Arcom

Technical Services Ltd.

Health & Safety manual 2020

Contact us:

Province-Wide Contact Centre

Edmonton
780-415-8690

Other locations
1-866-415-8690
(Toll Free)

Deaf or hearing impaired
- Edmonton 780-427-9999
- Other locations 1-800-232-7215
(Toll Free)

Web Site

www.worksafe.alberta.ca

Getting copies of *OHS Act*, Regulation & Code:

Queen's Printer

www.qp.alberta.ca

Edmonton 780-427-4952

Occupational Health and Safety

http://humanservices.alberta.ca/working-in-alberta/295.html

Call any Government of Alberta office toll-free
Dial 310-0000, then the area code and telephone number you want to reach

Partnerships IN INJURY REDUCTION

Certificate of Recognition

This certificate recognizes that

ARCOM TECHNICAL SERVICES LTD.

In keeping with the principles of Partnerships has:

- developed and implemented an occupational health and safety program and,
- met the standard for Partnerships through an independent evaluation of their health and safety program.

Alberta Construction Safety Association
Certifying Partner

Certificate # 20170530-1845
WCB Industry Code(s): 42124

Ian Hooper
Government of Alberta

Expiry Date: May 30, 2020

Alberta Government

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COMPANY HEALTH AND SAFETY

COMPANY HEALTH AND SAFETY INDEX

Arcom Technical Services Ltd.

Company Health and Safety Policy

Arcom Technical Services Ltd. has developed, and is committed to, a robust and effective health & safety program that protects all employees, property and the public from accidents. Our objective is to utilize this health and safety program to reduce the number of injuries and illnesses to an absolute minimum, becoming a leader in our industry by doing so.

All personnel, including management, employees, sub-contractors and visitors are responsible and accountable for minimizing accidents within the construction projects of our clients. This is accomplished by our commitment to following all Safe Work Practices and Safe Job Procedures that are clearly defined in the Safety Manual.

Arcom Technical Services Ltd. will have a dedicated Safety Administrator responsible for maintaining this health and safety program by ensuring that all policies are in compliance with Occupational Health and Safety (OH&S) standards. In addition, the Safety Administrator will ensure that all COR (Certificate of Recognition) requirements are being met, through such actions as safety orientations, jobsite inspections, training and the review and updating of policies and procedures as they are needed.

Complete participation in this Safety Program is required. Arcom Technical Services Ltd. will provide well maintained equipment, suitable training and fully developed procedures as they are needed. All personnel (managers, employees, sub-contractors and visitors) are responsible for following all procedures, working safely and wherever possible being proactive in improving safety measures.

Arcom Technical Services Ltd. will develop a comprehensive Safety Plan for each worksite. This plan will include, but is not limited to, hazard identification, safety meeting schedule, emergency response plan, fire/explosion procedures and medical/first aid provisions. All personnel, including managers, employees, sub-contractors and visitors, will be orientated to each site they are working on/visiting, and will be made aware of their rights, obligations, responsibilities, and accountabilities regarding health and safety onsite, as laid out by the Safety Plan. The dedicated Safety Administrator will maintain the Safety Plan and ensure it is kept current through site visits and audits.

Our goal is an accident free workplace.

Only through a continuous safety and loss control effort can we accomplish this.

***The safety information in this policy does not take precedence over applicable government legislation, with which all employees should be familiar.**

Signature:	Date:
AJ Smith e-signature	March 25, 2019

Responsibility and Accountability for Health and Safety

Obligations

Management

- Ensure the health and safety of all Arcom Technical Services ltd. personnel (managers, employees, sub-contractors and visitors) that are present at the worksite.
- Provide a "Company Health and Safety Policy". This policy provides a commitment and philosophy that sets levels of expectations for safety performance throughout the corporation.
- Provide information, instructions, and assistance to all personnel to protect their health and safety.
- Understand and enforce the accident prevention policy as well as the Occupational Health and Safety legislation.
- Provide all personnel with an understanding of our accident prevention program as well as relevant Occupational Health and Safety legislation.
- Ensure all established safety policies are always administered and enforced in all areas.
- Ensure that all personnel are aware of their responsibilities and duties under the Occupational Health and Safety Act, as well as any other applicable regulations and codes.
- Maintain overall control and direction of the Safety and Loss Prevention Program.
- Provide all personnel with proper, well-maintained tools and equipment, as well as any specialty PPE that may be required for a job.
- Provide ongoing safety training and education in the form of approved courses, such as first aid, fall arrest, elevated work platform, etc.
- Monitor all departments and projects for maintaining accountability for individual safety performance.

Supervisory Staff

- Provide jobsite orientation to all personnel entering the site.
- Know and apply the company's safety policies and relevant Occupational Health and Safety legislation.
- Ensure that all personnel are educated to work in a safe manner, using all protective devices, and following all procedures required by Arcom Technical Services ltd., and by Occupational Health and Safety legislation to protect their health and safety.
- Warn all personnel of any potential or actual dangers, and advise them how to isolate, prevent, and/or remove such dangers.
- Arrange for medical treatment, when required, in the case of injury or illness, including transportation to a doctor or hospital when necessary.
- Report all accidents immediately, investigate all accidents fully, and advise management on how to prevent similar accidents in the future.
- Carry out regular inspections of the workplace to ensure a safe and healthy environment.
- Provide a good example for employees by always directing and performing work in a safe manner.
- Maintain a high housekeeping standard and assign specific responsibilities to individuals to foster good housekeeping practices.
- Be knowledgeable of and responsible for complying with all regulations, laws and codes, and enforce all established safety regulations and work methods.

WORKERS RESPONSIBILITIES:

- Read, understand, and comply with Arcom Technical Services Ltd. safety policy, safe work practices, safe job procedures, and rules, as well as all Occupational Health and Safety legislation.
- Understand and abide by all company Rules and Regulations, accepting our standard of health and safety.
- Wear the safety equipment, personal protective devices and clothing required by OH&S Regulations and Arcom Technical Services Ltd.
- Notify their supervisor(s) of any unsafe conditions or acts that may be of danger to other workers or themselves.
- Report all accidents, incidents, near misses and/or injuries to their supervisor(s) as soon as possible.
- Take every reasonable precaution to protect the safety of other workers, the public, and themselves.

SUB-CONTRACTORS/SUPPLIERS:

- Employers on the worksite are responsible for the health and safety of their employees, as regulated by all applicable acts and regulations. Sub-Contractors/suppliers are obligated to comply with all laws, regulations and codes.
- Actively promote safe working performance on the part of their employees.
- always Maintain good housekeeping practices and orderliness.
- Ensure that all employees are equipped with, and trained in, the proper use of Personal Protective Equipment (PPE) as required by Occupational Health and Safety regulations.
- Ensure that the public is protected from damage and/or injury due to the work the sub-contractor is doing (proper barricading, signage and other safety precautions must be followed.)
- Every supplier shall ensure, as far as it is reasonably practicable for the supplier to do so, that any tool, appliance or equipment that the supplier supplies is in safe operating condition.
- Every supplier shall ensure that any tool, appliance, equipment, designated substance or hazardous material that the supplier supplies complies with Occupational Health and Safety standards, as well as all other applicable regulations and codes.
- Every sub-contractor who directs the activities of any other sub-contractors involved in work at the worksite shall ensure, as far as it is reasonably practicable to do so, that the sub-contractor complies with Occupational Health and Safety standards, as well as any other applicable regulations and codes being implemented at that worksite.
- Report all accidents, incidents, near misses and/or injuries to Arcom Technical Services Ltd. as soon as possible. Conduct investigations where incidents involving personal injury, damaged equipment or property occur. This information must be passed on to Arcom Technical Services Ltd.

VISITORS:

- Report to the project office and obtain permission for entry onto the site. This may require completing a site safety orientation.

- Wear all Personal Protective Equipment (PPE) required for the site, ensuring it is in good condition, free of defects and alterations.

- Comply with the safety policies of Arcom Technical Services Ltd., Occupational Health and Safety standards, as well as any other applicable regulations and codes being implemented at that worksite.

- Report all accidents, incidents, near misses and/or injuries to Arcom Technical Services Ltd. as soon as possible.

PERSONAL RIGHTS AND DUTIES

WHAT PERSONAL RIGHTS AND DUTIES DO I HAVE UNDER OCCUPATIONAL HEALTH AND SAFETY LAWS IN CANADA?

Everyone who works has rights and duties under the workplace health and safety law in Canada. This law is called the Occupational Health and Safety (OH&S) Act.

RIGHTS OF EMPLOYEES

Under this legislation, employees have two important rights and one obligation:

1. The right to know
   All employees have a right to know what hazards are present on the job, and how those hazards can affect them. They usually learn about this in health and safety training, including WHMIS.
2. The right to participate
   All employees have a right to take part in health and safety activities, for example, they can choose to be a health and safety representative. They also have a right to report unsafe practices and conditions.
3. The obligation to refuse dangerous work
   All employees must refuse work that is dangerous to themselves or to co-workers. In this case, they follow specific procedures.

DUTIES OF EMPLOYERS

It is the employer's responsibility to:

1. Take every reasonable action to ensure the workplace is safe
2. Train employees on how to work safely with hazardous materials. They need to know how to use, store, handle and dispose of them. They also need to know what to do in an emergency.
3. Ensure PPE (Personal Protective Equipment) is worn safely and properly and ensure all equipment is used safely and properly.
4. Supply specialized PPE
5. Report all critical injuries right away.
6. Appoint a health and safety representative or set up a joint health and safety committee.

For more information go to:
www.ccohsca.ca

HEALTH AND SAFETY REPRESENTATIVE

Arcom employees a Health and Safety Administrator (HSA) to manage the Health and Safety department. The Health and Safety Department oversees all aspect of work place health and safety on behalf of Arcom Technical Services. The HSA is trained as per the COR requirements set forth by Occupational Health and Safety of Alberta, The Alberta Construction Safety Association and WCB.

DUTIES

1. Assist management in the administration, implementation and maintenance of a health & safety management system.
2. Identify and review various health & safety concerns specific to the worksite.
3. Communicate effectively with government, management and workers regarding health & safety, on and off the job.
4. Maintain updated safety training requirements
5. Ensure staff and workers are updated and current on all safety training (EWP training, CPR, etc.)
6. Develop and implement policies: ensure policies and procedures are in place and enforced. Inspections: inspect the workplace for potential hazards, identify potential hazards, assess the risks and report potential hazards.
7. Inspect workplaces to ensure equipment, materials, and production processes do not present a safety and health hazard
8. Investigate complaints related to health and safety
9. Enforce health and safety laws and regulations
10. Review and make decisions regarding situations where a worker has refused to work on the grounds that danger exists or that the work will cause danger to the worker
11. Provide advice regarding the development of safe and healthy practices
12. Encourage managers, supervisors and employees to participate in occupational health and safety programs
13. Investigate workplace fatalities, serious injuries and near misses.
14. These duties require health and safety officers to have a thorough understanding of legislation relating to safety standards and the ability to advise corrective action and facilitate change to improve the health and safety culture of workplaces. Health and safety officers also must keep informed about changes in technology.
15. For information about health and safety officers employed by companies, see the Occupational Health and Safety Advisor occupational profile.

TRAINING

1. Alberta Construction Safety Association NCSO or HAS

Compulsory:

a. Alberta Legislation Awareness
b. Principles of Health & Safety Management
c. Auditor Training Program (NCSO registrants must achieve Certified Auditor or Peer Auditor Certification)
d. Leadership for Safety Excellence (LSE Proficiency level certified)
e. WHMIS 2015 Train-the-trainer
f. Construction Safety Administration
g. Basic Instructional Techniques
h. Worksite Investigation Basics
i. Communication & Ethics for the Safety Leader
j. Standard First Aid
k. An industry safety orientation (any one of the following):
    i. Construction Safety Training System (CSTS-09)
    ii. Roadbuilders Construction Safety Training System (RSTS)
    iii. Pipeline Construction Safety Training (PCST)
l. Electrical Safety Training System (ESTS)

Elective (2)

a. Alberta Temporary Traffic Control
b. Alberta Temporary Traffic Control – Field Application
c. Alcohol, Drugs and Safety
d. Confined Space Entry / Monitor (OSSA accredited)
e. Contractor Management
f. Defensive Driving – 3 Demerits
g. Effective Claims Management
h. Fall Protection End-user (OSSA accredited)
i. Fall Protection Planning
j. Flagger Train-the-Trainer
k. Ground Disturbance 201
l. Hazard Management
m. Scaffolding Awareness
n. Silica Awareness
o. TDG Train-the-Trainer
p. Working Around Powered Mobile Equipment

2. In Alberta OHS has an online course: https://www.ccohs.ca/distributors/alberta/

JOINT HEALTH AND SAFETY COMMITTEE

DEVELOPED BY: SHELLEY SMITH

ARCOM'S JOINT HEALTH AND SAFETY COMMITTEE

The purpose of Arcom's joint Health & Safety Committee is to work cooperatively with the employer and employees in identifying and resolving health and safety issues within Arcom and on the job site through our Health and Safety program and with the newly established joint health and safety committee. Our goal is to prevent occupational injuries and diseases in the workplace.

The Joint Health and Safety Committee (JHSC) has been developed in accordance with the requirements of the Alberta OHS Act and will make recommendations for defined health and safety activities within or originating from Arcom Technical Services and it's job sites.

