have been leveled for this purpose.
2. Turn on low-beam headlights when driving on the site.
3. Drive up the slope or down the slope, not across the slope.
4. Hold onto vehicle when stepping out of it onto loose ground, holes, or rocks.
5. Tools and materials shall be secured to prevent movement when transported in the same compartment with employees.
6. Do not exceed the maximum number of people for which the vehicle is designed to transport.
7. Do not operate a loaded vehicle or load it, by means of cranes, power shovels, loaders, or similar equipment, if the vehicle does not have a cab shield and/or canopy to protect you from shifting or falling materials.
8. Do not carry extra fuel on any vehicle except in a properly mounted fuel tank approved by your employer.

##### Fueling Vehicles

1. Turn the vehicle off before fueling.
2. Do not smoke while fueling a vehicle.
3. Wash hands with soap and water if you spill gasoline on them.

##### Driving Rules

1. Shut all doors and fasten your seat belt before moving the vehicle.
2. Obey all traffic patterns and signs at all times.
3. Maintain a three point contact using both hands and one foot or both feet and one hand when climbing into and out of vehicles.
4. Drive up the slope or down the slope not across the slope.

##### Trailer Safety

1. Set the parking brake in the towing vehicle and use wheel blocks to chock the wheels of the trailer before removing the kettle from the trailer.
2. Permit no one to ride in the trailer.
3. Use ramps to load and unload kettles and equipment from the trailer.
4. Take slow, wide turns when towing trailers.
5. Do not exceed the load capacity as posted on the trailer door of the trailer.
6. Do not place all the heavy equipment on one side of the trailer.
7. Secure equipment and fuel tanks to the vehicle with chains or straps to eliminate or minimize shifting of the load.
8. Do not mount or dismount equipment on the traffic side.

#### Hand/Power Tool Safety

##### General

1. Use tied off containers to keep tools from falling off scaffolds and other elevated work platforms.

2. Carry all sharp tools in a sheath or holster.
3. Tag worn, damaged, or defective tools "Out of Service" and do not use them.
4. Do not use a tool if its handle has splinters, burrs, cracks, splits or if the head of the tool is loose.
5. Do not use impact tools such as hammers, chisels, punches, or steel stakes that have mushroomed heads.
6. Do not carry sharp or pointed hand tools such as screwdrivers, scribes, aviation snips, scrapers, chisels or files in your pocket unless the tool or your pocket is sheathed.
7. Do not perform "make-shift" repairs to tools.
8. Do not use "cheaters" on load binders or "boomers."
9. Do not carry tools in your hand when you are climbing. Carry tools in tool belts or hoist the tools to the work area using a hand line.
10. Do not throw tools from one location to another, from one employee to another or from scaffolds or other elevated platforms.
11. Only transport hand tools in toolboxes or tool belts. Do not carry tools in your clothing.

#### Hammers

1. Use a claw hammer for pulling nails.
2. Do not strike nails or other objects with the "cheek" of the hammer.
3. Do not strike a hardened steel surface, such as a cold chisel, with a claw hammer.
4. Do not strike one hammer against another hammer.
5. Do not use a hammer if your hands are oily, greasy, or wet.
6. Do not use a hammer as a wedge, a pry bar or for pulling large spikes.

#### Snips

1. Wear safety glasses or safety goggles when using snips to cut materials.
2. Wear work gloves when cutting materials with snips.
3. Do not use straight cut snips to cut curves.
4. Keep the blade aligned by tightening the nut and bolt on the snips.
5. Do not use snips as a hammer, screwdriver, or pry bar.
6. Engage the locking clip on the snips after use.

#### Screwdrivers

1. Always match the size and type of screwdriver blade to fit the head of the screw.
2. Do not hold the work piece against your body while using a screwdriver.
3. Do not put your fingers near the blade of the screwdriver when tightening a screw.
4. Use an awl, drill or a nail to make a starting hole for screws.
5. Do not force a screwdriver by using a hammer or pliers on it.
6. Do not use a screwdriver as a punch, chisel, pry bar or nail puller.
7. Do not carry a screwdriver in your pocket.
8. Do not use a screwdriver if your hands are wet, oily, or greasy.
9. When using a spiral ratchet screwdriver, push down firmly and slowly.

#### Powder Actuated Tools

1. Wear impact resistant safety goggles or face shields when operating any powder actuated tools.
2. Do not attempt to fasten through a pre-drilled hole unless the powder actuated tool has a hole locator.
3. Keep your head and body behind the powder-actuated tool when firing it.
4. Before using powder actuated tools do not alter, bypass or remove the shield or guard at the muzzle end of the powder-actuated tool.



5. Do not load a powder-actuated tool until you are ready to fire it.

#### Hydraulic/Pneumatic Tools

1. Do not point a compressed air hose at bystanders or use it to clean your clothing.
2. Lock and/or tag tools "Out of Service" to prevent usage of the tool.
3. Do not use tools that have handles with burrs or cracks.
4. Do not use compressors if their belt guards are missing. Replace belt guards before use.
5. Turn the tool "off" and let it come to a complete stop before leaving it unattended.
6. Disconnect the tool from the airline before making any adjustments or repairs to the tool.

#### Heat Exhaustion/Sun Exposure

- Keep shirts on to avoid dehydration and sunburn.

#### Knives/Sharp Instruments

1. When handling knife blades and other cutting tools, direct sharp points and edges away from you.
2. Cut in the direction away from your body when using knives.
3. Use the knife that has been sharpened; do not use knives that have dull blades.
4. Use knives for the operations for which they are made.
5. Do not use knives that have broken or loose handles.
6. Do not use knives as screwdrivers, pry bars, or can openers.
7. Do not pick up knives by their blades.
8. Carry knives with their tips pointed towards the ground.
9. Do not carry knives, scissors or other sharp tools in your pockets or an apron unless they are first placed in their sheath or holder.
10. Do not attempt to catch a falling knife.
11. Store knives in knife blocks or in sheaths after using them.

#### Electrical Safety

1. Do not use power equipment or tools on which you have not been trained.
2. Keep power cords away from the path of drills, metal shears, power presses, grinders, and other tools or equipment that can splice or cut the power cord.
3. Do not use cords that have splices, exposed wires, or cracked or frayed ends.
4. Do not carry plugged in equipment or tools with your finger on the switch.
5. Do not carry equipment or tools by the cord.
6. Disconnect the tool from the outlet by pulling on the plug, not the cord.
7. Turn the tool off before plugging or unplugging it.
8. Do not leave tools that are "On" unattended.
9. Do not handle or operate electrical tools when your hands are wet or when you are standing on wet floors.
10. Do not operate spark inducing tools such as grinders, drills, or saws near containers labeled "Flammable" or in an explosive atmosphere such as a paint spray booth.
11. Turn off the electrical tool and unplug it from the outlet before attempting repairs or service work. Tag the tool "Out of Service."
12. Do not use extension cords or other three pronged power cords that have a missing prong.
13. Do not use an adapter such as a cheater plug that eliminates the ground.
14. Do not plug multiple electrical cords into a single outlet.
15. Do not run extension cords through doorways, through holes in ceilings, walls, or floors.
16. Do not stand in water or on wet surfaces when operating power hand tools or portable electrical appliances.
17. Do not use a power hand tool to cut wet or water soaked building materials.

18. Do not use a power hand tool while wearing wet cotton gloves or wet leather gloves.
19. Never operate electrical equipment barefooted. Wear rubber-soled or insulated work boots.
20. Do not operate a power hand tool or portable appliance that has a frayed, worn, cut, improperly spliced, or damaged power cord.
21. Do not operate a power hand tool or portable appliance if a prong from the three-pronged power plug is missing or has been removed.
22. Do not operate a power hand tool or portable appliance that has a two-pronged adapter or a two-conductor extension cord.
23. Do not operate a power hand tool or portable appliance while holding a part of the metal casing or while holding the extension cord in your hand. Hold all portable power tools by the plastic handgrips or other nonconductive areas designed for gripping purposes.

#### Hazardous Materials

##### When Using Chemicals to Seal Metals

1. Wear protective gloves when handling chemicals from containers labeled "Flammable," "Toxic," "Caustic" or "Poisonous" and wash your hands after removing the gloves.
2. Follow the instructions on the label and in the corresponding Material Safety Data Sheet (MSDS) for each chemical product used in your workplace.
3. Each time you use your gloves, wash your gloves before removing them using cold tap water and normal hand washing motion. Always wash your hands after removing the gloves.
4. Do not use chemicals from unlabeled containers and unmarked cylinders.
5. Do not perform "hot work" such as welding, metal grinding, or other spark producing operations within 50 feet of containers labeled "Flammable" or "Combustible."
6. Do not drag containers labeled "Flammable."
7. Do not store chemical containers labeled "Oxidizer" with containers labeled "Corrosive" or "Caustic."
8. Always use chemical goggles and a face shield before handling chemicals labeled "Corrosive" or "Caustic."

##### Power Hoist Safety

1. Use manufacturer approved counter weights to secure the hoist. Do not use roofing materials such as rolls of felt or bundles of shingles,
2. Do not exceed the manufacturer's recommended load capacity limits.
3. Only trained personnel, approved by the employer, are allowed to operate a power hoist.
4. Use the power hoist in an area that permits the operator to stand clear of the load at all times.
5. Use safety hooks or shackles to attach the load whenever possible.
6. Use 'tag lines' to control the load when necessary.
7. Keep your fingers and clothing clear of hoist machinery.
8. Do not attempt adjustments while the hoist is running.

##### Portable Welding Equipment

1. Wear a welding helmet or welding goggles during welding operations.
2. Do not use personal or employee-owned power tools and portable appliance while at work.
3. Do not perform welding tasks while wearing wet cotton gloves or wet leather gloves.
4. Insulated work gloves are required for all welders when using welding equipment.
5. Do not use welding apparatus if power plug is cut, frayed, split or otherwise visibly damaged or modified.
6. When replacing power plugs and cords of welding apparatus, always check to ensure that the ground wire is connected and the power plug prongs are not worn off, allowing the plug to be inserted backward.

## Compressed Gas Cylinders

### Storage and Handling

1. Do not handle oxygen cylinders if your gloves are greasy or oily.
2. Store all cylinders in the upright position.
3. Place valve protection caps on gas cylinders that are in storage or not in use.
4. Do not lift cylinders by the valve protection cap.
5. Do not store compressed gas cylinders in areas where they can come in contact with chemicals labeled "Corrosive."
6. Place cylinders on a cradle, sling board, pallet or cylinder basket to hoist them.
7. Do not place cylinders against electrical panels or live electrical cords where the cylinder can become part of the circuit.
8. Do not use a flame to check for propane cylinder leak, use a leak or monitor detector.

### Use of Cylinders

1. Do not use dented, cracked, or other visually damaged cylinders.
2. Use only an open ended or adjustable wrench when connecting or disconnecting regulators and fittings.
3. Do not transport cylinders without first removing regulators and replacing the valve protection caps.
4. Close the cylinder valve when work is finished, when the cylinder is empty or at any time, the cylinder is moved.
5. Do not store oxygen cylinders near fuel gas cylinders such as propane or acetylene or near combustible material such as oil or grease.
6. Stand to the side of the regulator when opening the valve.
7. If a cylinder is leaking around a valve or a fuse plug, move it to an outside area away from where work is performed and tag it to indicate the defect.
8. Do not hoist or transport cylinders by means of magnets or choker slings.
9. Do not use compressed gas to clean the work area, equipment, or yourself.
10. Do not remove the valve wrench from acetylene cylinders while the cylinder is in use.
11. Open compressed gas cylinder valves slowly. Open fully when in use to eliminate possible leakage around the cylinder valve stem.
12. Purge oxygen valves, regulators, and lines before use.

### Torch on Applications

1. "Blow Out" hoses before attaching the torch.
2. Inspect hoses and torches before use. Replace damaged, burned, worn, or leaking parts.
3. Use a pressure gauge on every regulator. Do not use an adjustable regulator with a higher-pressure range than the original regulator that came with the torch.
4. Never face the gauge while opening the cylinder valve.
5. Before lighting a torch, purge the hose, adjust the working pressures, then use a friction lighter to ignite the gases. Do not use matches or a cigarette lighter.
6. Do not use oil, grease or other lubricants on the regulator.
7. When shutting off the torch, close the gas cylinder valve first and let the remaining gas burn out of the hose before closing off the torch valve.
8. Never overfill a gas cylinder. It could explode.
9. Use only hoses listed for liquid petroleum (LP) gas.
10. Use soap solution to test for gas leaks before lighting.
11. Visually check and ensure that the flow of gas through the regulator is flowing in the proper direction. Directional flow is stamped on the regulator.
12. To keep 'frosting' from occurring, increase the size of the bottle or cylinder.
13. Secure propane tanks in an upright position and place them at least 10 feet from the open flame.

14. Keep non-applicators at least 10 feet from the flame.
15. Keep vent in pressure regulator clear at all times.
16. When shutting off the torch, close the propane cylinder valve first and let the remaining gas burn out of the hose.
17. Do not leave a lighted torch unattended.
18. Do not heat a cylinder to increase pressure.
19. Place a fire extinguisher near you, but away from the torch and other parts of LP gas equipment, when performing torch on operations.
20. Do not lay an operating torch over the edge of a roof.
21. Do not use a trowel as a torch stand.
22. Do not lay an operating torch to rest on a gas cylinder. If there is a gas leak in the cylinder area, there could be a fire.

#### Coal Tar/Asphalt Applications

1. Do not smoke or eat while performing tar-roofing work.
2. Stand clear of hot asphalt when it is being dumped out of the kettle.
3. Do not stand, work, or operate equipment such as felt laying machines or mechanical moppers within three feet of any unprotected roof opening or within five feet of any unprotected roof edge.

#### Single-Ply Roofing

- Wear respirators when hot air welding PVC or when performing adhesive welding procedures.

#### Conveyors

1. Do not climb on conveyor equipment.
2. Do not ride on any conveyors.
3. When using a belt driven conveyor to load a trailer bed, the person inside the trailer shall give verbal commands to the person loading the conveyor.

#### JOB-SPECIFIC RULES

##### Roof Felt Slitter

1. Replace the guards before starting the machine, after making adjustments and after making repairs to a machine.
2. Do not remove, alter, or bypass any safety guard or device when operating the machine.
3. Read and obey safety warnings posted on the machine.
4. Do not wear loose clothing, jewelry, or neckties when operating machine.
5. Long hair must be contained under a hat or hair net, regardless of gender.
6. Do not try to stop a work piece as it goes through any machine. If the machine becomes jammed, disconnect the power before clearing the jam.
7. Report any missing machine or tool guard immediately to your supervisor.

##### Vehicle Loading

1. Plan the move before loading; ensure that you have an unobstructed pathway and that the vehicle is parked as close to the equipment or material as possible.
2. Keep bumpers/tailgates free of grease, water, etc.; remove buildup of material such as dirt, mud, etc.
3. Use lifting aids such as dollies, pallet jack, and forklift or get assistance from a co-worker to place dock plate resting between loading dock and truck surface.
4. If equipment or material that is to be loaded into truck is too heavy or bulky, use lifting aids such as hand trucks, dollies, pallet jacks and carts, or get assistance from co-workers.

5. Secure all equipment and material within the truck to eliminate or reduce movement.

#### Crane Truck or Boom Conveyor Truck

1. Only trained and employer authorized personnel are permitted to operate the crane truck or boom conveyor.
2. Park on firm level surface, place the vehicle in neutral, and apply the emergency brake.
3. If the truck is equipped with an audible back up warning device, engage the alarm before backing into a location.
4. If the truck is equipped with mechanical, hydraulic, or pneumatic jacks, braces or stabilizers engage such, prior to engaging the swing conveyor.
5. Do not engage the swing conveyor if there are overhead obstructions in the way. Allow sufficient distance for wind gust that would cause the conveyor to contact power lines.
6. Never climb the conveyor to gain access to the roof, use a ladder.
7. Do not load supplies onto a roof if there are unguarded openings such as skylights.

#### KETTLEMEN

##### General

1. Do not leave kettles or tankers unattended while they are being fired.
2. Take breaks in shaded areas.
3. Do not smoke or eat while performing asphalt work.
4. Stand clear of hot asphalt when it is being dumped out of the kettle.
5. Do not place a pumper or agitator into kettles or tankers.

##### Personal Protective Equipment

1. Wear face shields when loading and withdrawing hot liquid asphalt from a kettle or tanker.
2. Wear your personal protective equipment such as goggles, gloves, and respiratory protection when operating the kettle.
3. Do not wear contact lenses when operating the kettle.

##### Job Site Safety

1. Do not walk under partially demolished walls or floors.
2. Stop working outdoors and seek shelter during lightning storms.
3. Do not begin working until barricades, warning signs or other protective devices have been installed to isolate the work area.
4. Do not throw or toss roofing scraps such as shingles, rubber roofing material, or any other debris outside barricaded areas.
5. Walk around or step over holes, rocks, and roots in your pathway.
6. Stay clear of all trucks, forklifts, cranes, and other heavy equipment when in operation.
7. Do not approach any heavy equipment until the operator has seen you and has signaled to you that it is safe to approach.
8. Walk around or duck under protruding branches and limbs.
9. Do not walk on fallen trees; walk on the ground.
10. Do not clear brush by hand within 100 ft. of heavy equipment operations.
11. Keep combustible liquids stored and covered in approved containers.

## **HAZARD IDENTIFICATION AND ASSESSMENT**

To assist in the identification and correction of hazards, the company has developed the following procedures. These procedures are representative only and are not exhaustive of all the measures and methods that will be implemented to guard against injury from recognized and potential hazards in the workplace. As new hazards are identified or improved work procedures developed, they will be promptly incorporated into our Safety Manual. The following methods will be utilized to identify hazards in the workplace:

- Loss analysis of accident trends
- Accident investigation
- Employee observation
- Employee suggestions
- Regulatory requirements for our industry
- Outside agencies such as the fire department and insurance carriers
- Periodic safety inspections

### Loss Analysis

Periodic loss analyses will be conducted by the safety program administrator. These will help identify areas of concern and potential job hazards. The results of these analyses will be communicated to management, supervision, and employees through safety meetings and other appropriate means.

### Accident Investigations

All accidents and injuries will be investigated in accordance with the guidelines contained in this program. Accident investigations will focus on all causal factors and corrective action including the identification and correction of hazards that may have contributed to the accident.

### Employee Observation

Superintendents and foremen shall be continually observing employees for unsafe actions and taking corrective action as necessary.

### Employee Suggestions

Employees are encouraged to report any hazard they observe to their supervisor. No employee is to ever be disciplined or discharged for reporting any workplace hazard or unsafe condition. However, employees who do NOT report potential hazards or unsafe conditions that they are aware of will be subject to disciplinary action.

### Regulatory Requirements

All industries are subject to government regulations relating to safety. Many of these regulations are specific to our type of business. Copies of pertinent regulations can be obtained from the Safety Program Administrator.

## Outside Agencies

Several organizations may assist us in identifying hazards in our workplace. These include safety officers from other contractors, insurance carrier safety and health consultants, private industry consultants, the fire department, and State OSH Consultants.

## *Periodic Safety Inspections*

Periodic safety inspections ensure that physical and mechanical hazards are under control and identify situations that may become potentially hazardous. Inspections shall include a review of the work habits of employees in all work areas. These inspections will be conducted by the Supervisor, Manager, Program Administrator or other designated individual.

Periodic safety inspections will be conducted:

- When new substances, process, procedures or equipment are used.
- When new or previously unrecognized hazards are identified.
- Periodically by the Supervisor.
- Periodically by the Safety Program Administrator.

These inspections will focus on both unsafe employee actions as well as unsafe conditions. The following is a partial list of items to be checked.

- The proper use, condition, maintenance and grounding of all electrically operated equipment.
- The proper use, condition, and maintenance of safeguards for all power-driven equipment.
- Compliance with the Code of Safe Practices.
- Housekeeping and personal protective equipment.
- Hazardous materials.
- Proper material storage.
- Provision of first aid equipment and emergency medical services.

Any and all hazards identified will be corrected as soon as practical in accordance with the company hazard correction policy.

If imminent or life threatening hazards are identified, which cannot be immediately corrected, all employees must be removed from the area, except those with special training required to correct the hazard, who will be provided necessary safeguards.

## *Documentation of Inspections*

Safety inspections will be documented to include the following:

- Date on which the inspection was performed.
- The name and title of person who performed the inspection.
- Any hazardous conditions noted or discovered and the steps or procedures taken to correct them.
- Signature of the person who performed the inspection.

One copy of the completed form should be sent to the office. All reports shall be kept on file for a minimum of two (2) years.

## **HAZARD PREVENTION, CORRECTION, AND CONTROL**

The following procedures will be used to evaluate, prioritize and correct identified safety hazards. Hazards will be corrected in order of priority: the most serious hazards will be corrected first.

### Hazard Evaluation

Factors that will be considered when evaluating hazards include:

- Potential severity - The potential for serious injury, illness or fatality
- Likelihood of exposure - The probability of the employee coming into contact with the hazard
- Frequency of exposure - How often employees come into contact with the hazard
- Number of employees exposed
- Possible corrective actions - What can be done to minimize or eliminate the hazard
- Time necessary to correct - The time necessary to minimize or eliminate the hazard

### *Techniques for Correcting Hazards*

1. Engineering Controls: Could include machine guarding, ventilation, noise reduction at the source, and provision of material handling equipment. These are the first and preferred methods of control.
2. Administrative Controls: The next most desirable method would include rotation of employees or limiting exposure time.
3. Personal Protective Equipment: Includes back support belts, hearing protection, respirators and safety glasses. These are often the least effective controls for hazards and should be relied upon only when other controls are impractical.

### *Documentation of Corrective Action*

All corrective action taken to mitigate hazards should be documented. Depending on the circumstances, one of the following forms should be used:

- Safety Contact Report
- Safety Meeting Report
- Memo or letter
- Safety inspection form

All hazards noted on safety inspections will be rechecked on each subsequent inspection and notations made as to their status.



Hazardous Materials and Chemicals  
**HAZARD COMMUNICATION PROGRAM**

Introduction

It is company policy that the first consideration of work shall be the protection of the safety and health of all employees. We have developed this Hazard Communication Program to ensure that all employees receive adequate information about the possible hazards that may result from the various materials used in our operations. This Hazard Communication Program will be monitored by the Safety Program Administrator who will be responsible for ensuring that all facets of the program are carried out, and that the program is effective.

Our program consists of the following elements:

1. Hazardous material inventory.
2. Collection and maintenance of Material Safety Data Sheets.
3. Container labeling.
4. Employee training.

The following items are not required to be included in the program and are therefore omitted:

- Foods, drugs, cosmetics or tobacco.
- Untreated wood products.
- Hazardous waste.
- Consumer products packaged for sale to and use by the general public, provided that our exposure is not significantly greater than typical consumer exposure.

Hazardous Material Inventory

The Safety Program Administrator maintains a list of all hazardous materials used in our operations. This list contains the name of the product, the type of product (solvent, adhesive etc.) and the name and address of the manufacturer.

Material Safety Data Sheets (MSDS)

Copies of MSDS for all hazardous substances to which our employees may be exposed will be kept in a binder at the main office. These MSDS are available to all employees, at all times, upon request. Copies of the most commonly used products will also be kept by the Supervisor at the work site.

The Safety Program Administrator will be responsible for reviewing incoming MSDS for new and significant health/safety information. They will ensure that any new information is passed on to the affected employees.

The Safety Program Administrator will also review all incoming MSDS for completeness. If an MSDS is missing or obviously incomplete, a new MSDS will be requested from the manufacturer. Federal or State (if applicable) OSHA will be notified if a complete MSDS is not received and the manufacturer will not supply one.

New materials will not be introduced into the shop or field until a MSDS has been received. The purchasing department will make it an ongoing part of their function to obtain MSDS for all new materials when they are first ordered.

### Container Labeling

No container of hazardous substances will be used unless the container is correctly labeled and the label is legible.

All chemicals in cans, bags, drums, pails, etc., will be checked by the receiving department to ensure the manufacturer's label is intact, is legible, and has not been damaged in any manner during shipment. Any containers found to have damaged labels will be held until a new label has been installed. New labels will be obtained from the manufacturer.

The label must contain:

- The chemical name of the contents.
- The appropriate hazard warnings.
- The name and address of the manufacturer.

All secondary containers will be labeled as to their contents with a reference to the original label.

### Employee Information and Training

All employees will be provided information and training on the following items through the company safety training program and prior to starting work with hazardous substances:

1. An overview of the requirements of the Hazard Communication Standard, including their rights under this regulation.
2. Information regarding the use of hazardous substances in their specific work areas.
3. The location and availability of the written hazard communication program. The program will be available from the Supervisor and Safety Program Administrator.
4. The physical and health hazards of the hazardous substances in use.
5. Methods and observation techniques used to determine the presence or release of hazardous substances in the work area.
6. The controls, work practices and personal protective equipment available for protection against possible exposure.
7. Emergency and first aid procedures to follow if employees are exposed to hazardous substances.
8. How to read labels and material safety data sheets to obtain the appropriate hazard information.

### Hazardous Non-Routine Tasks

Infrequently, employees may be required to perform hazardous non-routine tasks. Prior to starting this work, each involved employee will be given information by his/her supervisor about hazards to which they may be exposed during such activity.

This information will include:

- The specific hazards.
- Protective/safety measures which must be utilized.
- The measures the company has taken to lessen the hazards, including special ventilation, respirators, the presence of another employee, emergency procedures, etc.

#### Informing Outside Contractors and Vendors

To ensure that outside contractors are not exposed to our hazardous materials, and to ensure the safety of the contractor's employees, it will be the responsibility of the Supervisor to provide outside contractors the following information:

- The hazardous substances under our control that they may be exposed to while at the work site.
- The precautions the contractor's employees must take to lessen the possibility of exposure.

We will obtain from outside contractors and vendors the name of any hazardous substances the contractor's employees may be using at a work site or bringing into our facility. The contractor must also supply a copy of the material safety data sheet relevant to these materials.

#### Employee Rights Under The Hazard Communication Standard

At any time, an employee has the right to:

- Access the MSDS folder, and the Hazard Communication Program.
- Receive a copy of any environmental sampling data collected in the workplace.
- See their employment medical records upon request.

### **FIRST AID AND MEDICAL EMERGENCY PROCEDURES**

The company will ensure the availability of emergency medical services for its employees at all times. We will also ensure the availability of a suitable number of appropriately trained persons to render first aid. The Safety Program Administrator will maintain a list of trained individuals and take steps to provide training for those that desire it.

#### First-Aid Kits

Every work site shall have access to at least one first-aid kit in a weatherproof container. The first-aid kit will be inspected regularly to ensure that it is well stocked, in sanitary condition, and any used items are promptly replaced. The contents of the first-aid kit shall be arranged to be quickly found and remain sanitary. First-aid dressings shall be sterile and in individually sealed packages.

Drugs, antiseptics, eye irrigation solutions, inhalants, medicines, or proprietary preparations shall not be included in first-aid kits unless specifically approved, in writing, by an employer-authorized, licensed physician. Other supplies and equipment, if provided, shall be in accordance with the documented recommendations of an employer-authorized licensed physician upon consideration of the extent and type of emergency care to be given based upon the anticipated incidence and nature of injuries and illnesses and availability of transportation to medical care.