The goal of the committee is to work cooperatively with managers and workers to ensure that all Arcom Technical Services employees have the right to meaningful participation in health and safety activities pertaining to their work and worksite, including the ability to express health and safety concerns. Through representation from both the workers and management, the Joint Worksite Health and Safety Committee will exchange information on health and safety issues & matters and will work to resolve any health and safety concerns in a timely manner. We are committed to Arcom's safety program to prevent occupational injuries and diseases in the workplaces.

Overview

Work site health and safety committees and representatives bring supervisors and workers together to discuss and address health and safety related concerns in the workplace.
They allow workers to participate in occupational health and safety and support the three basic rights of workers:

- the right to know
- the right to participate
- the right to refuse dangerous work

REQUIREMENTS

Employers must have a health and safety committee or representative for projects that are expected to last 90 days or more, or for any other work as designated by an OHS director.

Starting June 1:

- larger employers (20 or more workers at a work site) must have a joint work site health and safety committee
- smaller employers (5-19 workers at a work site) must have a health and safety representative
- employers can use an alternate approach to meeting these requirements with approval from an OHS director

RESOURCES:

- *Occupational Health and Safety (OHS) Act*
- OHS director work site designation letter - June 1, 2018 (PDF, 28 KB)
- Do I need a committee or representative? (PDF, 286 KB)
- Do you need a committee or representative at multiple work sites? (PDF, 378 KB)
- Sign up: Health and safety committee webinar

Committee Membership

1. The committee chair will be the acting Health and Safety Administrator or Officer – NCSO/HAS
2. The committee shall consist of at least 4 members.
3. The committee must consist of worker representatives and employer representatives
4. At least half of the members must be worker representatives.
5. The committee will meet once a month
6. The chair will take meeting minutes

The employer representatives must be selected by the employer from among persons who exercise managerial functions for the employer and, to the extent possible, who do so at the workplace for which the joint committee is established.

The joint committee plays an important role in your occupational health and safety program, giving workers and employers a way to work together to identify and find solutions to workplace health and safety issues. The joint committee has the following specific duties and functions:

Committee Roles

The role of the committee and representative is to advise and assist, not assume managerial responsibilities for health and safety in the workplace.

Committees and representatives help:

1. employers respond to health and safety concerns of workers
2. develop health and safety policies and safe work procedures
3. develop and promote education and training programs
4. participate in work site inspections and investigations
5. investigate worker reports of dangerous work and refusal to work
6. with health and safety orientations for new employees

Employers must:

7. provide adequate resources, time and training to help committees and representatives function effectively
8. hold meetings and carry out duties and functions during normal working hours
9. post the names and contact information of committee members and representatives where it can be seen by all workers

Employer Members

Shelley Smith, HAS (780) 919-5851
Trevor Arden, Journeyman QC Manager (780) 887-9757

Worker Members:

Phil Post, Journeyman (780) 919-2111
Justin La Pointe, Journeyman (780) 919-4524
Johnathon Van Capelle, 4th year electrician (780) 803-5991

Recorder:

Shelley Smith, HSA – Chair

HAZARD ASSESSMENT AND CONTROL

HAZARD ASSESSMENT & CONTROL INDEX

HAZARDS

HAZARD ASSESSMENT – DEFINITION

HAZARD:	Any circumstance that poses the risk of an incident and/or injury.
HAZARD ASSESSMENT:	A thorough examination of an operation (job site, shop, etc.) for identifying what actual and potential hazards exist.
INSPECTION:	An observational tour of the workplace for the specific purpose of identifying hazardous acts and hazardous conditions, and for determining the levels of compliance with established safe work practices, procedures, and company rules.
INCIDENT:	Any unplanned or unwanted event, which results in damage to property/equipment or injury to a person.
NEAR MISS:	Any unplanned or unwanted event which could have resulted in an incident but didn't.
AUDIT:	A comprehensive examination and evaluation of an organizations Health & Safety management system

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A HAZARD ASSESSMENT MUST BE CONDUCTED PRIOR TO THE SETTING UP OF A NEW PROJECT.

HAZARD ASSESSMENT

Arcom Technical Services Ltd. employees and subcontractors use a variety of material and work processes while conducting their day to day business. From the time of tender the project manager shall review the project scope and along with the superintendent complete a hazard assessment (if applicable) for the project to ensure the proper allowances are provided to address all safety related concerns for that project.

At the start of every project a pre-job safety planning session will be conducted to systematically identify, control, evaluate and communicate all known or potential safety hazards.

Arcom Technical Services site superintendents / supervisors are responsible for the following;

1. Perform hazard assessments in accordance with Occupational Health & Safety Act Part 2, as cited below, and complete the hazard assessment checklist prior to commencing work on site.

PART 2 – HAZARD ASSESSMENT, ELIMINATION AND CONTROL

7 – Hazard Assessment

1. An employer must assess a work site and identify all existing or potential hazards before work begins.
2. An employer must prepare a report of the results of a hazard assessment and the methods used to control or eliminate the hazards identified.
3. An employer must ensure that the date on which the hazard assessment is prepared or revised is recorded on it.
4. An employer must ensure that the hazard assessment is repeated:
   - At reasonably practicable intervals to prevent the development of unsafe and unhealthy working conditions,
   - When a new work process is introduced,
   - Before the construction of a new work site.
5. Institute corrective measures for all identified hazards through:
   - Engineering / administrate controls or incorporate personnel protective equipment (PPE) that meets the requirements of the job site,
   - Record all corrective measures on the Workplace Hazard Assessment Corrective Action form.
6. List hazardous materials on the Hazard Assessment Form and ensure that current Material Safety Data Sheets are available on the job site.
7. File paperwork accordingly.

Every workplace consists of four major components:

a. The people (employees, visitors, clients, suppliers, subcontractors, etc.).
b. The environment they work in.
c. The materials they work with.
d. The equipment/tools they use.

When conducting a Hazard Assessment, all four of these components must be examined, sub-divided and evaluated to see what risks are present. Ask yourself the following questions to identify potential hazards.

People

Workers

- Do workers have the proper training and skills for the assigned work, and knowledge of associated hazards?
- Are workers competent, knowledgeable and motivated?
- Are workers physically and emotionally stable?
- Could workers be caught in between or on objects?
- Could workers be struck by objects?
- Could workers fall from heights, into openings/excavations, slip or trip on objects or surfaces?
- Could workers suffer sprain, strain, and injury from pushing, pulling, or lifting?
- Could workers suffer illness or industrial disease cause by an unhealthy work environment?
- Do workers adhere to established safe work practices and procedures?
- Is the workers' performance influenced by drugs or alcohol?

Management

- Is management committed to the organization's Health and Safety Program?
- Is orientation conducted for new or transferred workers?
- Does proper supervision of workers take place?

Visitors

- How frequently are visitors on site?
- Is orientation conducted for visitors to the work place?

Suppliers

- Are there purchasing controls in effect?

Sub-Contractors

- Are there safety pre-qualification or requirements?
- Are there policies regarding sub-contractor's safe work procedures?

Environment

- Are there potential problems with housekeeping?
- Are the workers exposed to extreme cold, heat, or adverse weather conditions?
- Is excessive vibration or noise a problem?
- Is there insufficient lighting?
- Is exposure to harmful radiation possible?
- Is there dust, vapors, fumes or mist in the air?
- Does the work environment pose harm to the public?

Materials

- What harmful agents are workers exposed to?
- Are workers exposed to chemicals (solvents, gases, caustics)?
- Are Workplace Hazardous Materials Information System (WHMIS) and Transportation Dangerous Goods (TDG) regulations in place?
- Are there electrical hazards (grounding, arcing)?
- Are biological hazards present (bacterial, suffocation)?
- Are purchasing, shipping and receiving policies in place?
- What specific problems arise involving material handling?
- Are materials stored safely?

Equipment/Tools

- Is there a purchasing policy in place for new equipment/tools, and do these meet legislative requirements?
- Is safety equipment and personal protective equipment (PPE) provided?
- Are safety equipment and PPE being used?
- Is the right tool for the job being used, and is it being used correctly?
- Is training provided to workers for the correct use of equipment/tools?
- Are suitable equipment and tools provided; are they in good condition and of good quality?
- Are equipment and tools inspected on a regular basis?
- Are there proper storage facilities for equipment/tools?
- Is there a maintenance program in place?
- Is there a safe work permit system?
- Is there a lock-out/tag-out system?
- What equipment or tool emergencies are likely to occur?
- How could equipment/tools affect safety, quality and productivity?

Reference: OH & S Act, Regulation and Code Part 2

CONDUCTING A HAZARD ASSESSMENT

The first ranking estimates the **possibility** of the accident occurring:

- Assemble the people that will be involved.
- Discuss possible hazards with employees.
- Tour the entire operation.
- Look for possible hazards originating from environment, material, equipment and people.
- Keep asking, "WHAT IF?"
- Mark on the checklist all items that need attention.
- Review the findings with supervisors/workers and solicit their input for control measures.
- Rank the items on a "worst first" basis. The first ranking estimates the **severity** of the problem if the potential accident were to occur:

1. **Imminent Danger** (ex. Causing deaths, widespread occupational illness, loss of facilities).
2. **Serious** (ex. severe injury, serious illness, property and equipment damage.)
3. **Minor** (ex. Non-serious injury, illness or damage.)
4. **O.K**. (ex. Minor injury, requiring first aid or less.)
5. **Not Applicable** (N/A)

The second ranking estimates the **probability** of the accident occurring:

A. Probable- likely to occur immediately or soon
B. Reasonably probable- likely to occur eventually
C. Remote- could occur at some point
D. Extremely remote- unlikely to occur

Each hazard is assigned both ranking, and the result determines priority in terms of corrective action. A hazard ranked 1-A obviously is more important than one ranked 1-D; 2-B come ahead of 3-A and so on.

Take corrective action and make recommendations for the control of hazards (ex. Safe Work Practices and Safe Job Procedures, Rules, Administrative and Engineering Controls, and Personal Protective Equipment, etc.)

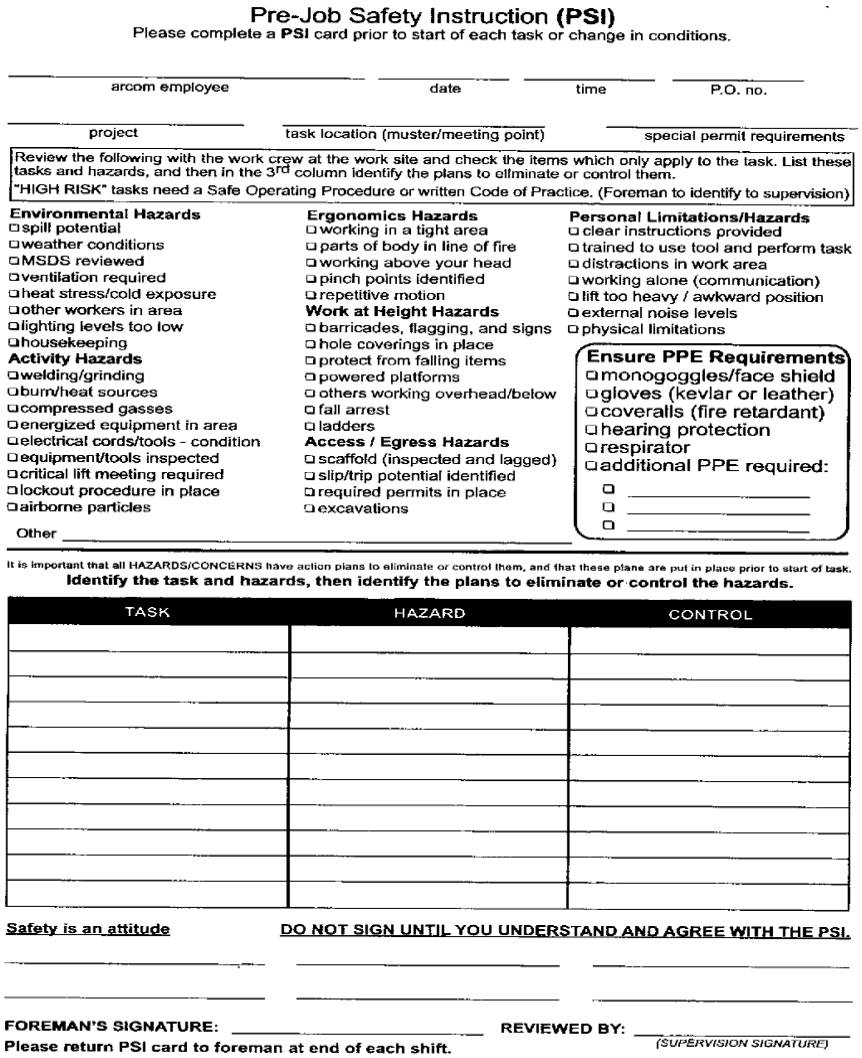
- Monitor and follow-up to ensure corrective action is taken

Field Level Hazard Assessment (FLHS)

formally Pre-Job Safety Instruction (PSI)

A PSI must be filled out prior to the commencement of any work you need to do. The following are instructions on how you should fill out a PSI.

- Complete the top portion with all relevant information (your name, date, site, job number, etc.).
- Inspect the area you will be working in and consider the tasks you will be doing. Look for any potential or actual hazards that exist in the area and think about what hazards will arise from doing the actual work through your own actions. Check all hazards that apply from the list provided.
- Write down the specific tasks you will be performing, and the hazards that are associated with those tasks (based on the hazards you checked off earlier). Then write what you will do to control those hazards to ensure that an incident will not occur because of those them.
- Print and sign your name in the space provided at the bottom.
- Have your supervisor/foreman review it and sign it as well.
- always Keep your PSI on you. Any time your task changes, or a new hazard has presented itself, you must update it to reflect your current situation.
- At the end of the day return it to your supervisor/foreman so that they can submit it to the safety Administrator.