### First Aid

The designated first aid person on each site will be available at all times to render appropriate first aid for injuries and illnesses. Proper equipment for the prompt transportation of the injured or ill person to a physician or hospital where emergency care is provided, or an effective communication system for contacting hospitals or other emergency medical facilities, physicians, ambulance and fire services, shall also be provided. The telephone numbers of the following emergency services in the area shall be posted near the job telephone, or otherwise made available to the employees where no job site telephone exists:

1. A company authorized physician or medical clinic, and at least one alternate if available.
2. Hospitals.
3. Ambulance services.
4. Fire-protection services.

Prior to the commencement of work at any site, the Supervisor or Manager shall locate the nearest preferred medical facility and establish that transportation or communication methods are available in the event of an employee injury.

Each employee shall be informed of the procedures to follow in case of injury or illness through our new employee orientation program, Code of Safe Practices, and safety meetings.

Where the eyes or body of any person may be exposed to injurious or corrosive materials, suitable facilities for drenching the body or flushing the eyes with clean water shall be conspicuously and readily accessible.

### CPR & First Aid

Talisen Construction Corporation First Aid and CPR program is based on hazard assessments and industry knowledge of potential risks to employee safety. Only recognized training curriculums will be used to train our workforce in the areas of First Aid and CPR. Outside training entities may be used to ensure compliance and to supplement training needs. All employees are required to adhere to the training limitations set forth by the training elements and to ensure their own personal safety while performing any such actions. Outsourced training providers will be vetted and approved by the Safety Committee prior to acceptance of certifications given. Recertification will be required annually if feasible and bi-annually as required to maintain certifications. Retraining and ongoing evaluations will be based on a per employee case study. Certification cards will be given to employees completing the required training and will be required to be carried by the employees on their person while working. Readily accessible proof of certification will be maintained and available from the program administrator in the event that the wallet cards are lost or expired. Any items removed from the kit are to be reported within 24 hours to the safety department for prompt replacement. Replacements shall be made within one business day or as fast as reasonably possible. First aid kits, cabinets and

storage areas are to be cleaned regularly and kept in a secure, sanitary and readily assessable condition. At no time shall employees be allowed to use medications, tools or other items from the kits for any other reason than to administer medical aid to themselves or others. Some First Aid care is considered recordable by OSHA standards and therefore must be accompanied by an accident report as defined in the Talisen Construction Corporation Safety Program Manual.

### Accident Procedures

These procedures are to be followed in the event of an employee injury in the course of employment.

1. For severe accidents call 911 and request the Paramedics.
2. Employees must report all work related injuries to their Supervisor immediately. Even if they do not feel that it requires medical attention. Failure to do so may result in a delay of Workers' Compensation benefits and disciplinary action.
3. The Supervisor, employee, and first aid person, should determine whether or not outside medical attention is needed. When uncertainty exists on the part of any individual, the employee should be sent for professional medical care.
4. If medical attention is not desired or the employee refuses treatment, you must still fill out a company "Accident Report" in case complications arise later.
5. In all cases, if the employee cannot transport himself or herself for any reason, transportation should be provided.
6. In the event of a serious accident involving hospitalization for more than 24 hours, amputation, permanent disfigurement, loss of consciousness or death, phone contact should be made with the main office. Contact must also be made with the nearest Federal or State (if applicable) OSHA office.

### **ACCIDENT / EXPOSURE INVESTIGATION**

The Supervisor, Manager, or other designated individual will investigate all work-related accidents in a timely manner. This includes minor incidents and "near accidents", as well as serious injuries. An accident is defined as any unexpected occurrence that results in injury to personnel, damage to equipment, facilities, or material, or interruption of normal operations.

### Responsibility for Accident Investigation

Immediately upon being notified of an accident, the Supervisor, Manager, or other designated individual shall conduct an investigation. The purpose of the investigation is to determine the cause of the accident and corrective action to prevent future reoccurrence; not to fix blame or find fault. An unbiased approach is necessary in order to obtain objective findings.

### The Purpose of Accident Investigations:

- To prevent or decrease the likelihood of similar accidents.
- To identify and correct unsafe work practices and physical hazards. Accidents are often caused by a combination of these two factors.
- To identify training needs. This makes training more effective by focusing on factors that are most likely to cause accidents.

### What Types of Incidents Do We Investigate?

- Fatalities
- Serious injuries
- Minor injuries
- Property damage
- Near misses

### Procedures for Investigation of Accidents

Immediately upon being notified of an accident the Supervisor, Manager, or other designated individual will:

1. Visit the accident scene, as soon as possible, while facts and evidence are still fresh and before witnesses forget important details and to make sure hazardous conditions to which other employees or customers could be exposed are corrected or have been removed;
2. Provide for needed first aid or call 911 emergency for the injured employee(s).
3. If possible, interview the injured worker at the scene of the accident and verbally "walk" him or her through a re-enactment. All interviews should be conducted as privately as possible. Interview all witnesses individually and talk with anyone who has knowledge of the accident, even if they did not actually witness it.
4. Report the accident to the main office. Accidents will be reported by the office to the insurance carrier within 24 hours. All serious accidents will be reported to the carrier as soon as possible.
5. Consider taking signed statements in cases where facts are unclear or there is an element of controversy.
6. Thoroughly investigate the accident to identify all accident causes and contributing factors. Document details graphically. Use sketches, diagrams and photos as needed. Take measurements when appropriate.
7. All accidents involving death, disfigurement, amputation, loss of consciousness or hospitalization for more than 24 hours must be reported to Federal or State (if applicable) OSHA immediately.
8. Focus on causes and hazards. Develop an analysis of what happened, how it happened, and how it could have been prevented. Determine what caused the accident itself, not just the injury.

9. Every investigation must also include an action plan. How can such accidents be prevented in the future?
10. In the event a third party or defective product contributed to the accident, save any evidence as it could be critical to the recovery of claim costs.

#### Accurate & Prompt Investigations

- Ensures information is available
- Causes can be quickly corrected
- Helps identify all contributing factors
- Reflects management concern
- Reduces chance of recurrence

#### Investigation Tips

- Avoid placing blame
- Document with photos and diagrams, if needed
- Be objective, get the facts
- Reconstruct the event
- Use open-ended questions

#### Questions to Ask

When investigating accidents, open-ended questions such as who?, what?, when?, where?, why?, and how? will provide more information than closed-ended questions such as "Were you wearing gloves?"

Examples include:

- How did it happen?
- Why did it happen?
- How could it have been prevented?
- Who was involved?
- Who witnessed the incident?
- Where were the witnesses at the time of the incident?
- What was the injured worker doing?
- What was the employee working on?
- When did it happen?
- When was the accident reported?
- Where did it happen?
- Why was the employee assigned to do the job?

The single, most important question that must be answered as the result of any investigation is:

"What do you recommend be done (or have you done) to prevent this type of incident from recurring?"

### Once the Accident Investigation is Completed

- Take or recommend corrective action
- Document corrective action
- Management and the Safety Program Administrator will review the results of all investigations
- Consider safety program modifications

Information obtained through accident investigations can be used to update and improve our current program.

## **TRAINING AND INSTRUCTION**

Every new employee will be given instruction by their Supervisor in the general safety requirements of their job. A copy of our Code of Safe Practices shall also be provided to each employee.

Managers, Supervisors, and employees will be trained at least twice per year on various accident prevention topics.

Training provides the following benefits:

- Makes employees aware of job hazards
- Teaches employees to perform jobs safely
- Promotes two way communication
- Encourages safety suggestions
- Creates interest in the safety program
- Fulfills Federal or State (if applicable) OSHA requirements

Employee training will be provided at the following times:

1. All new employees will receive a safety orientation their first day on the job.
2. All new employees will be given a copy of the Code of Safe Practices and required to read and sign for it.
3. All employees given a new job assignment for which training has not been previously provided will be trained before beginning the new assignment.
4. Whenever new substances, processes, procedures or equipment that represent a new hazard are introduced into the workplace.
5. Whenever the company is made aware of a new or previously unrecognized hazard.
6. Whenever management believes that additional training is necessary.
7. After all serious accidents.
8. When employees are not following safe work rules or procedures.

Training topics will include, but not be limited to:



- Employee's safety responsibility
- General safety rules
- Code of Safe Practices
- Safe job procedures
- Ergonomics
- Use of hazardous materials
- Use of equipment
- Emergency procedures
- Safe lifting and material handling practices
- Contents of safety program

### *Documentation of Training*

All training will be documented on one of the following three forms.

New Employee Safety Orientation  
 Employee Safety Contact Form  
 Safety Meeting Report

The following training method should be used. Actual demonstrations of the proper way to perform a task are very helpful in most cases.

- Tell them how to do the job safely
- Show them how to do the job safely
- Have them tell you how to do the job safely
- Have them show you how to do the job safely

Follow up to ensure they are still performing the job safely

## **FIRE PREVENTION AND EMERGENCY ACTION PLAN**

The company has developed the following emergency plan to cover those designated actions that must be taken to ensure employee safety from fire and during other emergencies. Any questions about this plan should be directed to The Safety Program Administrator.

### Facility Emergency Evacuation and Fire Prevention

The Safety Program Administrator is responsible for ensuring the following:

1. That all required emergency exits are clearly identified in the office, shop, and warehouse and that all required fire fighting and emergency equipment is available and in good condition.

The following items will be maintained:

- First aid kit
- Drinking water
- Flashlight

- Portable battery powered radio and batteries
  - Fire extinguishers
  - Wrench to shut off the main gas valve
  - Pry bars, axes, saws, tools or similar devices for employee rescue
2. Creating a facility map designating all emergency evacuation routes and the locations of all fire fighting equipment and emergency supplies and equipment. These maps will be posted in at least two locations in the facility.
  3. Training all exposed employees on the procedures to be followed in the event of fire, earthquake or other emergency including how to properly notify other affected employees.
  4. Identifying potential fire hazards in the office, shop and warehouse and ensuring that adequate steps are taken to prevent fires.
  5. Ensuring that combustible trash and materials are removed promptly from the facility, and that all flammable and combustible liquids are properly stored and handled.

### During an Emergency

In the event of an emergency such as earthquake or fire, all employees are expected to evacuate the premises immediately. The Safety Program Manager or Safety Committee members may assign some employees the task of shutting off the gas or electricity, if needed. At no time will any employee be expected to jeopardize their own safety to do this.

Employees will be notified of emergencies through one of the following:

- Fire alarm
- Intercom
- Emergency horn
- Direct voice communication

After the emergency evacuation has been completed, a head count will be taken to ensure everyone is out of the building.

If necessary, the Safety Program Administrator or Safety Committee members may assign some employees to rescue trapped employees.

### Fire Prevention in Shops and Warehouses

The following procedures will be used to prevent fires in shops and warehouses.

1. All accumulated combustible trash and debris will be removed as soon as practical.
2. Flammable liquids will only be stored and dispensed from UL approved safety containers designed for that purpose.
3. All rags soaked with flammable or combustible liquids will be properly stored in closed metal containers.

4. Appropriate precautions will be taken to prevent fires when torch cutting, welding or soldering.
5. Compressed gas cylinders containing flammable or explosive gasses will be properly stored in the upright position with their caps on and protected from heat or puncture. Fuel gas and oxygen shall be separated at least 20 feet when stored.
6. Smoking or open lights are prohibited within 50 feet of flammable liquid or gas storage and dispensing areas.
7. Flammable solvents will not be used for cleaning purposes.
8. A fire extinguisher, rated not less than 2A, shall be provided for each 3,000 square feet of the floor area, or fraction thereof. Where the floor area is less than 3,000 square feet, at least one extinguisher shall be provided.
9. Travel distance from any point of the protected area to the nearest fire extinguisher shall not exceed 75 feet.
10. At least one fire extinguisher, rated not less than 2A, shall be provided on each floor. In multi-story buildings, at least one fire extinguisher shall be located adjacent to the stairway at each floor level.
11. A fire extinguisher, rated not less than 10B, shall be provided within 50 feet of wherever more than 5 gallons of flammable or combustible liquids or 5 pounds of flammable gas are being used on the job site. This requirement does not apply to the integral fuel tanks of motor vehicles.
12. Portable fire extinguishers shall be inspected monthly, or at more frequent intervals by the employer, and serviced at least annually by a person licensed or registered by the State Fire Marshal. NOTE: Inspection is a "quick check" that an extinguisher is available and will operate. It is intended to give reasonable assurance that the extinguisher is fully charged and operable. This is done by seeing that it is in its designated place, that it has not been actuated or tampered with, and that there is no obvious or physical damage or condition to prevent operation.
13. Suitable fire control devices, such as portable fire extinguishers, shall be available at locations where flammable or combustible liquids are stored.
14. At least one portable fire extinguisher, having a rating of not less than 20-B units, shall be located outside of, but not more than 10 feet from, the door opening into any room used for flammable liquid storage.
15. At least one portable fire extinguisher, having a rating of not less than 20-B units, shall be located not less than 25 feet, nor more than 75 feet, from any flammable liquid storage area located outside.

## **FLEET AND DRIVER SAFETY**

The company has established the following guidelines and procedures for our drivers and vehicles to protect the safety of individuals operating any motor vehicle on company business. Protecting our employee drivers, their passengers, and the public is of the highest priority. The commitment of management and employees is critical to the success of this program. Clear communication of, and strict adherence to, the program's guidelines and procedures are essential.

Our primary goal is to maintain a high level of safety awareness and foster responsible driving behavior. Driver safety awareness and responsible driving behavior will significantly decrease the frequency of motor vehicle accidents and reduce the severity of personal injuries and property damage.

Drivers must follow the requirements outlined in this program. Violations of this program may result in disciplinary action up to, and including, suspension of driving privileges or dismissal.

Our program consists of the following elements:

- Driver selection
- Driver training
- Vehicle use policy
- Vehicle inspection & preventive maintenance
- Accident investigation

### Driver Selection

Only company authorized and assigned employees are allowed to drive company vehicles at any time. Prior to being authorized and assigned, the company will check the following items. Drivers must have:

- A valid un-restricted drivers license.
- A current MVR driving record with no more than 2 points and no serious or major violations.

The company will also check driving records of all employees authorized to drive on company business on an annual basis.

Employees that do not meet these requirements are not authorized or allowed to drive company vehicles or drive their own vehicle on company business.

### Driver Training

All employees driving company vehicles, and personal vehicles on company business, will be given a copy of the Driving Safety Rules and Company Vehicle Use Policy and required to read and sign for them. Safe driving will also be periodically covered at company safety meetings.

### Company Vehicle Use Policy

The company has established the following policies pertaining to company vehicles:

1. Personal and off duty use of company vehicles is prohibited.
2. Only authorized employees may drive company vehicles. No other family members may drive company vehicles.
3. Non-employee passengers are not permitted in company vehicles at any time, unless they are business related.
4. Seat belts must be worn in company vehicles at all times.
5. No employee is permitted to drive company vehicles while impaired by alcohol, illegal or prescription drugs, or over the counter medications.
6. All accidents involving company vehicles must be reported to the office immediately.
7. Employees with two or more preventable accidents in a three year period, or that obtain three points on their driving record, will be subject to a loss of their driving privileges or have their driving privileges restricted.

### Vehicle Inspection & Preventive Maintenance

All company vehicles must be inspected by the driver prior to each use. Mechanical defects will be repaired immediately. The Safety Program Administrator will periodically spot check company vehicles to determine their condition.

Vehicle inspections will include:

- Lights
- Turn signals
- Emergency flashers
- Tires
- Horn
- Brakes
- Fluids
- Windshield condition and wiper condition
- Mirrors

All vehicles will also be maintained in accordance with the manufacturers' recommendations. It is the responsibility of the individual assigned the vehicle to ensure proper maintenance and repairs are performed. If your vehicle is not safe, do not drive.

## Accident Investigation

All accidents in company vehicles will be investigated by the Supervisor, Manager and / or the Safety Program Administrator. Where possible, witness's statements will be obtained and photos used to document the scene of the accident and the damage. Police reports will also be obtained whenever possible. The following guidelines will be used to help determine preventability.

## Auto Accident Preventability Guide

This guide will assist in determining whether our driver could have prevented the accident. An accident is preventable if the driver could have done something to avoid it. Drivers are expected to drive defensively. Which driver was primarily at fault, which received a traffic citation, or whether a claim was paid has no bearing on preventability. If there was anything our driver could have done to avoid the collision, then the accident was preventable.

An accident was non preventable when the vehicle was legally and properly parked, or when properly stopped because of a highway patrol officer, a signal, stop sign, or traffic condition. When judging accident preventability, here are some general questions to consider:

1. Does the investigation indicate that the driver considers the rights of others, or is there evidence of poor driving habits that need to be changed?
2. Does the investigation indicate driver awareness? Such phrases as "I did not see," "I didn't think," "I didn't expect," or "I thought" are signals indicating there probably was a lack of awareness, and the accident was preventable. An aware driver should think, expect, and see hazardous situations in time to avoid collisions.
3. Was the driver under any physical stresses that could have been contributory? Did the accident happen near the end of a long day or long drive? Did overeating contribute to fatigue? Did the driver get prior sufficient sleep? Is the driver's vision faulty? Was the driver feeling ill?
4. Was the vehicle defective without the driver's knowledge? Was a pre-trip inspection done, and would it have discovered the defect? A car that pulls to the left or right when the driver applies the brakes, faulty windshield wipers, and similar items are excuses, and a driver using them is trying to evade responsibility. Sudden brake failure, loss of steering, or a blowout might be defects beyond the driver's ability to predict. However, pre-trip inspections and regularly scheduled maintenance should prevent most of these problems. If either of these are the cause of the accident, then the accident was probably preventable by the driver.
5. Could the driver have exercised better judgment by taking an alternate route through less congested areas to reduce the hazardous situations encountered?
6. Could the driver have done anything to avoid the accident?
7. Was the driver's speed safe for conditions?
8. Did the driver obey all traffic signals?
9. Was the driver's vehicle under control?

## Intersection Collisions

Failure of our driver to yield the right-of-way, regardless of who has the right of way, as indicated by stop signs or lights, is preventable. The only exception to this is when the driver is properly proceeding through an intersection protected by lights or stop signs and the driver's vehicle is struck in the extreme rear side of the vehicle. Regardless of stop signs, stoplights, or right-of-way, a defensive driver recognizes that the right-of-way belongs to anyone who assumes it and should yield accordingly.

Questions to consider:

1. Did the driver approach the intersection at a speed safe for conditions?
2. Was the driver prepared to stop before entering the intersection?
3. At a blind corner, did the driver pull out slowly, ready to apply the brakes?
4. Did the driver look both ways before proceeding through the intersection?

## Sideswipes

Sideswipes are often preventable. Defensive drivers do not get into a position where they can be forced into another vehicle or another vehicle can be forced into them. Defensive drivers continuously check for escape routes to avoid sideswipes. For two lane roads, this means a driver should pass another vehicle only when absolutely certain that he or she can safely complete the pass. A driver should also be ready to slow down and let a passing vehicle that has failed to judge safe passing distance back into the lane. A driver should make no sudden moves that may force another vehicle to swerve. If a driver sideswipes a stationary object while taking evasive action to avoid striking another car or a pedestrian, such an accident may not be preventable. However, you should consider what the driver could have done or failed to do immediately preceding the evasive action to be in the position of no other options.

A driver is also expected to anticipate the actions of an oncoming vehicle. Sideswiping an oncoming vehicle is often preventable. Again, evasive action, including leaving the roadway, may be necessary if an oncoming vehicle crosses into the driver's lane. Drivers are expected to allow merging vehicles to merge smoothly with them, and to merge smoothly on controlled access highways. Drivers are expected to be able to gauge distances properly when leaving a parking place and enter traffic smoothly.

Questions to consider:

1. Did the driver look to front and rear for approaching and overtaking traffic immediately before starting to pull away from the curb?
2. Did the driver signal before pulling away from the curb?
3. Did the driver look back rather than depend only upon rear-view mirrors?
4. Did the driver start into traffic only when this action would not require traffic to change its speed or direction in order to avoid his or her vehicle?

## Head-on Collisions

A head-on collision with a vehicle traveling in the wrong lane may be preventable if the driver could have pulled off the road or taken other evasive action to prevent a collision. However, the driver should never drive into the other lane to avoid the oncoming vehicle. If the driver swerved off the

road to avoid a head-on collision, the accident is non-preventable. The driver in this case made a good defensive driving decision, taking the lesser of two evils.

Many skidding conditions are caused by rain, freezing rain, fog, and snow, which all increase the hazard of travel. Oily road film, which builds up during a period of good weather, causes an especially treacherous condition during the first minutes of a rainfall. Loss of traction can be anticipated, and these accidents usually are preventable. Driving too fast for conditions is the most common reason why these types of accidents are preventable.

Questions to consider:

1. Was the driver operating at a safe speed considering weather and road conditions?
2. During inclement weather, was the driver keeping at least twice the safe following distance used for dry pavement?
3. Were all actions gradual?
4. Was the driver anticipating ice on bridges, in gutter, ruts, and near the curb?
5. Was the driver alert for water, ice or snow in shaded areas, loose gravel, sand, ruts, etc?

If a driver goes off the road or strikes another vehicle because of skidding, the accident is preventable.

### Pedestrian Accidents

All types of pedestrian accidents, including collisions with pedestrians coming from between parked cars, are usually considered preventable. There are few instances where the action of pedestrians is so unreasonable that the operator could not be expected to anticipate such an occurrence.

Questions to consider:

1. Did the driver go through congested areas expecting that pedestrians would step in front of the vehicle?
2. Was the driver prepared to stop?
3. Did the driver keep as much clearance between his or her vehicle and parked vehicles, as safety permitted?
4. Did the driver stop when other vehicles had stopped to allow pedestrians to cross?
5. Did the driver wait for the green light or stop for the caution light?
6. Was the driver aware of children and prepared to stop if one ran into the street?
7. Did the driver give all pedestrians the right-of-way?
8. Did the driver stop for a school bus that was stopped and properly signaling that passengers were loading or unloading?

### Backing Accidents

Backing a vehicle into another vehicle, an overhead obstruction, or a stationary object is normally preventable. The fact that someone was directing the driver in backing does not relieve the driver of the responsibility to back safely.

Questions to consider:

1. Was it necessary to back?



2. Did the driver plan ahead so that he or she could have pulled forward out of the parking space instead of backing?
3. Was it necessary to drive into the narrow street, dead-end alley, or driveway from which he or she backed?
4. If the driver could not see where he or she was backing: Did the driver try to get someone to guide him or her?
5. Did the driver look all around the vehicle before backing? Did the driver back immediately after looking?
6. Did the driver use the horn while backing? Were the back-up lights working?
7. Did the driver look to the rear without relying totally on the rear-view mirror?
8. If the distance was long, did the driver stop, get out, and look around occasionally?
9. Did the driver back slowly?
10. Did the driver judge clearances accurately?

### Parking Accidents

Doors on our driver's parked vehicle that are damaged when opened on the traffic side are considered preventable accidents. The driver is responsible to see that the traffic side is clear of traffic, before any doors on that side are opened.

In most cases, if our driver, while driving, strikes a parked vehicle's opening door it is considered preventable. Usually our driver can see from a sufficient distance that the parked vehicle is occupied, and should therefore, be prepared to stop, should move closer to the center line or change lanes.

It is a driver's responsibility to park the vehicle so that it will remain stationary. A runaway type accident is preventable and blaming such a collision on defective parking brakes or other holding devices are inadequate excuses. A good pre-trip inspection and maintenance program will eliminate most opportunities for this type of accident being the result of mechanical failure.

Accidents occurring when vehicles are properly and legally parked are considered non preventable. Accidents occurring while the vehicle was double-parked or in a "No Parking" zone are preventable.

Questions to consider:

1. Was the vehicle parked on the proper side of the road?
2. Was it necessary to park there or was there a safer, only slightly less convenient place nearby?
3. Did the driver have to park on the traveled part of the highway, on the curve, or on the hill?
4. When required, did the driver warn traffic by emergency warning devices?
5. Did the driver park parallel to the curb?
6. Was it necessary to park so close to an alley or directly across from a driveway?

### Collision with Obstructions

Obstructions can be avoided if the driver knows the height and width of the vehicle, pays attention to posted clearances, and takes the time to properly judge clearances.

## Cargo Accidents

The accident should be considered preventable if the investigation shows a mechanical defect of which the driver was aware, a defect the driver should have found by inspecting the vehicle, or the driver caused the accident by rough and abusive handling. It is a driver's responsibility to secure cargo properly to prevent shifting, loss, or damage. Cargo should be safely stowed to prevent flying objects that can strike or distract the driver.

## **FALL PROTECTION**

The company has the following requirements for fall protection at all of our worksites.

### Fall Protection is Required

When working where there is a hazard of falling more than 6 feet from the perimeter of a structure, unprotected sides and edges, leading edges, through shaft ways and openings, sloped roof surfaces steeper than 7:12, or other sloped surfaces steeper than 40 degrees not otherwise adequately protected. Fall protection is also required when working in boom lifts.

### Fall Protection Types

One of the following four types of fall protection systems will be used when our employees are exposed to fall hazards in excess of 6 feet:

1. Standard guardrails, cables or floor hole covers
2. Personal fall arrest system
3. Positioning devices
4. Fall restraint systems

### Standard Guardrails, Safety Cables, or Covers

These are the easiest and most cost effective methods of providing fall protection and have a very high success rate. Standard guardrails, safety cables, floor hole and sky light covers are our preferred means of fall protection on job sites. The following rules will be followed when using them:

1. Railings shall be constructed of wood, or in an equally substantial manner from other materials, and shall consist of a top rail not less than 42 inches or more than 45 inches in height measured from the upper surface of the top rail to the floor, platform, runway or ramp level and a mid rail. The mid rail shall be halfway between the top rail and the floor, platform, runway or ramp. "Selected lumber" free from damage that affects its strength, shall be used.
2. Wooden posts shall be not less than 2 inches by 4 inches in cross section, spaced at 8-foot or closer intervals.

3. Wooden top railings shall be smooth and of 2-inch by 4-inch or larger material. Double, 1-inch by 4-inch members may be used for this purpose, provided that one member is fastened in a flat position on top of the posts and the other fastened in an edge-up position to the inside of the posts and the side of the top member. Mid rails shall be of at least 1-inch by 6-inch material.
4. The rails shall be placed on the side of the post that will afford the greatest support and protection.
5. All guardrails, including their connections and anchorage, shall be capable of withstanding a load of 13 pounds per linear foot applied either horizontally or vertically downward at the top rail.
6. Railings receiving heavy stresses from employees trucking or handling materials shall be provided additional strength by the use of heavier stock, closer spacing of posts, bracing, or by other means.
7. Floor, roof and skylight openings shall be guarded by a standard railing and toe boards or cover. Covering shall be capable of safely supporting the greater of the weight of a 200-pound person or the weight of worker(s) and material(s) placed thereon.
8. Coverings shall be secured in place to prevent accidental removal or displacement, and shall bear a pressure sensitized, painted, or stenciled sign with legible letters not less than one inch high, stating: "Opening--Do Not Remove." Markings of chalk or keel shall not be used.
9. Ladder way floor openings or platforms shall be guarded by standard railings with standard toe boards on all exposed sides, except at the entrance to the opening, with the passage through the railing either provided with a swinging gate or so offset that a person cannot walk directly into the opening.
10. Floor holes, into which persons can accidentally walk, shall be guarded by either a standard railing with standard toe boards on all exposed sides, or a floor hole cover of standard strength and construction that is secured against accidental displacement. While the cover is not in place, the floor hole shall be protected by standard railings.
11. Wall openings, from which there is a drop of more than 4 feet, and the bottom of the opening is less than 3 feet above the working surface, shall be guarded with either a standard rail or intermediate rail or both.
12. An extension platform outside a wall opening onto which materials can be hoisted for handling shall have side rails or equivalent guards of standard specifications. One side of an extension platform may have removable railings in order to facilitate handling materials.
13. Wall opening protection barriers shall be of such construction and mounting that, when in place at the opening, the barrier is capable of withstanding a load of at least 200 pounds applied in any direction (except upward).
14. All elevator shafts in which cages are not installed and which are not enclosed with solid partitions and doors shall be guarded on all open sides by standard railings and toe boards.
15. A full body harness and lanyard are required when using boom lifts.