Pre-Job Safety Instruction (PSI)

Please complete a **PSI** card prior to start of each task or change in conditions.

arcom employee | date | time | P.O. no.

project | task location (muster/meeting point) | special permit requirements

Review the following with the work crew at the work site and check the items which only apply to the task. List these tasks and hazards, and then in the 3rd column identify the plans to eliminate or control them.
"HIGH RISK" tasks need a Safe Operating Procedure or written Code of Practice. (Foreman to identify to supervision)

Environmental Hazards
- ☐ spill potential
- ☐ weather conditions
- ☐ MSDS reviewed
- ☐ ventilation required
- ☐ heat stress/cold exposure
- ☐ other workers in area
- ☐ lighting levels too low
- ☐ housekeeping

Activity Hazards
- ☐ welding/grinding
- ☐ burn/heat sources
- ☐ compressed gasses
- ☐ energized equipment in area
- ☐ electrical cords/tools - condition
- ☐ equipment/tools inspected
- ☐ critical lift meeting required
- ☐ lockout procedure in place
- ☐ airborne particles

Ergonomics Hazards
- ☐ working in a tight area
- ☐ parts of body in line of fire
- ☐ working above your head
- ☐ pinch points identified
- ☐ repetitive motion

Work at Height Hazards
- ☐ barricades, flagging, and signs
- ☐ hole coverings in place
- ☐ protect from falling items
- ☐ powered platforms
- ☐ others working overhead/below
- ☐ fall arrest
- ☐ ladders

Access / Egress Hazards
- ☐ scaffold (inspected and lagged)
- ☐ slip/trip potential identified
- ☐ required permits in place
- ☐ excavations

Personal Limitations/Hazards
- ☐ clear instructions provided
- ☐ trained to use tool and perform task
- ☐ distractions in work area
- ☐ working alone (communication)
- ☐ lift too heavy / awkward position
- ☐ external noise levels
- ☐ physical limitations

Ensure PPE Requirements
- ☐ monogoggles/face shield
- ☐ gloves (kevlar or leather)
- ☐ coveralls (fire retardant)
- ☐ hearing protection
- ☐ respirator
- ☐ additional PPE required:
  - ☐ _____
  - ☐ _____
  - ☐ _____

Other _____

It is important that all HAZARDS/CONCERNS have action plans to eliminate or control them, and that these plans are put in place prior to start of task.

Identify the task and hazards, then identify the plans to eliminate or control the hazards.

TASK	HAZARD	CONTROL

Safety is an attitude — **DO NOT SIGN UNTIL YOU UNDERSTAND AND AGREE WITH THE PSI.**

FOREMAN'S SIGNATURE: _____ **REVIEWED BY:** _____ *(SUPERVISION SIGNATURE)*

Please return PSI card to foreman at end of each shift.

STEP #2 WORKPLACE HAZARD ASSESSMENT CORRECTIVE ACTION

Company Name:

Assessment Location(s): | Time/Date:

Department/Areas Covered:

Assessment Team: Name _____ Position _____

_____ _____

_____ _____

FOLLOW-UP

ITEM #	PRIORITY	RECOMMENDED ACTION	ACTION TAKEN DATE/TIME	BY WHOM

COPIES TO: (FOR ACTION) (FOR INFORMATION):

Manager's Signature: | Date:

STRATEGIES FOR CONTROLLING HAZARDS

Recognizing and evaluating the risks associated with hazards in the workplace are the first steps in Hazard Control. Actions or methods for controlling these potential hazards must be developed and implemented to eliminate the risks. This is the critical step in Hazard Control.

These are a number of options available to personnel in order to control risk. These options include the following "Five Approaches":

- Elimination
- Substitution
- Engineering Controls
- Administration Controls
- Personal Protective Equipment

ELIMINATION

- The ultimate control measure is to eliminate the workplace condition or act presenting the hazard.

For example:

- Remove a fire hazard by using non-combustible materials instead of combustible.
- Eliminate a manual handling task by using a mechanical lifting device.
- Eliminate protruding objects.
- Repair a leak and eliminate toxic fumes.
- Remove and dispose of defective ladders.

Eliminating a hazard is obviously the best method of control; however not all hazards can be eliminated. The next best option is Substitution.

SUBSTITUTION

- Substituting one chemical or piece of equipment for a less hazardous one, or a particular work activity with a safer method, has proven to be very effective as Hazard Control.

Examples of Substitution may include the following:

- Implementing purchasing controls (e.g. Purchasing less toxic materials, or tools and equipment with improved safety features) (This is also considered an Administrative Control)
- Replacing the need for electrical cords running across walkways by installing more outlets.
- Replacing ineffective personal protective equipment (PPE) with more effective equipment.
- Replacing a worker activity with a machine

Engineering Controls

- Engineering designs and control measures should be made at a conceptual stage of a project.

Examples are:

- Installing security fences to control access/egress.
- Installing additional lighting.
- Limiting worker's exposure to a hazard by using automated (remote) or mechanical devices.
- Installing screens in welding areas to protect people from hazards associated with arc welding.
- Pre-designing scaffolding systems to ensure proper erection, maintenance and dismantling.
- Installing machine guards around moving gears/ pulleys, sharp edges, electrical devices and hot surfaces.
- Installing monitoring and warning devices
- Installing ventilation systems to remove toxic fumes/vapors.
- Designing and laying out work areas to eliminate or reduce the level of hazard.

Administrative Controls

Engineering controls are not always practical, administrative controls are used. These controls are more desirable than Personal Protective Equipment and should be one the controls implemented. However, administrative controls involve directing people and may therefore present drawbacks. When workers' health and safety depends on strict enforcement and adherence to policies, procedures, supervision, training and constant motivation, there must be a strong commitment from management to the health and safety program.

Administrative controls may include the following:

- Measuring worker's performance
- Establishing procedures for the ongoing maintenance of tools, equipment and facilities.
- Establishing good housekeeping practices.
- Developing and implementing safe work practices, procedures and work permits.
- Monitoring all aspects of the health and safety program.
- Hiring practices.
- Scheduling hazardous activities when there are only a few workers on the worksite.
- Rotating workers to reduce exposure to a particular hazard.
- Training and educating workers.
- Establishing regular formal safety inspections and safety tours.

Personal Protective Equipment

When Elimination, Substitution, Engineering or Administrative controls fail to provide the required protection, Personal Protective Equipment (PPE) should be considered only as **a last line of defense or as back-up protection**. PPE may be used as a supplement to these other controls, but not as a substitute for them.

In using PPE as a control method, the supervisor must consider the following:

- Determine where/when PPE is required.
- Determine which type of PPE is suitable.
- Train employees on the proper care and use of PPE.
- If PPE is required, develop policy and enforce its use.
- Inspect all PPE regularly for defects and replace equipment when necessary (document).

There are situations in which the use of personal protective equipment is vital to hazard control; for example:

- When carrying out normally hazardous operations such as welding, spraying or working in confined spaces.
- In emergencies or when conducting activities which have unknown hazard levels.

In addition, supervisors should familiarize themselves with the requirements of PPE as outlined in Part 18 of the Alberta Occupational Health and Safety Regulation and Code.

The five previously listed controls options are widely used as Hazardous Control methods. Often, a combination of control methods will be required to eliminate or sufficiently reduce the risk of hazards to an acceptable level.

FORMAL HAZARD ASSESSMENTS

ARCOM JOB LIST/ TASK LIST (CRITICAL)

Individual JHA's for each task are listed on "A" drive of the server

JOB

Installation of Data / Voice Cabling Employees- 30+

TASKS

- Pulling of Data/Voice Cable
- Terminating Data/ Voice Cable
- Installation of " J " Hooks
- Working on Aerial Lifts
- Working on Ladders
- Working above 3 meters
- Installation of Data Trays
- Installation of " J " Hooks

JOB

Installation of Fibre Optic Cable *Employees- 30+*

TASKS

- Pulling of Fibre Optic Cable
- Terminating Fibre Cable
- Working above 3 meters
- Working on Ladders
- Working on Aerial Lifts

JOB

Installation of Electrical Cable Employees-30+

TASKS

- Pulling of Electrical Cable
- Terminating Electrical Cable
- Working on Aerial Lifts
- Working above 3 meters
- Electrical Installation on existing/hot systems
- Working on Ladders

JOB

Installation of Conduit Employees- 30+

TASKS

- Cutting Conduit
- Working above 3 meters
- Bending Conduit
- Working on Aerial Lifts
- Working on Ladders

JOB

Installation of Data Equipment Employees- 30+

TASKS

- Working on Aerial Lifts
- Working above 3 meters
- Installing Data Racks/Wallmount
- Installing Data Racks/ Standalone
- Installing Data /Voice Jacks/Patch Panels

JOB

Installation of Electrical Components Employees-30+

TASKS

- Electrical Installation on existing/hot systems
- Working on Aerial Lifts
- Working above 3 meters
- Installing Light Fixtures/Switches
- Installing Electrical Boxes
- Installing Electrical Panels
- Installation of Electrical Breakers

JOB

Driving Service Van Employees-30+

TASKS

- Electrical Installation on existing/hot systems
- Working on Aerial Lifts
- Working above 3 meters
- Installing Light Fixtures/Switches
- Installing Electrical Boxes
- Installing Electrical Panels
- Installation of Electrical Breakers

JOB

Office Work Employees-30+

TASKS

- Electrical Installation on existing/hot systems
- Working on Aerial Lifts
- Working above 3 meters
- Installing Light Fixtures/Switches
- Installing Electrical Boxes
- Installing Electrical Panels
- Installation of Electrical Breakers

JOB

Safety Administrator Employees-30+

TASKS

- Electrical Installation on existing/hot systems
- Working on Aerial Lifts
- Working above 3 meters
- Installing Light Fixtures/Switches
- Installing Electrical Boxes
- Installing Electrical Panels
- Installation of Electrical Breakers

SAFE WORK PRACTICES

SAFE WORK PRACTICES INDEX

SAFE WORK PRACTICES POLICY

It is this company's policy to reduce all risks to our employees, sub-contractors and property. This is achieved by a written set of safe work practices in general terms outlining what must be done for each hazardous job.

To ensure that all safe work practices are followed and all additional safe work practices not presented in this document are implemented throughout the course of our business.

*The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

POLICY OF REVIEW

SAFE WORK PRACTICES

An annual review of safe job practices shall be implemented and take place before each fiscal year end (January 1st). Any work done prior to the annual review that does not currently have an associated Safe Work Practice shall not be completed until such a practice is written up and added to the Safety Manual, to ensure worker safety at all times.

The annual and 'as required' review shall include the following items:

1. A description and outline of the safe job practices
2. The date and time of the review
3. Names of applicable staff that performed the review

Signature:	Date:
AJ Smith e-signature	March 25, 2019

ELECTRICAL - GENERAL

SAFE WORK PRACTICES

There are four main types of electrical related injuries: electrocution (fatal), electric shock, burns, and falls. These injuries can happen in various ways:

- Direct contact with the electrical energy.
- When the electricity arcs (jumps) through a gas (such as air) to a person who is grounded (that would provide an alternative route to the ground for the electricity).
- Thermal burns including flash burns from heat generated by an electric arc, and flame burns from materials that catch on fire from heating or ignition by electrical currents.
- High voltage contact burns can burn internal tissues while leaving only very small injuries on the outside of the skin.
- Muscle contractions, or a startle reaction, can cause a person to fall from a ladder, scaffold or aerial bucket. The fall can cause serious injuries/death.

SAFETY TIPS

- Inspect tools, power cords, and electrical fittings for damage or wear prior to each use.
- Repair or replace damaged equipment immediately.
- Always tape cords to walls or floors when necessary. Nails and staples can damage cords causing fire and shock hazards.
- Use cords or equipment that is rated for the level of amperage or wattage that you are using.
- Always use the correct size fuse. Replacing a fuse with one of a larger size can cause excessive currents in the wiring and possibly start a fire.
- Be aware that unusually warm or hot outlets may be a sign that unsafe wiring conditions exists.
- Always use ladders made of wood or other non-conductive materials when working with or near electricity or power lines.
- Place halogen lights away from combustible materials such as cloths or curtains. Halogen lamps can become very hot and may be a fire hazard.
- Risk of electric shock is greater in areas that are wet or damp. Install Ground Fault Circuit Interrupters (GFCIs) as they will interrupt the electrical circuit before a current sufficient to cause death or serious injury occurs.
- Know where the circuit breakers and panels are located in case of an emergency.
- Label all circuit breakers and panels clearly. Each breaker should be positively identified as to which outlet it is for.
- Do not use outlets or cords that have exposed wiring.
- Do not use power tools with the guards removed.
- Do not block access to circuit breakers or panels
- Do not touch a person or electrical apparatus in the event of an electrical accident. You can use an emergency safety rescue hook. Always disconnect the current first.
- Switch tools OFF before connecting them to a power supply.
- Disconnect power supply before making adjustments.
- Ensure tools are properly grounded or double-insulated. The grounded tool must have an approved 3-wire cord with a 3-prong plug. This plug should be plugged in a properly grounded 3-pole outlet.
- Test all tools for effective grounding with a continuity tester or a ground fault circuit interrupter (GFCI) before use.
- Do not bypass the switch and operate the tools by connecting and disconnecting the power cord.
- Do not use electrical tools in wet conditions or damp locations unless tool is connected to a GFCI.
- Do not clean tools with flammable or toxic solvents.
- Do not operate tools in an area containing explosive vapours or gases.