## Personal Fall Arrest Systems

Personal fall arrest systems consist of a full body harness and a shock-absorbing lanyard attached to suitable anchorage. They are also an effective means of preventing fall accidents. The system does not actually stop you from falling, but catches you and safely stops you from hitting the level below. Fall arrest systems will be our preferred means of protection when standard guardrails, safety cables, or covers are not practical. The following rules, in addition to the manufacturer's requirements and OSHA regulations, will be observed:

1. Ropes and straps (webbing) used in lanyards, lifelines, and strength components of body harnesses shall be made from synthetic fibers except when they are used in conjunction with hot work where the lanyard may be exposed to damage from heat or flame.
2. Anchorages used for attachment of personal fall arrest equipment shall be independent of any anchorage being used to support or suspend platforms and capable of supporting at least 5,000 pounds per employee attached, or shall be designed, installed, and used as part of a complete personal fall arrest system which maintains a safety factor of at least two; and under the supervision of a qualified person.
3. The attachment point of the body belt shall be located in the center of the wearer's back. The attachment point of the body harness shall be located in the center of the wearer's back near shoulder level, or above the wearer's head.
4. Where practical, the anchor end of the lanyard shall be secured at a level not lower than the employee's waist, limiting the fall distance to a maximum of 4 feet.
5. Harnesses, lanyards, and other components shall be used only for employee protection as part of a personal fall arrest system and not to hoist materials.
6. Personal fall arrest systems and components subjected to impact loading shall be immediately removed from service and shall not be used again for employee protection until inspected and determined by a competent person to be undamaged and suitable for reuse.
7. The company shall provide for prompt rescue of employees in the event of a fall or shall assure that employees are able to rescue themselves.
8. Personal fall arrest systems shall be inspected prior to each use for wear, damage and other deterioration, and defective components shall be removed from service.
9. Any lanyard, safety harness, or drop line subjected to in-service loading, as distinguished from static load testing, shall be immediately removed from service and shall not be used again for employee safeguarding.
10. Personal fall arrest systems shall not be attached to guardrails, unless the guardrail is capable of safely supporting the load.
11. Each personal fall arrest system shall be inspected not less than twice annually by a competent person in accordance with the manufacturer's recommendations. The date of each inspection shall be documented.

12. Personal fall arrest systems will be rigged such that an employee can neither free fall more than 4 feet, nor contact any lower level.
13. Personal fall arrest systems will bring an employee to a complete stop. They will also limit maximum deceleration distance an employee travels to 3.5 feet and have sufficient strength to withstand twice the potential impact energy of an employee free falling a distance of 6 feet, or the free fall distance permitted by the system, whichever is less.

### Positioning Device Systems

Positioning device systems are designed to allow employees to work with both hands free at elevated locations. By their very nature, they provide some level of fall protection. They are not as effective as railings or fall arrest systems. Positioning device systems may be used together with a fall arrest system for greater safety. Their use shall conform to the following provisions:

1. Positioning devices shall be rigged such that an employee cannot free fall more than 2 feet.
2. Positioning device systems shall be inspected prior to each use for wear, damage, and other deterioration, and defective components shall be removed from service.
3. Body belts, harnesses, and components shall be used only for employee protection (as part of a personal fall arrest system or positioning device system) and not to hoist materials.
4. The use of non-locking snap hooks is prohibited.
5. Anchorage points for positioning device systems shall be capable of supporting two times the intended load or 3,000 pounds, whichever is greater.

### Personal Fall Restraint

Fall restraint systems are designed to prevent the wearer from reaching the edge or danger area and thus prevent them from falling. Body belts or harnesses may be used for personal fall restraint.

1. Body belts shall be at least one and five-eighths (1 5/8) inches wide.
2. Anchorage points used for fall restraint shall be capable of supporting 4 times the intended load.
3. Restraint protection shall be rigged to allow the movement of employees only as far as the sides of the working level or working area.

**\*\*“FREE CLIMBING” IS STRICTLY PROHIBITED ON ANY TALISEN CONSTRUCTION CORPORATION CONSTRUCTION SITE AND SHALL RESULT IN TERMINATION OF EMPLOYMENT\*\***

## **RESPIRATORY PROTECTION**

Occasionally our work may necessitate the use of respirators to protect against air contaminants. Due to the limitations of respirators and their uncomfortable nature, the company will make every effort to provide other means of protection, such as local exhaust ventilation, or substitution of less hazardous material, prior to requiring employees to wear them.

When it is clearly impractical to remove harmful dusts, fumes, mists, vapors, or gases at their source, or where emergency protection against occasional and/or relatively brief exposure is needed, the company will provide, and the employee exposed to such hazard shall use, approved respiratory equipment.

Whenever respirators are required to be used to control harmful exposures, only respiratory equipment approved for that purpose shall be used and such equipment shall be approved by the National Institute for Occupational Safety and Health (NIOSH). Only parts approved for the specific respirator system shall be used for replacement.

### General Respiratory Protection Guidelines:

1. Atmospheric contamination will be prevented wherever feasible through engineering controls such as enclosure or confinement of the operation, general and local exhaust ventilation, or substitution of less toxic materials. When effective engineering controls are not feasible, or while they are being instituted, appropriate respirators shall be used.
2. The company shall identify and evaluate the respiratory hazard(s) in the workplace; this evaluation shall include a reasonable estimate of employee exposures to respiratory hazard(s) and an identification of the contaminant's chemical state and physical form. Where we cannot identify or reasonably estimate the employee exposure, the atmosphere shall be considered to be immediately dangerous to life or health (IDLH).
3. Respirators shall be provided when such equipment is necessary to protect the health of the employee.
4. Only NIOSH-certified respirators shall be used. The respirator shall be used in compliance with the conditions of its certification.
5. The company will provide respirators that are applicable and suitable for the purpose intended. We shall select and provide an appropriate respirator based on the respiratory hazard(s) to which the worker is exposed and workplace and user factors that affect respirator performance and reliability.
6. Respirators shall be selected from a sufficient number of respirator models and sizes so that the respirator is acceptable to, and correctly fits, the user.

7. The safety program administrator is qualified by appropriate training or experience that is commensurate with the complexity of the program to administer or oversee the respiratory protection program and conduct the required evaluations of program effectiveness.
8. The company will provide respirators, training, and medical evaluations at no cost to the employee.
9. The company will provide a medical evaluation to determine the employee's ability to use a respirator, before the employee is fit tested or required to use the respirator in the workplace. We may discontinue an employee's medical evaluations when the employee is no longer required to use a respirator.
10. The company will ensure that employees using a tight-fitting facepiece respirator pass an appropriate qualitative fit test (QLFT) or quantitative fit test (QNFT).
11. The company will establish and implement procedures for the proper use of respirators. These requirements include prohibiting conditions that may result in facepiece seal leakage, preventing employees from removing respirators in hazardous environments, taking actions to ensure continued effective respirator operation throughout the work shift, and establishing procedures for the use of respirators in IDLH atmospheres.
12. We shall provide each respirator user with a respirator that is clean, sanitary, and in good working order. The Supervisor or Manager shall ensure that respirators are cleaned and disinfected.
13. All filters, cartridges and canisters used in the workplace must be legibly labeled and color-coded with the NIOSH approval label that must not be removed.
14. Training and information will be provided to employees who are required to use respirators. The training will be comprehensive, understandable, and recur annually, or more often if necessary.
15. The safety program administrator shall conduct evaluations of the workplace to ensure that the written respiratory protection program is being properly implemented, and to consult with employees to ensure that they are using the respirators properly.
16. Written information regarding medical evaluations, fit testing, and the respirator program shall be retained indefinitely. This information will facilitate employee involvement in the respirator program, assist us in auditing the adequacy of the program, and provide a record for compliance determinations by OSHA.
17. Where respirator use is not required by a particular standard or hazard, the company may provide respirators at the request of employees or permit employees to use their own respirators, if we determine that such respirator use will not in itself create a hazard. If voluntary respirator use is permissible, we shall provide the respirator users with the information contained in Appendix D of section 5144 8CCR. ("Information for Employees Using Respirators When Not Required Under the Standard.")

### Respirator Selection Requirements

The proper respirator for the job and hazard shall be selected. This selection will be made in accordance with ANSI Z88.2-1980 standards. The correct respirator shall be specified for each job. The individual issuing them shall be adequately instructed to insure that the correct respirator is used.

The manufacturers' recommendations and literature will also be reviewed to determine if the respirator provides protection against the expected contaminants. For instance, dust masks do not provide protection against gasses or vapors.

The safety program administrator or another qualified individual shall review and approve all breathing air compressors and installations for compliance with appropriate OSHA regulations and safety procedures prior to use.

### Respirators for IDLH atmospheres.

We shall provide the following respirators for employee use in IDLH atmospheres:

- A full face piece pressure demand SCBA certified by NIOSH for a minimum service life of thirty minutes, or
- A combination full face piece pressure demand supplied-air respirator (SAR) with auxiliary self-contained air supply.
- Respirators provided only for escape from IDLH atmospheres shall be NIOSH-certified for escape from the atmosphere in which they will be used.
- All oxygen-deficient atmospheres shall be considered IDLH.

### Respirators for atmospheres that are not IDLH.

The company shall provide a respirator that is adequate to protect the health of the employee and ensure compliance with all other OSHA statutory and regulatory requirements, under routine and reasonably foreseeable emergency situations. The respirator selected shall be appropriate for the chemical state and physical form of the contaminant.

### For protection against gases and vapors:

- An atmosphere-supplying respirator, or
- An air-purifying respirator, provided that the respirator is equipped with an end-of-service-life indicator (ESLI) certified by NIOSH for the contaminant; or if there is no ESLI appropriate for conditions in the workplace, we will implement a change schedule for canisters and cartridges that is based on objective information or data that will ensure that canisters and cartridges are changed before the end of their service life.

### For protection against particulates:

- An atmosphere-supplying respirator; or



- An air-purifying respirator equipped with a filter certified by NIOSH under 30 CFR part 11 as a high efficiency particulate air (HEPA) filter, or an air-purifying respirator equipped with a filter certified for particulates by NIOSH under 42 CFR part 84; or
- For contaminants consisting primarily of particles with mass median aerodynamic diameters (MMAD) of at least 2 micrometers, an air-purifying respirator equipped with any filter certified for particulates by NIOSH.

### Medical Evaluation Procedures

1. Employees shall not be assigned to tasks requiring the use of respirators unless it has been determined that they are physically able to perform the work while using the required respiratory equipment.
2. The company shall identify a physician or other licensed health care professional (PLHCP) to perform medical evaluations.
3. The medical evaluation shall include any medical tests, consultations, or diagnostic procedures that the PLHCP deems necessary to make a final determination.
4. Medical questionnaires and examinations shall be administered confidentially during the employee's normal working hours or at a time and place convenient to the employee.
5. The employee shall have an opportunity to discuss the examination results with the PLHCP.
6. The following information must be provided to the PLHCP before the PLHCP makes a recommendation concerning an employee's ability to use a respirator:
  - The type and weight of the respirator to be used by the employee;
  - The duration and frequency of respirator use (including use for rescue and escape);
  - The expected physical work effort;
  - Additional protective clothing and equipment to be worn; and
  - Temperature and humidity extremes that may be encountered.
7. The company shall provide the PLHCP with a copy of this written respiratory protection program and a copy of the OSHA regulations if they do not already have them.
8. In determining the employee's ability to use a respirator, the company shall obtain a written recommendation regarding the employee's ability to use the respirator from the PLHCP. The recommendation shall provide only the following information:
  - Any limitations on respirator use related to the medical condition of the employee, or relating to the workplace conditions in which the respirator will be used, including whether or not the employee is medically able to use the respirator;
  - The need, if any, for follow-up medical evaluations; and
  - A statement that the PLHCP has provided the employee with a copy of the PLHCP's written recommendation.
9. If the respirator is a negative pressure respirator and the PLHCP finds a medical condition that may place the employee's health at increased risk if the respirator is used, the company shall provide a powered air purifying respirator (PAPR) if the PLHCP's medical evaluation finds that the

employee can use such a respirator; if a subsequent medical evaluation finds that the employee is medically able to use a negative pressure respirator, then we are no longer required to provide a PAPR.

10. The company shall provide additional medical evaluations that comply with the requirements of this section if:
  - An employee reports medical signs or symptoms that are related to ability to use a respirator;
  - A PLHCP, supervisor, or the respirator program administrator informs the employer that an employee needs to be reevaluated;
  - Information from the respiratory protection program, including observations made during fit testing and program evaluation, indicates a need for employee reevaluation; or
  - A change occurs in workplace conditions (e.g., physical work effort, protective clothing, temperature) that may result in a substantial increase in the physiological burden placed on an employee.

### Fit Testing

1. The company shall ensure that an employee using a tight-fitting face piece respirator is fit tested prior to initial use of the respirator, whenever a different respirator face piece (size, style, model or make) is used, and at least annually thereafter.
2. We shall conduct an additional fit test whenever the employee reports, or the employer, PLHCP, supervisor, or program administrator makes visual observations of, changes in the employee's physical condition that could affect respirator fit. Such conditions include, but are not limited to, facial scarring, dental changes, cosmetic surgery, or an obvious change in body weight.
3. If after passing a QLFT or QNFT, the employee subsequently notifies the program administrator, supervisor, or PLHCP that the fit of the respirator is unacceptable, the employee shall be given a reasonable opportunity to select a different respirator face piece and to be retested.
4. The fit test shall be administered using an OSHA-accepted QLFT or QNFT protocol.