EMERGENCY/STANDBY GENERATOR TESTING AND MAINTENANCE

SAFE WORK PRACTICES DEVELOPED BY LEE HALLS / MARV COOK

GENERAL

Protecting workers and public from injuries associated with Emergency and Standby Generator testing and use

APPLICATION

Both portable and Stationary units connected to the Buildings Electrical system through a Manual or Automatic transfer switch

PROTECTIVE MECHANISMS

- Safe work procedures
- PPE
- Suitable fire extinguishers readily available
- Manufacturers specifications
- Maintenance schedules and log
- Regular testing schedules
- ERP (Emergency Response Plan)
- Applicable MSDS worksheets
- Posting of proper signs and lockouts with contact numbers during test

SELECTION AND USE

- As per job requirement

SUPERVISOR RESPONSIBILITY

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training. Ensure proper permissions is sought prior to testing. Notification to local Fire Department and Security Monitoring Company

Worker Responsibility

Visual Inspection

The area surrounding engine-generator should be kept free of debris and provide sufficient ventilation during operation. When the generator is not running, conduct weekly inspections of the surrounding area to ensure fluids, such as oil and coolant, are not leaking. Inspect the exhaust system, including the manifold, muffler, and exhaust pipe. All connecting gaskets, joints, and welds should also be checked for potential leaks. Clean the starting and electrical system terminals. Connections should be tight and free of corrosion. Any adverse conditions should be corrected promptly by a qualified technician. Services records should be onsite and readily available for updating. Proper fire extinguishers must be present prior to starting.

Cooling system

Periodically check the coolant level. The cooling fluid mix is a balanced solution and varies from manufacturer to manufacturer. Don't mix your own. Make sure the solution you use is approved for use in your engine. Clean the radiator to remove any dust and/or debris, taking care not to damage the fins. Make sure the coolant heater is operating correctly by monitoring the discharge temperature.

Fuel system

Visually inspect the fuel delivery system periodically for leaks and correct pressure while running the engine. Check fittings and connections; tighten them as needed. Drain and clean fuel filters as recommended by OEM. Examine charge-air piping, and supply hoses for leaks, holes, and damaged seals. The fuel system and charge-air cooler should also be free of dirt and debris. Fuel maintenance is another important aspect of generator maintenance. Gasoline and diesel fuel degrade over time. A process of separation and stratification, even growing micro-organisms, can occur in fuels. The fuel tank should be equipped with a plug or valve which allows accumulated water to be drained from the tank periodically. A fuel sample, taken from the bottom and from the supply line, should be visually examined monthly. The fuel should look like new fuel; otherwise it should be filtered or replaced. Fuel tanks should be sized so that the fuel is used and turned over on a regular basis. Fuel should be turned over or replaced on an annual basis. A proper fuel maintenance program is important. Ensure generators are shut off and cooled down prior to refueling Excess fuel should be kept locked away and not stored near a running generator

Batteries and wiring

Batteries should be inspected to make sure they are fully charged. The batteries must be tested under load. Simply checking the voltage is an inaccurate method of testing for a battery's power. Battery cables and terminals should be kept clean and free of corrosion. Where appropriate, check the specific gravity and electrolyte levels. All engine wiring should have tight connections and be free of corrosion or damage. Check with your generator manufacturer for their recommended battery and wiring practices, cleaning agents and methods.

Exercise

Start and run the engine-generator monthly. Operate the engine until its temperature has been stable for at least 10 minutes. That's when engine parts become lubricated, oxidation is prevented, old fuel is consumed, and overall functionality is verified. Operate the generator annually for a minimum of 1 hour at 100% of the generator nameplate capacity. When testing a stationary unit, testing should be done through the Automatic Transfer Switch to ensure that the entire electrical system is working properly. If it is not possible or practical to use a site load for the test, a load bank should be used. Sometimes problems only become noticeable during operation. Therefore it is important operators remain alert for unusual circumstances such as abnormal sights, sounds, vibration, excessive smoke, or changes in fuel consumption. Remember to check for leaks, loose connections or components, and abnormal operating conditions. Correct these as necessary.

These recommendations are intended to supplement the equipment manufacturers' recommendations - not replace them. Always consult with your manufacturer before implementing any new service program. The standard of workmanship and procedures for all inspections and overhaul repair work should comply with the manufacturer's specifications. It is the sole responsibility of the owner/ operator of the equipment to perform any and all duties and tasks associated with their selection, installation, operation, inspection, maintenance, repair and other issues connected with their equipment.

Step Ladders

Safe Work Practices

General

Protecting workers from injuries associated with the use of portable ladders. Falls from portable Ladders are one of the leading causes of serious injuries in the electrical industry.

Application

- Make sure manufactured portable ladders comply with CSA CAN3-Z11-M81 (R2201) and ANSI standards.
- All ladders shall be inspected prior to use. If there are cracks, splits, twisted or jammed parts, loose screws rivets or rungs or any other defects, the ladder shall be tagged and removed from service until repaired or replaced.
- Wooden ladders shall not be painted. A wooden ladder may be preserved with a transparent protective coating.
- The top two steps, spreaders, paint shelf, support braces, or any other attachment are not to be used as steps for any reason.
- Be certain the spreaders are locked before climbing the ladder.
- Face the ladder when climbing up or down. Keep your body centered between the side rails.
- Ladders shall be set up on a firm, level and clean surface.
- Ladders should not be erected on boxes, tables, scaffold platforms, man lift platforms or vehicles.
- Choose the proper ladder for the task. Do not modify in any way.
- Legs fully extended and locked in proper position, never attempt to climb a step ladder while it's leaning against a wall. Remove any debris from base of the ladder.
- Do not setup step ladder behind doors that may open into the ladder. If you must: alert staff, lock the door, appoint a spotter or install proper signage on the door to make your presence known.
- No aluminum ladders while working with or near electricity.
- Observe weight restrictions on the ladders, and do not exceed.

Protective Mechanisms

- PPE
- Manufacturers specifications
- ERP (Emergency Response Plan)

Selection and Use

- As per job requirement

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.

PORTABLE LADDERS

OH&S CODE 2009

133(1) Worker must not perform work from either of the top two rungs, steps or cleats of a portable ladder unless the manufacturer's specifications allow the worker to do so.

133(2)
Despite subsection (1), a worker may work from either of the top two rungs, steps or treads of a stepladder,
(a) if the stepladder has a railed platform at the top, or
(b) if the manufacturer's specifications for the stepladder permit it.

OH&S 2009 code states:
137(1) An employer must ensure that a worker working from a portable ladder from which the worker may fall 3 meters or more uses a personal fall arrest system.
137(2) Subsection (1) does not apply while the worker is moving up or down the portable ladder.
137(3) Despite subsection (1), if it is not resonably practical to use a personal fall arrest system, a worker may work froma portable ladder without fall protection if

(a) The work is a light duty task of short duration at each location
(b) The worker's centre of balance is at the centre of the ladder at all times even with an arm exteded beyond the side rails of the ladder, and
(c) The worker maintains three-point contact whenever the worker extends an arm beyond a side rail

Featherlite: (I called and spoke with customer services April 11, 2018)
Manufacturer's specs for a 10 foot ladder states that the worker is NOT permitted to work (stand/step) on the top 2 rungs

Featherlite is unaware of anything changing for a 10 foot ladder and it will remain the top 2 rungs are not to be used. Unless the site owner specifies they don't want the worker using the top 3 rungs.

Power and Hand Tool Use

Safe Work Practices

General

Protecting workers from injuries associated with the use of power and hand tools.

Application

Power tools and hand tools to be used and maintained in compliance with manufacturers' guidelines.

Protective Mechanisms

- Safe job procedures
- PPE
- Manufacturers specifications
- ERP (Emergency Response Plan)

Selection and Use

- As per job requirement

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.

Worker Responsibility

- Electrical tools must have 3 wire (grounding) cord and plug, excluding double insulated tools.
- Grinder discs, buffers and stones to be used only for designed application and at rated speed.
- Stationary grinders must have properly adjusted tool rests and stones to be properly dressed.
- Angle grinders to have Original Equipment Manufacturer (O.E.M.) guard.
- On/off switches must be functional and positioned so Operator has access.
- Accessories can only be used that are designed for use with the tools specified.
- Saw blades must be designed for the product being cut and at the rated speed, O.E.M. guards must be in place and functional.
- Chisels, punches, hammer, wrenches, etc. to have all burrs ground from striking area.
- Chisels, punches, screwdrivers, etc. to have tips properly dressed.
- Cracked or splintered handles to be replaced.
- All tools must be cleaned after use and repairs made before being properly stored.
- Tools to be used for designed purpose only.
- Repairs to tools must be performed by qualified personnel, using O.E.M. parts or equivalent.

SCAFFOLDING

SAFE WORK PRACTICES

GENERAL

Protecting workers from injuries associated with erecting and working with scaffolding.

APPLICATION

All scaffolding used shall be erected, maintained and dismantled by a competent worker, in accordance with manufacturers' specifications and Regulations.

PROTECTIVE MECHANISMS

- Manufacturers specifications
- Fall protection devices
- Safe job procedure
- PPE
- ERP (Emergency Response Plan)

SELECTION AND USE

- As per job procedure
- Manufacturers specifications
- Determine the type of scaffold required

WORKER RESPONSIBILITY

- Ensure grounding on a firm and level base.
- Maintain the established minimum clearances from all power lines.
- Provide a safe access ladder.
- Ensure scaffold has a platform perimeter handrail.
- Anchor or tie a free standing scaffold according to regulations.
- Do not use a ladder sloped against the side of a scaffold at any time.
- A toe board is required on all platforms.
- Ensure tube and clamp modular construction is utilized. Wood construction is to be used only when absolutely necessary.
- Ensure proper safe scaffold tags are installed.
- Utilize a tag line when hoisting material.
- Minimize tools, material and debris on the platform.
- Ensure a hand line with a tool bag for tools is utilized.

CONDUIT BENDING

SAFE WORK PRACTICES DEVELOPED BY GREG CAMERON

GENERAL

Protecting workers from injuries associated with conduit bending operations.

APPLICATION

- A bending machine is used to shape the conduit to conform to the contours of the terrain or to change the direction of the line route.

PROTECTIVE MECHANISMS

- Equipment Maintenance procedure
- Barricades, Warning signs, Communication devices
- ERP (Emergency Response Plan)

SELECTION AND USE

- Manufacturer specifications

SUPERVISOR RESPONSIBILITY

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard analysis, Worksite inspection, Equipment selection

WORKER RESPONSIBILITY

- Be aware of surroundings and position yourself as to not cause damage to facility, equipment, or people in the area.
- Do not block doorways, fire alarm equipment, or any other access necessary for facility operation.
- Extra care must be taken to ensure that no damage occurs to the existing facility. This may involve extra precautions such as bending on plywood.
- In no way shall any existing structure be used as a means for bending or altering conduit. Doorways/elevators are not acceptable ways to check if a bend is 90 degrees. Use of square or other tool designed for the purpose must be used.
- Always yield the right of way to staff and patients, be prepared to clean up and move out with limited warning. Keep all tools and materials neat, organized and out of the way. All short pieces of conduit must be picked up and stored properly, if left on the floor a tripping hazard is created.
- A worker handling conduit must watch both ends and be aware of surroundings. Long lengths of conduit may need a spotter while installing, especially in a dust tent when a worker can't see the other end from in the tent.
- Watch for hazards while installing conduit into ceiling space, be cautious of sprinkler lines, electrical, ceiling tile, or anything else that maybe in these spaces.
- All conduit must be taped together while transported, and don't attempt to carry too much. Caution while carrying conduit around corners, use of spotter may be required.

Manual Lifting and Carrying

Safe Work Practices

General

Protecting workers from injuries associated with material lifting and carrying.

Application

Most lifting accidents are due to improper lifting methods. All manual lifting should be planned and safe lifting procedures followed.

Protective Mechanisms

- Safe job procedure
- Safe lifting procedures
- PPE
- ERP (Emergency Response Plan)

Selection and Use

- As per safe job procedure
- Safe lifting procedure
- Selection of lifting equipment

Worker Responsibility

- Ensure that you know your physical limitations and the approximate weight of materials.
- The use of power equipment or mechanical lifting devices should be considered and employed where practical.
- Obtain assistance in lifting heavy objects.
- Ensure a good grip before lifting and employ proper lifting technique.
- Avoid reaching out.
- Pipes, conduit, reinforcing rods and other conductive materials should not be carried on the shoulder near exposed live electrical equipment or conductors.
- Be aware of hazardous and unsafe conditions.

Lockout of Hazardous Energy Sources

Safe Work Practices developed by Ryan Mrochuk

General

Protecting workers from potential injuries related to the release of hazardous energy.

Application

Locking out of devices and equipment that have the potential to release hazardous energy while work is being completed.

Protective Mechanisms

- PPE
- Lockouts
- Locks and Tags
- Multimeter/Voltage Tester
- Safe Job Procedures

Selection and Use

- As per safe job procedure
- As per manufacturers specifications

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard analysis, worksite inspection, equipment, inspection.

Worker Responsibility

- Assess the work being done to determine if any risk of injury exists due to the potential release of hazardous energy. This includes communicating with others in the area to determine how their work will affect you, or your work will affect them.
- Be aware of the different types of hazardous energy that can exist on job sites. These may include: electrical, kinetic, chemical, thermal, potential, and radiation.
- If there is any risk of injury from any of these hazardous energies, the sources of these energies must be locked out. Locking out the source of hazardous energy allows workers to complete work in a safe manner, without the risk of any hazardous energy being released.
- There are many different lockout devices that can be used in different situations. You can talk to your supervisor and/or safety rep if you are unsure of which lockout device is appropriate for your situation.
- Every worker must have their own uniquely keyed lock (combination locks are not acceptable), and can only have a single key.
- Every worker working in an area where the potential of hazardous energy exists must put their own lock on the energy source.
- Follow all Safe Job Procedures.

Portable Fire Extinguishers

Safe Work Practices

General

Protecting workers from injuries associated with IMPROPER use of fire extinguishers

Application

Portable fire extinguishers must be installed in required areas, and inspected on a regular basis to ensure proper operation in an emergency.

Protective Mechanisms

- Safe job procedure
- Alberta Fire Code
- Manufacturer's recommendations
- PPE

Selection and Use

- As per safe job procedure
- Alberta fire code
- Manufacturer's recommendations

Worker Responsibility

- Ensure you are fully trained with operation and inspection of fire extinguishers.
- Check Cylinder
- Check date of manufacture and last recorded inspection date
- Check that all tags are still in place
- Check that pin is still in place
- Check Pressure Gauge
- All Fire extinguishers are certified by an off-site inspector every 3 years

Extension Ladders

Safe Work Practices

General

Protecting workers from injuries associated with the use of portable ladders.

Falls from portable Ladders are one of the leading causes of serious injuries in the electrical industry.

Application

- Make sure manufactured extension ladders comply with CSA CAN3-Z11-M81 (R2201) and ANSI standards.
- All ladders shall be inspected prior to use. If there are cracks, splits, twisted or jammed parts, loose screws rivets or rungs or any other defects, the ladder shall be tagged and removed from service until repaired or replaced.
- Ladders used during the servicing of energized or potentially energized electrical equipment must be made of non-conductive material
- Three points of contact should always be maintained when ascending or descending a ladder.
- Ladders placed in front of doors opening towards the ladder shall be open, locked, guarded or have a barricade in place.
- Ladders shall be set up on a firm level surface.
- Ladders should not be erected on boxes, tables, scaffold platforms, man lift platforms or vehicles.
- Ensure the ladder is tied off and when dismounting a ladder at an elevated position, ensure the ladder extends at least 1 meter (3 feet) above the platform or landing.
- Place the ladder feet 1/4 of the ladder's working length (e.g., foot to top support point) away from the base of the structure (e.g., for every 4 feet high, the base of the ladder should be out 1 ft.; that means one horizontal foot from the support point).
- A personal fall arrest system shall be used when working on ladders at heights of more than 3 meters (10 ft.).

Protective Mechanisms

- Safe job procedure
- Alberta Fire Code
- Manufacturer's recommendations
- PPE

Selection and Use

- As per safe job procedure
- Alberta fire code
- Manufacturer's recommendations

PORTABLE LADDERS

OH&S CODE 2009

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Fall Protection

Safe Work Practices

General

Protect workers from injuries associated by not utilizing proper fall arrest protection

Application

Fall Arrest Protection shall be utilized where there is or may be a danger to workers falling. NO person shall use fall protection devices until they have received adequate training.

Protective Mechanisms

- ERP (Emergency response plan)
- Fall protection plan
- PPE
- Manufacturers' specifications
- Safe job procedure
- Barricades and warning signs

Selection and Use

- Manufacturers' specification
- As per safe job procedure

Worker Responsibility

- Be fully conversant with protection system, and what your equipment is capable of.
- Ensure barricades, ribbons and signs identify restricted areas.
- Ensure you understand the procedures for rescue of workers who may be unable to rescue themselves from an elevated work area.
- Ensure you know your anchor points.
- Ensure you do not wrap the lanyards and/or rope around beams, girders, pipes, etc.
- Utilize the buddy system and continually check each other's harness and D ring to ensure that the harness is not too lose and or the D ring has not slipped down the back.

Cleaning Solvents

Safe Work Practices

General

Protecting workers from injuries associated with the use of cleaning solvents.

Application

Cleaning solvents are used in construction work to clean tools, equipment and within shop, for general cleaning.

Protective Mechanisms

- WHMIS
- MSDS in place & current PPE
- Respiratory protection {if required}
- ERP (Emergency Response Plan)

Selection and Use

- As per job requirement

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements

Worker Responsibility

- Ensure all WHMIS requirements are met.
- Check toxic hazards of all solvents before use. (M.S.D.S.)
- When breathing hazards exists, use the appropriate respiratory protection.
- Use non-flammable non-toxic solvents for general cleaning.
- Store flammables and solvents in special storage areas.
- Ensure that proper containers are used for transportation, storage and field use of solvents/flammables.
- Do not use solvents in areas where food may be contaminated.
- Use rubber gloves to protect the hands.
- Wear protective clothing to prevent contamination of workers clothes.

Drilling through Drywall / Concrete

Safe Work Practices – Developed by Mike Holloway & Lee Halls

General

Protecting workers from injuries while drilling through drywall or concrete.

Drilling through a wall is a dangerous aspect of construction, especially if you don't have the correct equipment. It's almost impossible to tell what's behind that seemingly safe structure and hitting a water pipe, electrical wire, or gas pipe can lead to disaster.

Protective Mechanisms

- Wall scanner
- PPE

Employer Responsibilities

- Ensure all the architectural construction drawings and client supplied site as-built drawings, have been reviewed and any major obstructions have been identified and employees have been informed
- Ensure all employees have read and understand all Safe Work Practices and Safe Job Procedures prior to commencing work.
- Ensure PPE is in accordance to Arcom and site specifications regulations
- Ensure wall scanners are available in a timely manner. Waiting 20-60 minutes for a wall scan is NOT acceptable.
- Provide direction to employees if they are unsure about proceeding

Worker Responsibilities

- A hazard assessment must be completed prior to work starting, and updated if processes or conditions change
- Ensure all permits/forms (site specific) are filled out prior to starting are filled out and signed by the proper authority (e.g. The general on-site or your foremen)
- Follow and know ALL site-specific procedure for drilling or cutting through drywall / concrete
- Inspection of both sides of the wall area of penetration, noting any possible visual obstructions
- All Infectious Prevention Controls must be followed when opening ceiling tiles/access panels.
- Workers are to ensure they scan the wall prior to drilling or call for a scan from the general on site.
- If a scanner is unavailable; ensure the General Contractor and Client provide clearances to proceed before commencement. A pilot hole can be drilled using the appropriate tool.
- If you are unsure of what might be behind the wall, proceed slowly and do not use power tools

Please Note:

NO cutting into walls blindly; this is considered a safety infraction; employee will be written up for a safety infraction and will be removed from site

Arcom contracts out ALL wet coring

Control of Traffic Flow on Work Sites

Safe Work Practices

General

Protecting workers from injuries associated with traffic congestion on work sites.

Application

Traffic at work sites must be regulated in such a manner to protect the safety and wellbeing of all personnel and equipment.

Protective Mechanisms

- PPE
- Signs and barricades
- ERP (Emergency Response Plan)

Selection and Use

- As per job requirement

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and to identify potential hazards.

Worker Responsibility

- Ensure you have a valid operator's license.
- Erect signs and barricades to direct traffic safely around worksite.
- Restrict on site traffic.
- Obtain authorization to enter restricted work areas, leases or plant sites.
- Prior to operation, the operator must perform a walk around check of the vehicle.
- Operate vehicles in a safe, courteous manner.

Confined Space Entry

Safe Work Practices currently under review by Phil Post

General

Protecting workers from injuries associated with working in confined spaces

Application

Working in an enclosed, or partially enclosed, space that is not intended for continual human occupancy and has restricted, limited or impeded means of entry/exit because of its construction.

Protective Mechanisms

- PPE
- Site specific entry program
- ERP (Emergency Response Plan)
- Air Monitor

Worker Responsibility

- Worker must be trained in confined space entry to identify the work procedures required to enter the confined space.
- Ensure that there is reasonable means of egress from all parts of the confined space.
- MUST always have a trained personal at the entrance of space
- Ensure that ventilation and purging is established and allows acceptable air levels to be achieved and maintained.
- Establish method of communication to allow immediate contact with necessary personnel if rescue or assistance is required, confirm alarm system.
- Worker must be conversant with Rescue Procedures.

Restricted Space Entry

Safe Work Practices currently under review by Phil Post

General

Protecting workers from injuries associated with working in a restricted space. Permits are not required for entry, as atmospheric hazards are not present. However, access to, or egress from the space may be limited and movement inside the space may be awkward or difficult. Given these limitations, at the University of Toronto, specific procedures must be established and followed to ensure the safety of those who enter and work in Restricted Spaces. Restricted Spaces are identified in the Confined Space Inventory but are clearly marked as being Restricted rather than Confined spaces.

Application

Working in an enclosed, or partially enclosed, space that is not intended for continual human occupancy and has restricted, limited or impeded means of entry/exit because of its construction.

Protective Mechanisms

- Safe job procedures
- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)
- ERP (Emergency Response Plan)
- Restricted Space signage for posted at the entry location

Worker Responsibility

- Worker must be trained in the safe work procedures to restricted space by the site lead
- MUST always have a confirmed open way of communication
- Establish method of communication to allow immediate contact with necessary personnel if rescue or assistance is required, confirm alarm system.
- Worker must be informed with the emergency response plan prior to working in a restricted workspace.
- To be familiar with the intended task(s) involved.
- To adhere to the Entry rules and requirements.
- To ensure that the work is performed in a safe manner.
- To be aware of the hazards that could exist and have the necessary controls in place.
- To use all necessary PPE for the purpose for which it is provided as needed and appropriate.
- To make the work area safe and seek immediate advice if in doubt or if circumstances or conditions change.

The Stand-by Person:

- Stand-by Persons are required to keep open communication with the person or persons working in the restricted space and to act effectively in perceived emergencies.
- Agree upon and confirm the communication system or method before the worker enters the restricted space.
- Monitor the employee's entry into the confined space to ensure that it occurs safely, and that any lines and hoses do not foul or tangle.
- Ensure that equipment that is being used to support the worker operates effectively.
- Bring the employee out of the confined space immediately in the event of perceived danger, raise an alarm and take further appropriate emergency actions.

Signposting And Barricades

- Before any work in relation to a restricted space starts, signs must be erected to prevent entry of persons not involved in the work. Signs must warn against entry by people other than those who are listed on the restricted space entry log.

Restricted VS Confined Space Entry

Confined Space vs Restricted Space

Confined spaces are not always the obvious tank that needs to be welded from the inside. A confined space might be that trench you have to climb down into, or the crawl space underneath the house.

In Alberta, these types of workspaces fall into one of two categories: either a restricted space or a confined space, and the rules governing them differs. So, it's important to know which one you are about to enter, so you leave the same as you came in.

A restricted space is a work area that people don't generally like to hangout in and is hard to enter and exit but that's the only hazard you'll encounter.

A confined space is a restricted space that has hazards or potential hazards above just access and egress….like fumes or lack of oxygen from welding or H2S seeping up out of the ground as you dig. You can find all the specifics around the hazards you need to consider in the OH&S Code in Alberta or your jurisdiction's applicable OH&S legislation.

Some sites or companies may choose to follow procedures for a confined space, even if by definition, it is a restricted space. This is operating on the side of caution and taking any guesswork out of your safety. But don't rely on your employer to identify confined spaces for you, especially since you won't just run into them (no pun intended and don't run) while at work. Use the same precautions at home (or on your yacht) as your employer puts in place at work. Stay safe and always make sure you have a permit (at work) and a rescue plan.

Operation of Elevated Work Platforms (EWP)

Safe Work Practices

General

Protecting workers from injuries associated with operation of elevated work platforms

Application

- No person shall operate an elevated work platform until they have received adequate training, in accordance with manufacturers' specifications.

Protective Mechanisms

- Manufacturers' specifications
- Permit system
- ERP (Emergency Response Plan)
- Safe job procedures
- P.P.E.
- Barricades and warning signs

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Determine type of equipment required
- Inspect work site

Worker Responsibility

- Inspect elevated work platforms before each use.
- Erect warning devices.
- Erect barricades and warning signs.
- Appoint a spotter.
- Ensure means of communication between operator and spotter.
- Fall protection in place.

Entering Ceiling Space/Infectious Control

Safe Work Practices

General

Protecting workers from injuries associated with operation of entering ceiling space / infectious control environments

Protective Mechanisms

- PPE
- Site specific entry program
- ERP (Emergency Response Plan)

Worker Responsibility

- Use ladder of proper length. Do not stand on chairs, tables/desks, crates or other awkward materials; only used approved Arcom Ladders.
- Pay attention to surroundings; fire alarms, sprinkler heads, electrical systems and other equipment that may not be installed securely. Report any faulty conditions that may exist.
- Be aware of locations that may contain encapsulated asbestos. Look for signs of disruption to this material, and be sure your activities do not cause damage to this material. Inform supervisor immediately if the material has been disturbed. If at all unsure ask the supervisor, he can provide information detailed where the hazardous material is located and possible alternatives to completing the required task.
- Follow all infectious control guidelines provided by on site customer. Ask supervisor about locations that may require different types of hoarding.
- Wear PPE (safety glasses while opening ceiling tiles. You can never tell what is waiting for you above the tiles)
- Be careful not to break ceiling tiles, as some cannot be replaced.