### Usage Rules

1. The company shall not permit respirators with tight-fitting face pieces to be worn by employees who have:
  - Facial hair that comes between the sealing surface of the face piece and the face or that interferes with valve function; or
  - Any condition that interferes with the face-to-face piece seal or valve function.
2. If an employee wears corrective glasses or goggles or other personal protective equipment, we shall ensure that such equipment is worn in a manner that does not interfere with the seal of the face piece to the face of the user.
3. For all tight-fitting respirators, we shall ensure that employees perform a user seal check each time they put on the respirator.

4. Appropriate surveillance shall be maintained of work area conditions and degree of employee exposure or stress. When there is a change in work area conditions or degree of employee exposure or stress that may affect respirator effectiveness, we shall reevaluate the continued effectiveness of the respirator.
5. Respiratory equipment shall not be passed on from one person to another until it has been cleaned and sanitized. Respirators individually assigned should be marked to indicate to whom it was assigned. This mark shall not affect the respirator performance in any way. The date of issuance should be recorded.
6. When not in use, respirators shall be stored to protect against dust, sunlight, extreme temperatures, excessive moisture, or damaging chemicals. Plastic zip lock bags are suitable for storage.
7. The company shall ensure that employees leave the respirator use area:
  - To wash their faces and respirator facepieces as necessary to prevent eye or skin irritation associated with respirator use; or
  - If they detect vapor or gas breakthrough, changes in breathing resistance, or leakage of the facepiece; or
  - To replace the respirator or the filter, cartridge, or canister elements.
8. If the employee detects vapor or gas breakthrough, changes in breathing resistance, or leakage of the facepiece, we will replace or repair the respirator before allowing the employee to return to the work area.
9. For all IDLH atmospheres, the company shall ensure that:
  - One employee or, when needed, more than one employee is located outside the IDLH atmosphere;
  - Visual, voice, or signal line communication is maintained between the employee(s) in the IDLH atmosphere and the employee(s) located outside the IDLH atmosphere;
  - The employee(s) located outside the IDLH atmosphere are trained and equipped to provide effective emergency rescue;
  - The Supervisor or designee is notified before the employee(s) located outside the IDLH atmosphere enter the IDLH atmosphere to provide emergency rescue;
  - The Supervisor or designee authorized to do so by «Company\_Name», once notified, provides necessary assistance appropriate to the situation;
  - Employee(s) located outside the IDLH atmospheres are equipped with pressure demand or other positive pressure SCBAs, or a pressure demand or other positive pressure supplied-air respirator with auxiliary SCBA; and either appropriate retrieval equipment for removing the employee(s) who enter(s) these hazardous atmospheres where retrieval equipment would contribute to the rescue of the employee(s) and would not increase the overall risk resulting from entry; or equivalent means for rescue where retrieval equipment is not required.

#### Maintenance, Inspection and Care of Respirators.

1. The company shall ensure that respirators are cleaned and disinfected using procedures recommended by the respirator manufacturer, provided that such procedures are of equivalent

effectiveness to OSHA regulations. The respirators shall be cleaned and disinfected at the following intervals:

- Respirators issued for the exclusive use of an employee shall be cleaned and disinfected as often as necessary to be maintained in a sanitary condition;
  - Respirators issued to more than one employee shall be cleaned and disinfected before being worn by different individuals;
  - Respirators maintained for emergency use shall be cleaned and disinfected after each use; and
  - Respirators used in fit testing and training shall be cleaned and disinfected after each use.
2. All respirators shall be stored to protect them from damage, contamination, dust, sunlight, extreme temperatures, excessive moisture, and damaging chemicals, and they shall be packed or stored to prevent deformation of the facepiece and exhalation valve.
  3. Emergency respirators shall be:
    - Kept accessible to the work area;
    - Stored in compartments or in covers that are clearly marked as containing emergency respirators; and
    - Stored in accordance with any applicable manufacturer instructions.
  4. All respirators used in routine situations shall be inspected before each use and during cleaning;
  5. All respirators maintained for use in emergency situations shall be inspected at least monthly and in accordance with the manufacturer's recommendations, and shall be checked for proper function before and after each use; and
  6. Emergency escape-only respirators shall be inspected before being carried into the workplace for use.
  7. The company shall ensure that respirator inspections include the following:
    - A check of respirator function, tightness of connections, and the condition of the various parts including, but not limited to, the facepiece, head straps, valves, connecting tube, and cartridges, canisters or filters; and
    - A check of elastomeric parts for pliability and signs of deterioration.
  8. In addition to the requirements above, self-contained breathing apparatus shall be inspected monthly.
  9. Air and oxygen cylinders shall be maintained in a fully charged state and shall be recharged when the pressure falls to 90% of the manufacturer's recommended pressure level. The employer shall determine that the regulator and warning devices function properly.
  10. For respirators maintained for emergency use, the company shall:
    - Certify the respirator by documenting the date the inspection was performed, the name (or signature) of the person who made the inspection, the findings, required remedial action, and a serial number or other means of identifying the inspected respirator; and

- Provide this information on a tag or label that is attached to the storage compartment for the respirator, is kept with the respirator, or is included in inspection reports stored as paper or electronic files. This information shall be maintained until replaced following a subsequent certification.
11. Repairs. The company shall ensure that respirators that fail an inspection or are otherwise found to be defective are removed from service, and are discarded or repaired or adjusted in accordance with the following procedures:
- Repairs or adjustments to respirators are to be made only by persons appropriately trained to perform such operations and shall use only the respirator manufacturer's NIOSH-approved parts designed for the respirator;
  - Repairs shall be made according to the manufacturer's recommendations and specifications for the type and extent of repairs to be performed; and
  - Reducing and admission valves, regulators, and alarms shall be adjusted or repaired only by the manufacturer or a technician trained by the manufacturer.

### Training

1. The company shall ensure that each employee required to use a respirator can demonstrate knowledge of at least the following:
  - Why the respirator is necessary and how improper fit, usage, or maintenance can compromise the protective effect of the respirator;
  - What the limitations and capabilities of the respirator are;
  - How to use the respirator effectively in emergency situations, including situations in which the respirator malfunctions;
  - How to inspect, put on and remove, use, and check the seals of the respirator;
  - What the procedures are for maintenance and storage of the respirator;
  - How to recognize medical signs and symptoms that may limit or prevent the effective use of respirators; and
2. The training shall be conducted in a manner that is understandable to the employee.
3. The training shall be provided prior to requiring the employee to use a respirator in the workplace.
4. Retraining shall be administered annually, and when the following situations occur:
  - Changes in the workplace or the type of respirator render previous training obsolete;
  - Inadequacies in the employee's knowledge or use of the respirator indicate that the employee has not retained the requisite understanding or skill; or
  - Any other situation arises in which retraining appears necessary to ensure safe respirator use.

## Program Evaluation

1. The safety program administrator shall conduct evaluations of the workplace as necessary to ensure that the provisions of the current written program are being effectively implemented and that it continues to be effective.
2. The safety program administrator shall regularly consult employees required to use respirators to assess the employees' views on program effectiveness and to identify any problems. Any problems that are identified during this assessment shall be corrected. Factors to be assessed include, but are not limited to:
  - Respirator fit (including the ability to use the respirator without interfering with effective workplace performance);
  - Appropriate respirator selection for the hazards to which the employee is exposed;
  - Proper respirator use under the workplace conditions the employee encounters; and
  - Proper respirator maintenance.

## Recordkeeping

1. Records of medical evaluations must be retained and made available to regulatory agencies.
2. The company shall establish a record of the qualitative and quantitative fit tests administered to an employee including:
  - The name or identification of the employee tested;
  - Type of fit test performed;
  - Specific make, model, style, and size of respirator tested;
  - Date of test; and
  - The pass/fail results for QLFTs or the fit factor and strip chart recording or other recording of the test results for QNFTs.
  - Fit test records shall be retained for respirator users until the next fit test is administered.
3. Program records shall be made available upon request to affected employees and to governing or regulatory agencies for examination and copying.

## Procedures for Cleaning Respirators.

1. Remove filters, cartridges, or canisters. Disassemble facepieces by removing speaking diaphragms, demand and pressure-demand valve assemblies, hoses, or any components recommended by the manufacturer. Discard and replace any defective parts.

2. Wash components in warm (43 deg. C [110 deg. F] maximum) water with a mild detergent or with a cleaner recommended by the manufacturer. A stiff bristle (not wire) brush may be used to facilitate the removal of dirt.
3. Rinse components thoroughly in clean, warm (43 deg. C [110 deg. F] maximum), preferably running water. Drain.
4. When the cleaner used does not contain a disinfecting agent, respirator components should be immersed for two minutes in one of the following:
  - Hypochlorite solution (50 ppm of chlorine) made by adding approximately one milliliter of laundry bleach to one liter of water at 43 deg. C (110 deg. F); or,
  - Aqueous solution of iodine (50 ppm iodine) made by adding approximately 0.8 milliliters of tincture of iodine (6-8 grams ammonium and/or potassium iodide/100 cc of 45% alcohol) to one liter of water at 43 deg. C (110 deg. F); or,
  - Other commercially available cleansers of equivalent disinfectant quality when used as directed, if their use is recommended or approved by the respirator manufacturer.
5. Rinse components thoroughly in clean, warm (43 deg. C [110 deg. F] maximum), preferably running water. Drain. The importance of thorough rinsing cannot be overemphasized. Detergents or disinfectants that dry on facepieces may result in dermatitis. In addition, some disinfectants may cause deterioration of rubber or corrosion of metal parts if not completely removed.
6. Components should be hand-dried with a clean lint-free cloth or air-dried.
7. Reassemble facepiece, replacing filters, cartridges, and canisters where necessary.
8. Test the respirator to ensure that all components work properly.

#### Mandatory Information for Employees Using Respirators When Not Required

Respirators are an effective method of protection against designated hazards when properly selected and worn. Respirator use is encouraged, even when exposures are below the exposure limit, to provide an additional level of comfort and protection for workers. However, if a respirator is used

improperly or not kept clean, the respirator itself can become a hazard to the worker. Sometimes, workers may wear respirators to avoid exposures to hazards, even if the amount of hazardous substance does not exceed the limits set by OSHA standards. If your employer provides respirators for your voluntary use, or if you provide your own respirator, you need to take certain precautions to be sure that the respirator itself does not present a hazard.

You should do the following:

1. Read and heed all instructions provided by the manufacturer on use, maintenance, cleaning and care, and warnings regarding the respirators limitations.
2. Choose respirators certified for use to protect against the contaminant of concern. NIOSH, the National Institute for Occupational Safety and Health of the U.S. Department of Health and Human Services, certifies respirators. A label or statement of certification should appear on the respirator or respirator packaging. It will tell you what the respirator is designed for and how much it will protect you.
3. Do not wear your respirator into atmospheres containing contaminants for which your respirator is not designed to protect against. For example, a respirator designed to filter dust particles will not protect you against gases, vapors, or very small solid particles of fumes or smoke.
4. Keep track of your respirator so that you do not mistakenly use someone else's respirator.

### **ELECTRICAL & LOCK-OUT / TAG-OUT PROGRAM**

The company has developed the following procedures to protect our employees and reduce the risk of accidents. We will also conduct a periodic review of electrical safety, energy control procedures, and lock-out / tag-out, at least annually, to ensure that the procedure and the requirements of this section are being followed.

This procedure is binding upon all employees. All employees will be instructed in the significance of electrical safety, energy control procedures, and lock-out / tag-out. Each new employee shall be instructed by their Supervisor in the purpose and use of these procedures.



### All Equipment and Installations

1. Only trained, qualified, and authorized employees will be allowed to make electrical repairs or work on electrical equipment or installations.
2. All electrical equipment and systems shall be treated as energized until tested or otherwise proven to be de-energized.
3. All energized equipment and installations will be de-energized prior to the commencement of any work. If the equipment or installation must be energized for test or other purposes, special precautions will be taken to protect against the hazards of electric shock.
4. All equipment shall be locked out to protect against accidental or inadvertent operation when such operation could cause injury to personnel. Do not attempt to operate any switch, valve, or other energy-isolating device bearing a lock.
5. Safety grounds shall always be used where there is a danger of shock from back feeding or other hazards.
6. Polyester clothing or other flammable types of clothing shall not be worn near electrical circuits. Cotton clothing is much less likely to ignite from arc blast. Employees working on live circuits shall be provided Nomex or equivalent fire resistant clothing.
7. Suitable eye protection must be worn at all times while working on electrical equipment.
8. Always exercise caution when energizing electrical equipment or installations. Take steps to protect employees from arc blast and exploding equipment in the event of a fault.
9. All power tools will be grounded or double insulated. Tools with defective cords or wiring shall not be used.
10. Suitable temporary barriers or barricades shall be installed when access to open enclosures containing exposed energized equipment is not under the control of an authorized person.

### Energized Equipment or Systems

Work shall not be performed on exposed energized parts of equipment or systems until the following conditions are met:

1. Responsible supervision has determined that the work is to be performed while the equipment or systems are energized.
2. Involved personnel have received instructions on the work techniques and hazards involved in working on energized equipment and appropriate equipment to perform the job has been provided.
3. Suitable personal protective equipment has been provided and is used. Suitable insulated gloves shall be worn for voltages in excess of 300 volts, nominal.

4. Suitable eye protection, including face shield and safety glasses or goggles, has been provided and is used.
5. Fire resistant clothing such as Nomex suits is worn.
6. Where required, suitable barriers, barricades, tags, or signs are in place for personnel protection.

After the required work on an energized system or equipment has been completed, an authorized person shall be responsible for:

1. Removing from the work area any personnel and protective equipment.
2. Reinstalling all permanent barriers or covers.

#### De-energized Equipment or Systems

A qualified person shall be responsible for completing the following before working on de-energized electrical equipment or systems, unless the equipment is physically removed from the wiring system:

1. Notifying all involved personnel.
2. Locking the disconnecting means in the "open" position with the use of lockable devices, such as padlocks, combination locks or disconnecting of the conductor(s) or other positive methods or procedures which will effectively prevent unexpected or inadvertent energizing of a designated circuit, equipment or appliance.
3. Tagging the disconnecting means with suitable accident prevention tags.
4. Effectively blocking the operation or dissipating the energy of all stored energy devices which present a hazard, such as capacitors or pneumatic, spring-loaded and like mechanisms. This may require the installation of safety grounds.
5. Testing the equipment to ensure it is de-energized.

#### Energizing (or Re-energizing) Equipment or Systems

A qualified and authorized person shall be responsible for completing the following before energizing equipment or systems that have been de-energized:

1. Determining that all persons are clear from hazards which might result from the equipment or systems being energized including arc blast or explosions caused by unexpected faults.
2. Removing locking devices and tags. Only the employee who placed them may remove locking devices and tags. Locking devices and tags shall be removed upon completion of the work and after the installation of the protective guards and/or safety interlock systems.

### Accident Prevention Tags

Suitable accident prevention tags shall be used to control a specific hazard. Such tags shall provide the following minimum information:

1. Reason for placing tag.
2. Name of person placing the tag and how that person may be contacted.
3. Date tag was placed.

### Lock-out / Tag-out

Machinery or equipment capable of movement shall be stopped and the power source de-energized or disengaged, and locked out. If necessary, the moveable parts shall be mechanically blocked or secured to prevent inadvertent movement during cleaning, servicing or adjusting operations unless the machinery or equipment must be capable of movement during this period in order to perform the specific task. If so, the hazard of movement shall be minimized.

Equipment or power driven machines equipped with lockable controls, or readily adaptable to lockable controls, shall be locked out or positively sealed in the "off" position during repair work and setting-up operations. In all cases, accident prevention signs and/or tags shall be placed on the controls of the equipment or machines during repair work.

The company will provide a sufficient number of accident prevention signs or tags and padlocks, seals or other similarly effective means that may be required by any reasonably foreseeable repair.

### Sequence of Lockout Procedure

1. Notify all affected employees that a lockout is required and the reason therefore.
2. If the equipment is operating, shut it down by the normal stopping procedure (such as: depress stop button, open toggle switch).
3. Operate the switch, valve, or other energy isolating devices so that the energy source(s) (electrical, mechanical, hydraulic, other) is disconnected or isolated from the equipment.
4. Stored energy, such as that in capacitors, springs, elevated machine members, rotating fly wheels, hydraulic systems, and air, gas, steam or water pressure, must also be dissipated or restrained by methods such as grounding, repositioning, blocking, bleeding down.
5. Lockout energy isolating devices with an assigned individual lock.
6. After ensuring that no personnel are exposed and as a check on having disconnected the energy sources, operate the push button or other normal operating controls to make certain the equipment will not operate. CAUTION: Return operating controls to neutral position after the test.

### Procedure Involving More Than One Person

If more than one individual is required to lock out equipment, each shall place his/her own personal lock on the energy isolating device(s). One designated individual of a work crew or a Supervisor, with the knowledge of the crew, may lock out equipment for the whole crew. In such cases, it may be the responsibility of the individual to carry out all steps of the lockout procedure and inform the crew when it is safe to work on the equipment. Additionally, the designated individual shall not remove a crew lock until it has been verified that all individuals are clear.

### Testing Equipment during Lockout

In many maintenance and repair operations, machinery may need to be tested, and for that purpose energized, before additional maintenance work can be performed. This procedure must be followed:

1. Clear all personnel to safety.
2. Clear away tools and materials from equipment.
3. Remove lockout devices and re-energize systems, following the established safe procedure.
4. Proceed with tryout or test.
5. Neutralize all energy sources once again, purge all systems, and lockout prior to continuing work.

Equipment design and performance limitations may dictate that effective alternative worker protection be provided when the established lock-out procedure is not feasible.

### Restoring Equipment to Service

After the work is completed and the equipment is ready to be returned to normal operation, this procedure must be followed:

1. Remove all non-essential items.
2. See that all equipment components are operationally intact, including guards and safety devices. Repair or replace defective guards before removing lockouts.
3. Remove each lockout device using the correct removal sequence.
4. Make a visual check before restoring energy to ensure that everyone is physically clear of the equipment.

## **CONFINED SPACE OPERATIONS**

Occasionally in our work, we may encounter confined spaces. Confined space work requires special safety precautions to ensure that employees are not overcome by dangerous air contaminants or oxygen deficiency. In some cases, there may be fire or explosion hazards in confined spaces that do

not exist in open areas. Many workers have been killed or seriously injured in confined spaces. To avoid this, employees must adhere to the following rules. This section prescribes minimum standards for preventing employee exposure to dangerous air contamination and/or oxygen deficiency in confined spaces. In some cases, extra precautions may be necessary. As always, if you are unsure, ask for assistance.

### Definitions

A confined space has the following properties:

1. Existing ventilation is insufficient to remove dangerous air contamination and/or oxygen deficiency that may exist or develop.
2. Ready access or egress for the removal of a suddenly disabled employee is difficult due to the location and/or size of the opening(s).
3. The area is not designed for continuous human occupancy.

Dangerous air contamination means an atmosphere presenting a threat of causing death, injury, acute illness, or disablement due to the presence of flammable and/or explosive, toxic, or otherwise injurious or incapacitating substances.

Dangerous air contamination due to the flammability of a gas or vapor is defined as an atmosphere containing the gas or vapor at a concentration greater than 20 percent of its lower explosive (lower flammable) limit.

Dangerous air contamination due to a combustible particulate is defined as a concentration greater than 20 percent of the minimum explosive concentration of the particulate.

Dangerous air contamination due to the toxicity of a substance is defined as the atmospheric concentration immediately hazardous to life or health. This definition of dangerous air contamination due to the toxicity of a substance does not preclude the requirement to control harmful exposures to toxic substances at concentrations less than those immediately hazardous to life or health.

Oxygen deficiency. An atmosphere containing oxygen at a concentration of less than 19.5 percent by volume.

Oxygen rich. An atmosphere containing oxygen at a concentration of more than 22 percent by volume. This creates additional fire hazards.

### Typical Confined Spaces:

- Vaults
- Pits
- Tubs
- Vats
- Ducts
- Boilers
- Silos

- Sewers
- Compartments

#### Prior to Confined Space Entry:

1. Written, understandable operating and rescue procedures shall be developed and shall be provided to affected employees. The operating procedures shall include provision for the surveillance of the surrounding area to avoid hazards such as drifting vapors from tanks, piping and sewers.
2. All employees, including standby persons if needed, will be trained in the operating and rescue procedures, including instructions as to the hazards they may encounter.
3. Any lines, pipes or hoses which may convey flammable, injurious, or incapacitating substances into the space shall be disconnected, blinded, or blocked off by other positive means to prevent the development of dangerous air contamination and/or oxygen deficiency within the space. The disconnection or blind shall be so located or done in such a manner that inadvertent reconnection of the line or removal of the blind are effectively prevented.
4. The space shall be emptied, flushed, or otherwise purged of flammable, injurious or incapacitating substances to the extent feasible.
5. The air shall be tested with an appropriate device or method to determine whether dangerous air contamination and/or an oxygen deficiency exists and a written record of such testing results shall be made and kept at the work site for the duration of the work. Affected employees and/or their representative shall be afforded an opportunity to review and record the testing results.
6. Where interconnected spaces are blinded off as a unit, each space shall be tested and the results recorded. The most hazardous condition found shall govern the entry procedures to be followed.

#### Confined Space Entry if Tests Show No Hazard

If dangerous air contamination and/or oxygen deficiency does not exist within the space, as demonstrated by tests performed in accordance with the pre-entry procedures, entry into and work within the space may proceed subject to the following provisions:

1. Air testing, in accordance with the pre-entry procedures, shall be conducted with sufficient frequency to ensure that the development of dangerous air contamination and/or oxygen deficiency does not occur during the performance of any operation.
2. Work stops, employees exit, and additional precautions are taken if dangerous air contamination and/or oxygen deficiency does develop.

#### Confined Space Entry if Tests Show Hazards are Present or are Likely to Develop

Where the existence of dangerous air contamination and/or oxygen deficiency is demonstrated by tests performed in accordance with the pre-entry procedures or if the development of dangerous air contamination and/or an oxygen deficiency is imminent, the following requirements shall also apply:

1. Existing ventilation shall be augmented by appropriate means.
2. When additional ventilation has removed dangerous air contamination and/or oxygen deficiency as demonstrated by additional testing conducted (and recorded), entry into and work within the space may proceed.
3. No source of ignition shall be introduced until the implementation of appropriate provisions of this section have ensured that dangerous air contamination due to flammable and/or explosive substances does not exist.
4. Whenever oxygen-consuming equipment such as welding torches, furnaces and the like are to be used, measures shall be taken to ensure adequate combustion air and exhaust gas venting.
5. To the extent feasible, provision shall be made to permit ready entry and exit.
6. Where it is not feasible to provide for ready exit from spaces equipped with automatic fire suppression systems employing harmful design concentrations of toxic or oxygen-displacing gases, or total foam flooding, such systems shall be deactivated. Where it is not practical or safe to deactivate such systems, the use of respiratory protective equipment, such as SCBA, shall apply during entry into and work within such spaces.

#### Confined Spaces Where Dangerous Air Contamination Cannot be Removed by Ventilation

It is the policy of the company to only work in a confined space if it can be made safe by the means listed above. We will not work in confined spaces where there is an ongoing hazard of air contamination or oxygen deficiency. These operations require extra measures and precautions beyond our immediate ability to perform. If such work does become necessary, a separate program will be developed.

### **FORKLIFTS**

Each year about 100 workers are killed and almost 95,000 injured in industrial truck accidents across the country. To properly protect our employees from such accidents, the company has adopted the following Forklift Safety Program.

#### General

The company will ensure that each powered industrial truck operator is competent to operate a powered industrial truck safely, as demonstrated by the successful completion of the training and evaluation specified below.

Prior to permitting an employee to operate a powered industrial truck (except for training purposes), the company shall ensure that the employee has successfully completed a training program.

### Training Program Implementation.

Trainees may operate a powered industrial truck only:

- under the direct supervision of persons who have the knowledge, training, and experience to train operators and evaluate their competence; and
- where such operation does not endanger the trainee or other employees.

Training shall consist of a combination of formal instruction (e.g., lecture, discussion, interactive computer learning, video tape, written material), practical training (demonstrations performed by the trainer and practical exercises performed by the trainee), and evaluation of the operator's performance in the workplace.

All operator training and evaluation shall be conducted by persons who have the knowledge, training, and experience to train powered industrial truck operators and evaluate their competence.

Note: This section does not require that the training be given by any particular individual or organization. The trainer must only be able to demonstrate that they have appropriate knowledge, training and experience to train others and evaluate their competence.

### Training Program Content.

Powered industrial truck operators shall receive initial training in the following topics.

- Operating instructions, warnings, and precautions for the types of truck the operator will be authorized to operate;
- Differences between the truck and the automobile;
- Truck controls and instrumentation: where they are located, what they do, and how they work;
- Engine or motor operation;
- Steering and maneuvering;
- Visibility (including restrictions due to loading);
- Fork and attachment adaptation, operation, and use limitations;
- Vehicle capacity;
- Vehicle stability;
- Any vehicle inspection and maintenance that the operator will be required to perform;
- Refueling and/or charging and recharging of batteries;
- Operating limitations;
- Any other operating instructions, warnings, or precautions listed in the operator's manual for the types of vehicle that the employee is being trained to operate.
- Workplace-related topics:
  - Surface conditions where the vehicle will be operated;
  - Composition of loads to be carried and load stability;
  - Load manipulation, stacking, and unstacking;
  - Pedestrian traffic in areas where the vehicle will be operated;



- Narrow aisles and other restricted places where the vehicle will be operated;
- Hazardous locations where the vehicle will be operated;
- Ramps and other sloped surfaces that could affect the vehicle's stability;
- Closed environments and other areas where insufficient ventilation or poor vehicle maintenance could cause a buildup of carbon monoxide or diesel exhaust;
- Other unique or potentially hazardous environmental conditions in the workplace that could affect safe operation;
- The requirements of this section.

#### Refresher Training and Evaluation.

Refresher training, including an evaluation of the effectiveness of that training, shall be conducted to ensure that the operator has the knowledge and skills needed to operate the powered industrial truck safely.

Refresher training in relevant topics shall be provided to the operator when:

- The operator has been observed to operate the vehicle in an unsafe manner;
- The operator has been involved in an accident or near-miss incident;
- The operator has received an evaluation that reveals that the operator is not operating the truck safely;
- The operator is assigned to drive a different type of truck; or
- A condition in the workplace changes in a manner that could affect safe operation of the truck.

An evaluation of each powered industrial truck operator's performance shall be conducted at least once every three years.

#### Avoidance of Duplicative Training.

If an operator has previously received training in a topic specified above, and such training is appropriate to the truck and working conditions encountered, additional training in that topic is not required if the operator has been evaluated and found competent to operate the truck safely.

*Note: This section reduces the training requirement for previously trained operators provided we can demonstrate that the operator knows the material. Since some of the required training is unique to the area where the lift will be operated, we must still cover these areas even if the employee was previously trained.*

#### Certification.

The company shall certify that each operator has been trained and evaluated as required by this paragraph (I). The certification shall include the name of the operator, the date of the training, the date of the evaluation, and the identity of the person(s) performing the training or evaluation.