FISHING CONDUITS/PULLING WIRE

SAFE WORK PRACTICES

GENERAL

Protecting workers from injuries associated with operation of fishing conduits and pulling wire

PROTECTIVE MECHANISMS

- PPE

WORKER RESPONSIBILITY

- Pre-use inspection of fish tapes to ensure there are no sharp edges that may cut into existing wires in a conduit
- Do not fish into live panels or control boxes you must be sure that you are fishing the proper conduit. NO guessing, you may end up in a live panel or control box.
- Roll up fish tape as you pull. Excess fish tape can cause tripping hazards, or make contact with live circuits in electrical rooms
- Use fiberglass fish tape for live panels
- Do not bend fish tapes sharply or wrap around anything, this will ruin the fish tape.
- Setup wire rolls and pulling area clear of any obstructions. Do not create tripping hazards with unsupervised loops of cables.
- Do not pull too hard and ensure good footing in case the wire, string or fish tape breaks free.
- Use approved wire lubricants for a smooth pull, but these may damage carpet or other flooring. Place cardboard under work area and have plenty of rags readily available.
- Communication is key between wire puller and wire feeder. Wire puller is in charge and the feeder is not to leave his position until puller tells him so, or he informs the puller. If feeder leaves the puller may strain himself or damage the wire.

WORKING WITH/AROUND ASBESTOS

SAFE WORK PRACTICES DEVELOPED BY PHIL POST - AUGUST 2018

****72 HOURS NOTICE IS REQUIRED PRIOR TO WORKING WITH ASBESTOS****

GENERAL

Asbestos fibres must be inhaled to cause disease. Asbestos-containing products in good condition and that are not disturbed are not a direct health hazard. These products become a potential health hazard when they are **disturbed,** and fibres are released. Workers having the highest risk of asbestos exposure are those involved in asbestos abatement projects (removal, enclosure or encapsulation of asbestos-containing products), those doing maintenance on equipment or buildings that use asbestos-containing products, or those who may work in an area where asbestos is being disturbed by others.

Arcom's exposure is relatively low but each job will be assessed to determine the level of exposure prior to work commencement. This is a general practice/procedure and may vary depending on the scope of work. E.g. Installing conduit, screws, anchor points, etc.

Where asbestos-containing products must be disturbed, four principles should be followed in any work procedures:

- Isolate the work area
- Protect workers
- Minimize the release of asbestos fibres
- Ensure that the area is properly cleaned up after the work is completed. Detailed recommended work practices for projects involving asbestos-containing materials are provided below.

APPLICATION

Working with and around asbestos must be performed according to all safe work practices, safe work procedures, Alberta's OHS legislation and the Alberta Asbestos Abatement Manual.

PROTECTIVE MECHANISMS

- Basic PPE (safety glasses, work boots & work gloves)
- Specialized PPE: half mask respirator protection (fit test completed, inspection & clean shaven)
- Disposable gloves under work gloves
- Disposable coveralls
- ERP (Emergency Response Plan)
- Debris disposal bags (double bagged and labelled asbestos)

SELECTION AND USE

- As per job requirement

SUPERVISOR/EMPLOYER RESPONSIBILITY

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training

Employers Responsibility:

- Provide a proper work procedure to minimize exposure or control the release of asbestos fibres to keep the concentration of fibres in the air as low as reasonably practicable
- Ensure that workers at the work site are protected from exposure to asbestos and other hazards
- Provide suitable specialized protective equipment to workers
- Train workers in the hazards of asbestos
- Train workers in the employer's work procedures
- Ensure that asbestos exposed workers are provided with a health assessment

Worker Responsibility

Workers are responsible for taking reasonable care of themselves and others at the work site

- Become aware of the hazards associated with working with asbestos
- Follow the employer's work procedures
- Practice good personal hygiene
- Wear the protective equipment required for the work and use the equipment properly
- Participate in training programs provided by the employer
- Follow the employer's work procedures to help control the release of asbestos fibres to keep the concentration of fibres in the air as low as reasonably practicable
- Report any unsafe actions

Occupation Exposure Limits

Alberta's OHS legislation sets out employer and worker responsibilities at the work site. The 8-hour Occupational Exposure Limit (OEL) for all forms of asbestos is 0.1 fibres per cubic centimetre (f/cc).

Resourceful Links:

http://work.alberta.ca/documents/OHS-bulletin-CH019.pdf

https://open.alberta.ca/publications/9780779743254

https://www.canada.ca/en/health-canada/services/air-quality/indoor-air-contaminants/health-risks-asbestos.html

ASBESTOS PROJECTS THAT REQUIRE NOTIFICATION:

72 HOURS NOTICE IS REQUIRED PRIOR TO WORKING WITH ASBESTOS

For emergency project notifications or for extended project notifications call the OHS Contact Centre

Alberta OHS laws require that anyone planning a project where asbestos may be disturbed must notify OHS at least 72 hours before beginning activities that may release asbestos.

Asbestos projects that require notification include:

- set-up operations that may release asbestos fibres
- removing asbestos
- demolition or renovation of a building or equipment containing asbestos

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APPROVING ASBESTOS PROJECTS

The notification process isn't intended as an approval or review process for the submitted work procedures. Employers are responsible for ensuring their proposed work procedures align with the Alberta Asbestos Abatement Manual and comply with OHS laws.

For more information on Asbestos Project Notification requirements, contact OHS.

SUBMIT A NOTIFICATION

Provide notice using the Asbestos Project Notification form available at the link below.

Notice will only be considered valid where the information provided in the form is true, complete and correct.

Each time you submit an asbestos project notice, you must fill out a new online form. See the instructions on the form.

Start a new notification

Encapsulated Asbestos

Safe Work Practices

General

Protecting workers from dangers involved with asbestos

Application

- Educate employees about encapsulated asbestos

Protective Mechanisms

- Safe job procedures
- P.P.E.
- Air quality monitoring

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to employees on protection requirements and training.
- Ensure that all steps in a safe work procedure are carried out in accordance with the procedure
- Inspect work site

Worker Responsibility

- Follow all established steps described in a safe job procedure

DRILLS/HILTI

SAFE WORK PRACTICES

GENERAL

Protecting workers from dangers involved with Drills / Hilti

APPLICATION

- Drilling to secure electrical infrastructure

PROTECTIVE MECHANISMS

- Safe job procedures
- P.P.E. (safety glasses while drilling, face shield while drilling overhead, gloves for hot filings and sharp edges)
- Air quality monitoring

SUPERVISOR RESPONSIBILITY

- Supervisors are responsible to facilitate and/or provide proper instruction to employees on protection requirements and training.
- Ensure that all steps in a safe job procedure are carried out in accordance with the procedure
- Inspect work site

WORKER RESPONSIBILITY

- Pre-use inspections of drills before use. Drill bit condition, frayed cords, or any miss use that may affect safe operation.
- Use proper drill for the application.
- Clamp material to restrict movement while drilling, unless it is securely attached to an existing structure.
- Do not lift or lower drills by the cord.
- Use infectious control measures when creating dust. As well follow all on site (customer provided) infectious control guidelines.
- Extension cords must not restrict the movement of stretchers or wheelchairs. Tape the cord to the floor or securely run it overhead. Preferably set up the work space to limit the time a cord must be ran across any walkway and remove cord immediately after use.
- Wear proper PPE

Chop Saw

Safe Work Practices

General

Protecting workers from dangers involved with using a chop saw

Application

- Cutting materials into various lengths

Protective Mechanisms

- Safe job procedures
- P.P.E. (safety glasses, face shield and gloves)

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to employees on protection requirements and training.
- Ensure that all steps in a safe job procedure are carried out in accordance with the procedure
- Inspect work site

Worker Responsibility

- Pre-use inspection of tool. Blade condition, frayed cords, or any miss use that may affect safe operation.
- Setup in an area clear of flammables, sprinkler heads and other workers. Direct sparks into a safe area that is inaccessible to other workers.
- Clamp material properly to restrict movement while cutting. Keep long lengths from creating tripping hazards or getting hit while cutting. Remove extra material from the saw when finished cutting.
- Absolutely no grinding on the side of chop saw blade, this will weaken the blade and cause it to blow apart.
- Wear proper PPE; face shield to protect face, safety glasses to protect eyes and gloves to protect from sharp/hot edges.

Material/Waste Transportation and Storage

Safe Work Practices

General

Protecting workers from dangers involved with Material/Waste Transportation and Storage

Application

- On site (customer provided) guidelines (site specific)

Protective Mechanisms

- Safe job procedures
- P.P.E. (safety glasses and gloves)

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to employees on protection requirements and training.
- Ensure that all steps in a safe job procedure are carried out in accordance with the procedure
- Inspect work site

Worker Responsibility

- Adhere to all on site (customer provided) infectious control guidelines regarding waste removal.
- Clean up is ongoing and waste must be removed immediately from work area.
- Material must be moved/stored in a safe manner. Caution while moving conduit through hallways and around corners, avoid busy areas if possible.
- Always tape loose lengths of conduit together so it is more manageable.
- Never try to carry awkward loads, or too much weight.
- Store materials in mechanical rooms and carts under lock and key.
- Never block any doors, access, or emergency equipment in any way.
- Wear proper PPE; gloves and safety glasses while moving material.

Vehicle Safe Driving Practice

Safe Work Practices

General

Protecting workers from injuries while driving

Application

When employees are driving Arcom Service Vehicles

Protective Mechanisms

- Safety Cones
- Emergency Flashers
- Securing Devices, Tie Downs
- First Aid Kit
- Portable Fire Extinguisher

Employer Responsibilities

- Ensure all service vehicles are fitted with proper safety supplies (Cones, First Aid Kits)
- Ensure any maintenance issues are reported and resolved immediately
- Ensure vehicles are of suitable classification for applicable job application (GVW)

Worker Responsibilities

- Workers are to ensure they have a valid driver's licence
- Arcom drivers must do a full maintenance inspection monthly and are required to resolve any safety or maintenance issues immediately
- Drivers should be doing a daily maintenance circle check to ensure vehicles are in proper order
- Cell phones or any communication device are not to be used while the vehicle is in motion, vehicles should be stopped and in a safe parking position prior to using any communication device
- Headphone, ear pieces or any other device that may impair a drivers hearing are prohibited
- Drivers are always expected to drive in a courteous and proper manner, adhering to driving regulations and bylaws
- When parking in heavy traffic areas parking cones and flasher should be used
- When backing up, if available a second Arcom employee should be used as a Flag person providing guidance to the driver
- Drivers are expected to do a full circle check of vehicle prior to leaving any parking space to check for hidden obstacles
- Seat Belts are always to be worn/used
- Prior to driving employees should clear vehicle of all ice and snow
- All equipment is to be properly secured whether inside or outside (Ladder racks) service vehicles
- Drivers are expected to report any damage or maintenance to Supervisor immediately

https://saferoads.com/drivers/safety-issues

https://saferoads.com/drivers/safety-issues/distracted/distracted-driving-law

Working in Mental Health Areas

Safe Work Practices

General

Protecting workers from dangers involved with working in mental health areas

Application

- To provide a safe environment for worker/staff/patients/visitor

Protective Mechanisms

- Safe job procedures
- P.P.E. (safety glasses and gloves)

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to employees on protection requirements and training.
- Ensure that all steps in a safe job procedure are carried out in accordance with the procedure
- Inspect work site

Worker Responsibility

- Some areas require a “Constant” to watch tools and materials while work is in progress. Ask supervisor if this applies.
- always Lock up all tools and materials. Only bring what is required for the job. Account for everything brought in and make sure it comes back out. A patient may harm staff or others with any tool or material.
- Absolutely no waste is to be placed into trash cans in these areas or surrounding areas.
- Extension cords, wire, and string must be locked or attended to. Patients can cause a lot of damage to themselves or others.
- Leave all personal information under lock and key, some patients have been known to track people down outside of work.
- Polity refrain from conversing with patients and report any suspicious activities to supervisor or unit staff.
- Ensure all doors that are meant to be locked remain locked, and no patient gains access by our activities.
- Do not try to contain a patient; we do not have the proper training required. Inform the staff.

ECU2 Cart

Safe Work Practices

General

Protecting workers from dangers involved with using an ECU2 cart

Application

- On site (customer provided) IP&C (infection prevention & control) compliance.

Protective Mechanisms

- Safe job procedures
- P.P.E. (safety glasses and gloves)

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to employees on protection requirements and training.
- Ensure that all steps in a safe work procedure are carried out in accordance with the procedure
- Inspect work site

Worker Responsibility

- Pre-use inspection of ECU2 Cart before use and documented on PSI (pre-job safety instruction). Check for any damage to the unit and report if required. Cart must be clean before use, report any mess left from last crew and clean as per #6.
- Setup as to not impede any activities of surrounding staff, patient or public. Do not block any exits, equipment or fire alarm devices without completing step #3.
- Use signage to make people aware or re-route activities around work area. If ANY access is to be blocked for ANY reason, inform the foreman and he will take the proper steps with FM&E.
- Vacuum to be in the ECU2 cart at all times, run while creating dust and for 10 minutes afterwards. Extra care with the power cord, tape it down to the floor or suspend safely from ceiling. Remove the cord as soon as it is no longer required.
- ECU2 cart must always be attended while in use. Park in a clear spot against a wall that does not impede any activities while gone for break time.
- At the end of each shift cart must be wiped down with a moist cloth and ALL debris must be removed. Store as directed by foreman, locked up and safe from damage.