### **ASBESTOS POLICY**

Talisen Construction Corporation personnel are strictly forbidden from working in or near asbestos. Should asbestos be suspected or detected, all work will stop immediately and the property owner or client will be contacted to make determination and address path forward. Talisen Construction

Corporation personnel shall not return to the area until notified in writing that abatement has been completed or the site is cleared.

### **LEAD POLICY**

Talisen Construction Corporation has developed a lead policy to comply with requirements set forth by OSHA. If lead is encountered or if lead is suspected to be present in a work area, the site supervisor will discontinue work in that area and notify Talisen Construction Corporation corporate office. Talisen Construction Corporation will then develop a site-specific written program to mitigate the lead exposure. The responsibility for the enforcement of the site-specific written program procedures is that of the individual site supervisor.

### **WEATHER RELATED PREVENTION PROGRAM**

#### Heat Illness Prevention

##### Purpose/Scope

The purpose of this program is to ensure all employees are protected from heat illness while working on job tasks where environmental risk factors for heat illness are present and to establish the requirements for working in such an environment.

##### Definitions

Acclimatization – The temporary adaptation of the human body to work in the heat will occur gradually as the person is exposed to it. Acclimatization peaks in most people within four to fourteen days of regular work for at least two hours per day in the heat.

Heat Illness – Refers to a serious medical condition resulting from the body’s inability to cope with a particular heat load and includes heat cramps, heat exhaustion, heat syncope and heat stroke.

Environmental Risk Factors for Heat Illness – Working conditions that create the possibility heat illness could occur, including air temperature, relative humidity and radiant heat from the sun and other sources, conductive heat sources such as the ground, air movement, workload severity and duration. Talisen Construction Corporation shall require employees to wear protective clothing and personal protective equipment.

Personal Risk Factors for Heat Illness – This includes risk factors such as an individual’s age, degree of acclimatization, health, water consumption, alcohol consumption, caffeine consumption, and use of prescription medications that affect the body’s water retention or other physiological responses to heat.

Potentially Impacted Employees – Employees whose job tasks expose them to environmental risk factors for heat illness.

Preventative Recovery Period – A period of time to recover from the heat in order to prevent heat illness from occurring.

Shade – The blocking of direct sunlight. Canopies, umbrellas and other temporary structures or devices may be used to provide shade. One indicator that sun blockage is sufficient is when objects

do not cast a shadow in the area of blocked sunlight. Shade is inadequate when heat in the area of shade defeats that purpose of shade, i.e. to allow the body to cool. For example, a car sitting in the sun does not provide acceptable shade to a person inside it, unless the car is running with air conditioning.

### Responsibilities

#### Supervisors:

- a. Identify and maintain records of all tasks/employees that are required to work outdoors where potential heat illness could occur.
- b. All affected employees shall receive proper training on heat illness prevention and comply with all appropriate procedures.
- c. Maintain training records.
- d. Ensure adequately clean, cool, potable water and shade are available at the job site when the environmental risk factors for heat illness are present.
- e. Supply of water must be checked every 30-60 minutes to ensure accessibility to water is available at all times. When contained drinking water levels drops below 50%, the water shall be replenished immediately; or water levels should not fall below a point that will interfere with adequate replenishment.
- f. Disposable/single use drinking cups shall be provided to employees, or provisions shall be made to issue employees their own cups each day.
- g. Noise making devices, such as air horns, may be used to remind employees to take their water break.
- h. Place water as close to the work area as possible for consumption.
- i. Ensure adequate shading is available for employees suffering from heat illness or a preventative recovery period is provided for a period of not less than 5 minutes.
- j. Include heat illness prevention (water, shade, acclimatization, hazard recognition, prompt medical attention) as part of the daily JSA format to discuss the requirements of this program needed on site.
- k. Supervisors shall continuously check all employees and stay alert to the presence of heat related symptoms.
- l. Contact Public Safety at 911 or appropriate number (supervisors required to carry a cell phone at all times) in the event medical assistance is required.
- m. Check the daily heat index to look for heat waves during summer months.

#### Employees:

- a. Awareness and compliance with all appropriate heat illness prevention procedures while performing assigned duties.
- b. Employees are ultimately responsible for drinking adequate amounts of hydrating fluids when the environmental risk factors for heat illness are present.
- c. Employees are also encouraged to report low levels or dirty water to their supervisor immediately.
- d. Ensure access to a shaded area is available to recover from heat related symptoms.
- e. Inform their supervisor if shade and/or water are inadequate.
- f. Report symptoms of heat related illness promptly to their supervisor.
- g. Contact Public Safety at 911 to request emergency medical services in the event medical assistance is required.

## Cold Weather Injury and Illness Prevention

### Purpose/Scope

The purpose of this program is to ensure all employees are protected from cold related injury and illness while working on job tasks where environmental risk factors for cold weather are present and to establish the requirements for working in such an environment.

### Definitions

Wind Chill Index – The “wind chill index” was developed to describe the relative discomfort/danger resulting from the combination of temperature and wind speed.

Cold Injury – Refers to a serious medical condition resulting from the body’s inability to cope with cold temperatures and exposure to the human body and extremities.

Preventative Recovery Period – A period of time to recover from the cold in order to prevent cold injury and illness.

### Environmental Risk Factors

Working conditions that create the possibility of cold injury and illness could occur are air temperature, relative humidity, exposure, workload severity and duration. Talisen Construction Corporation shall require employees to wear protective clothing and personal protective equipment to protect themselves from the elements.

### Personal Risk Factors

This includes risk factors such as the individual’s age, degree of acclimatization, health, water consumption, alcohol consumption, caffeine consumption and use of prescription medications that affect the body’s water retention or other physiological responses to cold temperatures.

### Responsibilities

#### Supervisors:

- a. Identify and maintain records of all tasks/employees that are required to work outdoors where potential cold injury and illness could occur.
- b. All affected employees shall receive proper training on cold injury and illness prevention and comply with all appropriate procedures.
- c. Ensure proper hydration is available at the job site when the environmental risk factors for cold injury and illness are present.
- d. Supply of water must be checked every 30-60 minutes to ensure accessibility to water is available at all times. When contained drinking water levels drops below 50%, the water shall be replenished immediately; or water levels should not fall below a point that will interfere with adequate replenishment.
- e. Disposable/single use drinking cups shall be provided to employees, or provisions shall be made to issue employees their own cups each day.
- f. Noise making devices, such as air horns, may be used to remind employees to take their water break or to take a warm up break from the elements.
- g. Place water as close as possible to the work area for consumption.

- h. Ensure adequate heat and shelter is available to remove employees from exposure to cold weather elements.
- i. Supervisors shall continuously check all employees and stay alert to the presence of cold related symptoms.
- j. Contact Public Safety at 911 or appropriate number (supervisors required to carry a cell phone at all times) in the event medical assistance is required.
- k. Check the wind chill index to look for potential hazardous conditions and limitations.

Employees:

- a. Awareness and compliance with all appropriate cold injury and illness prevention procedures while performing assigned duties.
- b. Employees are ultimately responsible for dressing properly and drinking adequate amounts of hydrating fluids when the environmental risk factors for cold injury and illness are present.
- c. Employees are also encouraged to report low levels or dirty water to their supervisor immediately.
- d. Ensure access to a heated and sheltered area is available to recover from the cold related symptoms.
- e. Inform their supervisor if heat and/or water is inadequate.
- f. Report symptoms of cold related illness promptly to their supervisor.
- g. Contact Public Safety at 911 or appropriate number (supervisors required to carry a cell phone at all times) in the event medical assistance is required.

**SAFETY PROGRAM EVALUATION**

The Program Administrator will be responsible for ensuring the safety program is reviewed at least once during the first year after implementation and then at least annually thereafter.

The review will be to ensure that the written plan is appropriate for the company at the time of the review and for any anticipated future changes. The Program Administrator or designee will be required to provide written notice that the review was conducted and communicate changes, suggested modifications, and improvements.

**RECORDKEEPING**

The program administrator will ensure the maintenance of all Safety Program records, for the listed periods, including:

- |  |                      |
|--|----------------------|
| 1. New Employee Safety Orientation forms | length of employment |
| 2. Code of Safe Practices Receipt        | length of employment |
| 3. Disciplinary actions for safety       | 1 year               |
| 4. Safety inspections                    | 2 years              |
| 5. Safety meeting reports                | 2 years              |
| 6. Safety Contact Reports                | 2 years              |

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|--|---------|
| 7. Accident investigations                   | 5 years |
| 8. Federal or State OSHA log of injuries     | 5 years |
| 9. Inventory of Hazardous Materials (if any) | forever |
| 10. Employee exposure or medical records     | forever |

Records are available for review at the main office.

### **WORKING ALONE POLICY**

#### Definition of Working Alone:

Individuals are alone at work when on their own; they cannot be seen or heard by another worker, cannot expect a visit from another worker or member of the public for some time and/or where assistance/emergency help is not readily available when needed. It is important to take into account the wide variety of situations where workers work alone, considers the hazards specific to their workplaces and develop and adopt effective health and safety procedures and policies that address these hazards. Risks to workers may be higher when they are working alone. A fall, exposure to dangerous chemicals or an assault can have very different consequences if a worker is alone than if the victim has co-workers or capable assistants in the immediate vicinity. The content of the working alone policy is to set a minimum standard for the safety of workers who work alone, particularly those who have a high degree of risk inherent in their work.

#### When Working Alone is NOT Permitted:

1. Tower climbing, erection, maintenance, equipment installation, construction and inspection.
2. "Live" AC or DC electrical work.
3. Night shift work (10:00pm-5:00am).
4. Working in Confined Space as defined by OSHA, ANSI, Cal/OSHA, etc.
5. Trench/Excavation work.
6. Any use of heavy equipment including aerial lift, forklift, bobcat, excavator, back hoe, etc.
7. Using any machine or power tool that could cause a critical injury.
8. Welding operations.
9. When use of supplied air respiratory equipment or self-contained breathing apparatus is required.
10. When using quick-acting acutely toxic material as described by its Material Safety Data Sheet (MSDS).
11. Any time fall protection of any type is required.
12. Tasks, which based on the risk assessment conducted by the supervisor in consultation with the employee and safety manager are deemed to require more than one person.
13. When employees are at risk of violent attack due to known dangerous area.

#### When Working Alone is Permitted:

1. Bid walk
2. Site walk
3. Ground audit
4. Integration work

5. Sector expansion work installation
6. Alarm trouble shooting
7. Tasks, which based on the risk assessment conducted by the supervisor in consultation with the employee and safety manager is deemed acceptable.

### **SUBCONTRACTORS RESPONSIBILITY**

The Subcontractor is required to:

1. Adhere to and comply with Talisen Construction Corporation policies and procedures, state and local regulations and applicable provisions of the OSHA (Occupational Safety and Health Administration) Part 1926 Safety and Health Regulations for Construction and 1910 General Industry.
2. Subcontractors are required to instruct their employees in the recognition and avoidance of unsafe conditions and the regulations applicable to his/her work environment, as well as control or eliminate any hazards or other exposure to illness or injury.
- a. The following violations are grounds for IMMEDIATE REMOVAL of a subcontractor or subcontractor employees from a job site.
  1. Disregard for safety and health rules and regulations, any violation or refusal to follow safety and health regulations.
  2. Engagement of behavior that is potentially harmful to oneself or others, including fighting (physical contact), or horseplay.
  3. Theft.
  4. Drugs or alcohol (possession or under the influence)
  5. Willful destruction of property.
  6. Possession of firearm or explosives.
  7. Any act or omission that could inflict or result in bodily harm or death.
- b. Subcontractors shall conduct a weekly safety meeting with its employees. A copy of the written minutes and attendance of each meeting will be given to a Talisen Construction Corporation representative when requested.
- c. Subcontractors and sub-tier contractors shall perform weekly Site Safety Audits of their own and shall all cooperate and participate with Talisen Construction Corporation in the execution of its audits.
- d. Prior to awarding work to any lower tier subcontractor, Subcontractors shall consider the qualifications, training and safety programs including safety programs including safety performance, supervisor qualifications and safety staffing capabilities. Lower tier subcontractors shall meet all minimum requirements as described in this program and per Federal, State and local regulations.
- e. Recognize that employee behavior alone cannot guarantee a safe environment. Subcontractors shall provide a workplace free from recognized hazards and at-risk behaviors.

- f. Adhere to the belief that all employees have the right to work in areas that are free from recognized hazards and at-risk behaviors that either cause, or likely to cause, death or bodily harm.
- g. When required by Talisen Construction Corporation and CFR 29 1926, a copy of any certification, designed by engineer document, proof of certification, or proof of competent person will be submitted to the designated Talisen Construction Corporation representative





**Corporate Injury and Illness Prevention Program**

**ACKNOWLEDGEMENT OF PROGRAM ACCEPTANCE**

Anyone working for Talisen Construction Corporation falls under this Injury and Illness Prevention Program including but not limited to:

Talisen Construction Corporation employees, suppliers, contract workers, subcontractors, their employees, suppliers and contract workers; sub tier subcontractors, their employees, suppliers and contract workers, etc. All recognize compliance with the Talisen Construction Corporation Safety Program Manual – Injury & Illness Prevention Program and does not relieve it of the obligation to identify and address hazards not covered by its terms or the terms of their own company safety program.

All agree it is their responsibility for compliance with all Federal, State and local safety regulations and all manufacturer requirements, whichever is most strict, to ensure the safety of site workers, site visitors and the public. Any company safety program which differs from the safety requirements and processes in this Injury and Illness Prevention Program can only be implemented if it meets or exceeds the requirements contained within. Nothing contained in this Injury and Illness Prevention Program precludes the implementation and application of any companies safety program provisions which meet, exceed or supplement the requirements contained herein.

By signing I acknowledge that I have reviewed and completely understand this Injury and Illness Prevention Program and shall use all applicable safety practices at all times.

Print Name: \_\_\_\_\_

Signed: \_\_\_\_\_ Date: \_\_\_\_\_

Company: \_\_\_\_\_