INSTALL UNDERGROUND CONDUITS/PIPE

SAFE WORK PRACTICES

GENERAL

Protecting workers from injuries associated with installing conduit underground

POTENTIAL INCIDENTS OR HAZARDS

- Open Excavations, mobile equipment, slips, trips, falls

APPLICATION

- A bending machine is used to shape the conduit to conform with the contours of the terrain or to change the direction of the line route
- PVC Glue

PROTECTIVE MECHANISMS

- Safe job procedures
- PPE
- ERP (Emergency Response Plan)
- Equipment maintenance procedure
- Barricades and warning devices
- MSDS sheet
- Permit system
- First call marking

SELECTION AND USE

- As per job requirement

SUPERVISOR RESPONSIBILITY

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard Analysis

WORKER RESPONSIBILITY

- Location of proposed installation is verified in accordance with appropriate plans
- Beware of surroundings and position yourself as to not cause damage to facility, equipment or people in area
- Clear site and prepare to provide restricted access for installation works in accordance with relevant standards, codes and legislation
- Appropriate tools and equipment are selected and used safely in accordance with manufacturers specifications
- Check all equipment to ensure good working order and adjusted to manufactures specifications
- Excavation site is made safe through erection of necessary barrier in accordance with OH&S requirements
- Install pipe /conduit to specifications and manufactures requirements
- Pipe /conduit is sealed against ingress of foreign matter
- Backfill is completed safely using suitable soil and materials that ensures pipe/conduit protection
- Site is reinstated to identified requirements
- Reports on installation and design amendments are accurately completed and filed promptly in accordance

Removal of Existing Electrical Equipment

Safe Work Practices Developed by Greg Cameron/Lee Halls

General

Protecting workers from injuries associated with removal of existing electrical equipment.

Potential Incidents or Hazards

- Electric shock/Electrocution
- Burns
- Falls
- Death
- Damage to property

Application

- De-energizing equipment

Protective Mechanisms

- Equipment Maintenance procedure
- Barricades and warning signs
- Communication devices
- ERP (Emergency Response Plan)
- PPE (Safety boots, hard hat, glasses, high vis., safety vest, gloves)
- Multimeter/Volt tick
- Locks and tags

Selection and Use

- Manufacturer specifications

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard analysis
- Worksite inspection
- Equipment selection

Worker Responsibility

- Beware of surroundings.
- Ensure all electrical equipment being removed is de-energized by using a multimeter or volt tick to check for voltage.
- Use lock out equipment to lock breakers and switches in the off position for any circuit you are working on.

Energizing Equipment

Safe Work Practices Developed by Greg Cameron/Lee Halls

General

Protecting workers from injuries associated with energizing equipment.

Potential Incidents or Hazards

- Electrocution, Property damage & Fire.

Application

- Energizing equipment

Protective Mechanisms

- Equipment Maintenance procedure
- Barricades and warning signs
- Communication devices
- ERP (Emergency Response Plan)
- PPE (Safety boots, hard hat, glasses, high vis., safety vest, gloves)

Selection and Use

- Manufacturer specifications

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard analysis
- Worksite inspection
- Equipment selection

Worker Responsibility

- Beware of surroundings
- Ensure equipment is correctly wired prior to energizing it.
- If necessary, keep area surrounding equipment to be energized clear of people until the equipment is successfully energized.
- If energy source has been locked out, locate the person(s) identified on the lock out tag to ensure it is safe to energize and remove the lock. Never cut off the lock.

Working On/Near Energized Equipment

Safe Work Practices Developed by Greg Cameron/Lee Halls

General

Protecting workers from injuries associated with working on or near energized equipment.

Potential Incidents or Hazards

- Electrocution
- Shocks
- Burns
- Falls
- Property damage
- Fire

Application

- Working on or near energized equipment

Protective Mechanisms

- Safe Job Procedures
- Barricades and warning signs
- Communication devices
- ERP (Emergency Response Plan)
- PPE/Specialty PPE
- Locks and Tags

Selection and Use

- Manufacturer specifications

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard analysis
- Worksite inspection
- Equipment selection

Worker Responsibility

- Keep unnecessary workers clear of area.
- Utilize the buddy system so you're not working by yourself.
- Be aware of surroundings. Take your time, don't rush.
- Be aware of your hand placement and know where your tools are; AT ALL TIMES.
- Remove protective covers cautiously, ensuring all fasteners are properly removed.
- Know what voltage you are working with and take the necessary precautions.
- Any ladders being used must not be made of conductive materials.
- Be familiar with all Emergency Response Plan (ERP) procedures.
- If someone you are working with is being electrocuted, do not touch them. First de-energize the source and call 911.
- Always de-energize circuits being worked on whenever possible.

All electrical work is to be done by certified and authorized personnel, as per the Canadian Electrical Code (CEC), and CSA standard Z462. All electrical equipment must be labeled to warn of any shock or arc flash hazards that exist. In the event it is necessary to work on energized equipment, a specific Safe Job Procedure for that work must be developed and implemented before starting the work, and the following guidelines will apply:

For 50-600 volts, Hazard/Risk Category 2 protection is required.

- Appropriately rated electrical protective equipment will be worn
  - Fire retardant clothing with a minimum arc rating of 8 Cal/cm^2

- Arc rated face shield or arc flash suit hood
- Arc rated jacket, parka, or rainwear (when required)
- Properly rated rubber gloves with leather protectors, as per voltage being worked on

- Hard hat, eye protection, hearing protection and leather boots
  - All live work will be restricted to testing only, with appropriately rated equipment
  - No one is allowed within a boundary of 4 feet without wearing the appropriate electrical protective equipment

FOR 601 VOLTS AND GREATER, HAZARD/RISK CATEGORY 4 PROTECTION IS REQUIRED.

- Appropriately rated electrical protective equipment will be worn
  - Fire retardant clothing with a minimum arc rating of 40 Cal/m^2
  - Arc rated flash suit hood
  - Arc rated jacket, parka, or rainwear (when required)

- Properly rated rubber gloves with leather protectors, as per voltage being worked on
- Hard hat with fire rated liner, eye protection, hearing protection and leather work boots
- All live work will be restricted to testing only, with appropriately rated equipment
- Two people are required to be present, both wearing the appropriate protective equipment. The standby worker need not be an electrician, however does need to be properly trained to be able to perform the steps involved with an Emergency Rescue Plan (ERP)
- No one is allowed within a boundary of 10 feet without wearing the appropriate electrical protective equipment

FOR CONTROL CIRCUITS OF 120 VOLTS OR LESS, THE FOLLOWING SHALL BE OBSERVED:

- A face shield is not mandatory when working on control panels, PLC cabinets, or control circuits where the voltage is 120 volts or less, as the arc flash hazard is minimal in those areas. However, the hazard of shocks still exists, so appropriate gloves, eye protection, and insulated tools are still required

ELECTRICAL APPARATUS – LIVE

SAFE WORK PRACTICES

GENERAL

Protecting workers from injuries associated with working on live electrical systems.

APPLICATION

Electrical apparatus, equipment and circuits shall be designed and operated in accordance with the Canadian Electrical Code.

PROTECTIVE MECHANISMS

- Safe job procedure
- Permit system
- P.P.E
- E.R.P. [Emergency Response Plan]

SELECTION AND USE

- As per job requirement

SUPERVISOR RESPONSIBILITY

- Supervisors and Journeyman are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training

WORKER RESPONSIBILITY

- When working on connections, shut off power if possible.
- Ensure what amperage and voltage you are working on.
- Electrical installations should be carried out by a properly trained and qualified journeyman or registered apprentices.
- Two or more journeyman should work together on any energized circuit with a potential to 480 volts or more between conductors.
- Remove panel covers with care, ensuring cover screws or panel space fillers are removed.
- Ensure ladders are made of non-conductive materials.
- Be conversant with E.R.P. (Emergency Response Plan).
- Take your time. Be aware where your hands and tools are always
- Stand to the left of the breaker and look away to turn off

Alberta Construction Safety Association

SAFE WORK PRACTICE

TITLE	Working on Live Electrical Apparatus
GENERAL	Protecting workers from injuries associated with working on live electrical systems
APPLICATION	Electrical apparatus, equipment and circuits shall be designed and operated in accordance with the Canadian Electrical Code.
PROTECTIVE MECHANISMS	Safe job procedure Permit system P.P.E E.R.P. [Emergency Response Plan]
SELECTION AND USE	As per job requirement
SUPERVISOR RESPONSIBILITY	To facilitate and/or provide proper instruction to their workers on protection requirements and training
WORKER RESPONSIBILITY	1. When working on connections, shut off power if possible. 2. Ensure what amperage and voltage you are working on. 3. Electrical installations should be carried out by a properly trained and qualified journeyman or registered apprentices. 4. Two or more journeyman should work together on any energized circuit with a potential to 480 volts or more between conductors. 5. Remove panel covers with care, ensuring cover screws or panel space fillers are removed. 6. Ensure ladders are made of non-conductive materials. 7. Be conversant with E.R.P. (Emergency Response Plan).
* The information presented in this publication is intended for general use and may not apply to every circumstance. It is not a definitive guide to government regulations and does not relieve persons using this publication from their responsibilities under applicable legislation. The Alberta Construction Safety Association does not guarantee the accuracy of, nor assume liability for, the information presented here. Individual counselling and advice are available from the Association.	

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http://www.acsa-safety.org/

ARC FLASH PROTECTION SAFE WORK PRACTICE

SAFE WORK PRACTICES DEVELOPED BY MARV COOK

GENERAL

THE PURPOSE IS TO PREVENT INJURY DUE TO SHOCK HAZARD OR ARC FLASH.

1. All Electrical work is to be done by **certified** & **authorized** personnel only, as per the Canadian Electrical Code, and CSA standard Z462.
2. All switch gear and transformers will be labeled to warn of Shock Hazard and Arc Flash and indicate the need for appropriate PPE.
3. Whenever possible, equipment must be de-energized to eliminate the risk of Shock Hazard or Arc Flash.

PROTECTIVE MECHANISMS / SAFE WORK PRACTICE:

In the event it is necessary to work on energized equipment the following guidelines will apply:

a) 50 Volts to 600 Volts (Hazard/Risk Category 2 Protection required).

i. Appropriately rated electrical protective equipment will be worn:
   1) Fire Retardant coveralls with a minimum arc rating of 8 cal/cm^2
   2) Arc rated face shield, or arc flash suit hood
   3) Arc rated jacket, parka, or rainwear (when required)
   4) Voltage rated rubber gloves with leather protectors
   5) Hard hat, eye protection, hearing protection and leather work boots.

ii. All live work will be restricted to testing only, with appropriately rated equipment.

iii. The MCC must be de-energized prior to insertion or removal of individual starter “bucket” from MCC. If this could not be done, Hazard/Risk Category 4 protection must be worn.

iv. No one is allowed within a boundary of 4 feet without wearing the appropriate electrical protective equipment.

If there is a special circumstance where live electrical work is required, a specific safe work procedure for that work must be developed and implemented before starting any work.

Greater than 600 Volts (Hazard/Risk Category 4 Protection required).

- Appropriately rated electrical protective equipment will be worn:
- Fire Retardant clothing with a minimum arc rating of 40 cal/cm^2
- Arc rated flash suit hood
- Arc rated jacket, parka, or rainwear (when required)
- Voltage rated rubber gloves with leather protectors
- Hard hat with Fire Rated liner, eye protection, hearing protection and leather work boots.
- Live work shall only be performed by personnel that are certified and authorized to work at the rated voltage level.
- All live work will be restricted to testing only, with appropriately rated equipment.
- Two people will be required; both wearing appropriately rated electrical protective equipment. *Standby by person does not need to be an electrician however they need to be trained to know what to do should a problem arise.
- No one is allowed within a boundary of 10 feet without wearing the appropriate electrical protective equipment.
- Restricted and Unrestricted approach boundaries using table 1A, 1B, 5
- Engineering Calculations

b) Face shield is not mandatory when working on control panel, PLC cabinet or control circuits where the voltage is 120v or less as the arc flash hazard is minimal in those areas. However, shock hazard still exists so appropriate gloves, eye protection and insulated tools are still required.

Definitions:
Certified: certified by an authority acceptable to the Board; have the required TQ for the trade.
Authorized: have been authorized by the employer to do the work.

CSA Z462 and Risk Assessment

Safe Work Practices Developed by Johnny Van Capelle & Shelley Smith

Introduction to Risk Assessment in CSA Z462

The CSA Z462 Workplace electrical safety Standard, both the 2015 Edition and now the 2018 Edition, require that a mandatory Risk Assessment Procedure be completed for discrete energized electrical work tasks. This fact may not be known or may be misinterpreted by the employer who is applying CSA Z462 as a basis for due diligence with respect to OH&S Regulations. During training, the information provided to supervisors and Qualified Electrical Workers may not have covered the topic, described what the required risk assessment process is, or explained that the process shall be documented in order to comply with the mandatory CSA Z462 Risk Assessment Procedure.

Risk assessment is not hazard analysis. It is not enough just to identify that Qualified Electrical Workers are exposed to shock and/or arc flash hazards and get them to wear PPE! You need to consider both the potential for injury or damage to health as well as the likelihood of occurrence. In reality, we want to prevent exposure before we protect.

1. Important Risk Assessment Definitions:
   In CSA Z462 the following definitions are provided related to risk:
   - Risk: a combination of the likelihood of occurrence of injury or damage to health, and the severity of injury or damage to health that results from a hazard.
   - Risk Assessment: an overall process that identifies hazards and estimates the likelihood of occurrence of injury or damage to health that results from a hazard.

Note: As used in this Standard, “arc flash risk assessment” and “shock risk assessment” are types of risk assessments, each dealing with a different hazard. These definitions apply when using the CSA Z462 Clause 4.1.6.8 Risk Assessment Procedure.

2. Risk Assessment Procedure Steps:
   Three key steps are required:
   1) Identify if the assigned discrete energized electrical work task(s) will expose the Qualified Electrical Worker to shock and arc flash hazards. The work task may expose the worker to just one of them, or to both. Examples of discrete energized electrical work tasks are voltage measurement, current measurement, energized repair or alteration, racking in or out power circuit breakers, and installing temporary protective grounds.
   2) Remember: testing for the absence of voltage is energized electrical work!
   3) Assess the inherent or initial risk level for the energized electrical work task. (Note that “inherent risk” or “initial risk” is the risk level present without assessing any additional risk control methods such as engineering controls, work procedures, PPE, etc.). Assessing inherent risk can be completed by using a defined risk register table and electrical hazard risk assessment matrix (examples will be provided later). You will also be required to complete separate shock and arc flash risk assessments as components of the overall risk assessment process.
   4) Implement risk controls according to the hierarchy of risk control methods to achieve a residual risk level that is as low as reasonably practicable. (Note that “residual risk” is the risk level remaining after all of the required risk control methods are implemented). If the inherent risk level is High, then apply all available risk control methods to reduce the residual risk level to Low or Medium. In the field, it is critical that the Qualified Electrical Worker documents (in their Job Safety Plan) the risk control methods which must be applied to drop the residual risk level to Low or Medium.

It is important to note that CSA Z462 Clause 4.1.6.8.3 in the 2018 Edition places specific emphasis on human error and the impact it can have with respect to residual risk. Human error must be managed by the Qualified Electrical Worker in real time in the field just before completing the assigned energized electrical work tasks.

It is also noted that the Risk Assessment Procedure and its related process shall be documented in the employer’s Electrical Safety Program.

How Do I Implement a Risk Assessment Procedure?

I am often asked, "What is the Risk Assessment Procedure, and how do we implement it?" In the end, detailed information and a qualitative process were provided in Annex F of the 2015 Edition of CSA Z462. This content was removed from the CSA Z462 2018 Edition and a more simplified description was provided in Annex F (so don't throw away your copies of the 2015 Edition yet). Additionally, for a detailed review of generic risk assessment processes, you can also refer to the CSA Z1002 Standard, which is the basis for the content in CSA Z462 2015 Edition Annex F.

Implementing a comprehensive and documented qualitative risk assessment process is not complicated. It is a simplified process that fulfils the CSA Z462 Risk Assessment Procedure requirement. Yes, there is a subjective element, and this has to be acknowledged and managed when performing the risk assessment.

Some of the factors influencing the risk assessment outcome include:

- the experience of the people involved;
- the quality, applicability, and interpretation of documented statistics, and/or history and experience with past incidents;
- confirming you have qualified workers and they are competent for the work tasks being assessed;
- ensuring human error and behaviors are managed;
- reviewing your electrical equipment maintenance practices and understanding the condition of your equipment;
- knowing how often your Qualified Electrical Workers may be exposed;
- ensuring that the Qualified Electrical Worker is familiar with the specific electrical equipment to be worked on; and
- understanding what elements of the Hierarchy of Risk Control Methods are available to be applied to minimize the residual risk level.

Where Do I Begin?

It is a matter of being trained on the process and working as a team to implement the process for individual discrete energized electrical work tasks. The new CSA Z462 2018 Edition Table 2 gives us the starting point with a comprehensive list of energized electrical work tasks for AC and DC electrical equipment. Each individual work task can have a risk assessment completed for it proactively by an employer's Electrical Safety Steering Committee (ESSC). Meetings can be scheduled, minutes and action items created, and proactive committee-based risk assessments completed. The results of this process can then be provided to Qualified Electrical Workers to apply in the field before they proceed to complete a discrete energized electrical work task. After the initial risk assessments are completed, the ESSC can meet on an annual basis to review and revalidate the determined residual risk levels and take into consideration any changes.

As mentioned earlier, the individual shock risk assessments and arc flash risk assessments completed for each discrete work task are in fact individual risk assessments that are completed within the overall risk assessment process. For the energized electrical work task the applicable task/hazard pairs are defined, and the individual shock risk assessment and/or arc flash risk assessment is completed for each task/hazard pair. The highest residual risk level of all of the work task/hazard pairs is the job's "overall risk level." A defined risk register table and electrical hazard risk assessment matrix, as illustrated below in Figures 1 and 2, can be used to complete and document the overall risk level

Figure 1 – Electrical Hazard Risk Register Table

Work Task Description:					Date:			
Work Location:					Maximum Working Voltage:			
Equipment Tag & Description:					QEW Name:			
Work Order #:					Supervisor:			
Work Task #	Electrical Hazard	Se	Fr	Pr	Av	Risk Class (Rc)	Risk Level (Rl)	Residual Risk
Status Quo – No Assessed Controls								
1 IHR	Arc Flash							

1 IHR	Arc Blast							
1 IHR	Shock							
Arc Flash & Shock Risk Assessment Completed – Apply Hierarchy of Controls to reduce risk								
1 RAP	Arc Flash							
1 RAP	Arc Blast							
1 RAP	Arc Shock							

Figure 2 – Electrical Hazard Risk Assessment Matrix

							Likelihood of Occurrence Parameter		
Consequence	Severity (Se)	Risk Class (Rc)					Frequency (Fr)	Probability (Pr)	Avoidance (Av)
		4 -5	6-10	11-15	16-20	21-23			
Work Task / Hazard Pairs Arc Flash and/or Shock	8						Hourly 5	Common 5	
	6						Daily 5	Likely 4	
	3						Weekly 4	Possible 3	Impossible 5
	1						Yearly 3	Rare 2	Possible 3
	0						Less Often 2	Negligible 1	Likely 1

A more detailed training and explanation is required prior to any person working on live work and ONLY a journeyman is permitted to work live. This is just a reference to clarify what the CSA Z462 Risk Assessment Procedure requires to be completed, and ensure you are aware.

Please review and document the risk assessment process that you will be applying in your company's Electrical Safety Program. You must follow Arcom's procedure and the risk assessment.

ARC FLASH CHECKLIST

Employee 1:	Employee 2:	Date:
Location:		
Voltage:		
Description of work being done:		
Approval		
Project Manager:	Safety Department:	

A CHECKLIST FOR ARC FLASH SAFETY	YES	NO	N/A	
All persons who operate/maintain energized electrical equipment are trained for the voltage-class equipment they operate/maintain				
All persons who operate/maintain energized electrical equipment have been trained on both shock and arc flash hazards.				
All persons who operate/maintain energized electrical equipment have access to the proper personal protective equipment (PPE) to protect them from both the shock and arc flash hazards.				
One-line diagram, including current protective device settings, exists, is legible and accurate.				
All persons who operate the power system have easy access to the current one-line diagram.				
Equipment is labeled correctly, and in accordance with existing safe work practice codes and standards.				
De-energized procedures and equipment exist and are used				
Written safety procedures and energized work permitting processes exist and are followed.				
Equipment is grounded and ground system is tested periodically.				
Proper maintenance practices are followed, especially for fault protection equipment.				
Recent (less than five years old) relay/fuse coordination study exists, and relays are calibrated to the setting recommended.				
Arc flash analysis has been performed for this site (calculations, labeling and arc flash boundaries).				
Are insulating equipment (gloves, mats, etc.) inspected for damage before each use and after any incident that could be suspected of having caused damage?				
Are insulating gloves air tested before use and after any incident that could be suspected of having caused damage?				
Is the Arch Flash helmet and visor free from scratches? Is your line of site obstructed?				
Are the ARCH flash coveralls in good clean condition? Zippers are functioning?				

** If you answered no or not sure to even one question, stop and call Trevor (780) 887-9757 to learn how our solutions can help protect you and the company by reducing the risk of an arc flash incident.

Did you know...

- An arc flash event releases thermal heat, toxic fumes, pressure waves, blinding light, sound waves and explosions
- An arc flash event can result in critical burns, collapsed lungs, loss of vision, ruptured eardrums, puncture wounds and even death of your employees.
- Arc flash explosions cause thousands of severe burns and hundreds of deaths of Canadian workers every year.

Arc Flash PPE Categories from NFPA 70E (2018)

The National Fire Protection Association (NFPA) uses four Arc Flash PPE Categories to classify ranges of arc flash hazards, and the corresponding requirements for Personal Protective Equipment (PPE). The categories are one of the methods used in the current NFPA 70E standard to inform workers about the protection they need while working on energized equipment. The Arc Flash PPE Category system replaces the Hazard/Risk Category (HRC) system from the 2012 edition of the standard.

Each category includes a minimum Arc Rating (AR) value for the required PPE. This value is determined by the PPE manufacturer, and indicates the amount of heat energy (in cal/cm²) that the clothing can absorb or block before the wearer would be likely to receive a second-degree burn. (Second-degree burns are expected when skin is exposed to 1.2 cal/cm² of incident energy.)

Category 1 and 2 requirements can often be met with a single layer of arc-rated PPE. To meet category 3 or 4 requirements, multiple layers of PPE may be required. To ensure effective protection, these layers need to be tested together to receive a complete system arc rating.

Before AR became the standard rating system for arc flash PPE, Fire Resistance (FR) was used. FR and AR are not the same: all arc rated PPE is also fire resistant, but not all fire resistant PPE is arc rated.

PPE CATEGORY 1

Minimum Arc Rating of
4 cal/cm²

Arc Rated Clothing:

- AR long-sleeve shirt and pants, or AR coverall
- AR face shield, or AR flash suit hood
- AR jacket, parka, rainwear, or hard hat liner (as needed)

Protective Equipment:

- Hard hat
- Safety glasses or safety goggles
- Hearing protection (with inserts)
- Heavy-duty leather gloves
- Leather footwear (as needed)

PPE CATEGORY 2

Minimum Arc Rating of
8 cal/cm²

Arc Rated Clothing:

- AR long-sleeve shirt and pants, or AR coverall
- AR flash suit hood, or AR face shield and AR balaclava
- AR jacket, parka, rainwear, or hard hat liner (as needed)

Protective Equipment:

- Hard hat
- Safety glasses or safety goggles
- Hearing protection (with inserts)
- Heavy-duty leather gloves
- Leather footwear

PPE CATEGORY 3

Minimum Arc Rating of
25 cal/cm²

Arc Rated Clothing:

- As required: AR long-sleeve shirt, AR pants, AR coverall, AR flash suit jacket, and/or AR flash suit pants
- AR flash suit hood
- AR gloves
- AR jacket, parka, rainwear, or hard hat liner (as needed)

Protective Equipment:

- Hard hat
- Safety glasses or safety goggles
- Hearing protection (with inserts)
- Leather footwear (as needed)

PPE CATEGORY 4

Minimum Arc Rating of
40 cal/cm²

Arc Rated Clothing:

- As required: AR long-sleeve shirt, AR pants, AR coverall, AR flash suit jacket, and/or AR flash suit pants
- AR flash suit hood
- AR gloves
- AR jacket, parka, rainwear, or hard hat liner (as needed)

Protective Equipment:

- Hard hat
- Safety glasses or safety goggles
- Hearing protection (with inserts)
- Leather footwear (as needed)

Use of Hand Tools

Safe Work Practice

General

Protecting workers from injuries associated with the use of hand tools.

Protective Mechanisms

- PPE (Safety boots, hard hat, glasses, high vis., safety vest, gloves)

Selection and Use

- As per job requirements

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.

Worker Responsibility

- Inspect tools for defects before use. All unsafe hand tools shall be disposed of or repaired immediately.
- Wrenches including adjustable, pipe end and socket wrenches shall not be used when jaws are sprung to the point that slippage occurs.
- Redress burred or mushroomed heads of striking tools.
- Replace cracked, splintered, or broken handles on files, hammers, screwdrivers, or sledges.
- Do not use tools for jobs they are not intended to do. For example, do not use a slot screw driver as a chisel, pry bar, wedge or punch or wrenches as hammers.
- Do not apply excessive force or pressure on tools.
- Do not cut towards yourself when using cutting tools.
- Do not carry tools in a way that interferes with using both hands on a ladder, while climbing on a structure, or when doing any hazardous work. If working on a ladder or scaffold, tools should be raised and lowered using a bucket and hand line.

Lead Paint

Safe Work Practices Developed by Greg Cameron/Lee Halls

General

Protecting workers from injuries associated with the use/removal of lead paint.

Protective Mechanisms

- Equipment Maintenance procedure
- Barricades and warning signs
- Communication devices
- ERP (Emergency Response Plan)
- PPE (Safety boots, hard hat, glasses, high vis., safety vest, gloves and coveralls)

Selection and Use

- Manufacturer specifications

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Hazard analysis
- Worksite inspection
- Equipment selection

Worker Responsibility

- Keep children, pregnant women, and adults with high blood pressure out of the work area.
- Remove all food and eating utensils from the work area.
- Wear a respirator or, at the very minimum, a mask which can filter fine dust. Also wear protective coveralls, gloves and goggles. Dispose of these items with the other lead contaminated materials.
- Do not eat, drink or smoke in the work area. Wash hands before eating, drinking or smoking.
- Remove work clothes before eating and after cleaning up the work area. Never shake out clothes.
- Do not wear work clothing outside the work area. Do not wash the work clothes with other clothes. Shower and wash hair as soon as possible.
- Seal off all air-ducts and vents.
- Work areas should be well ventilated. Open windows to let in fresh air and use an exhaust fan to pull contaminates to the outside.

- Work in one room at a time. Work areas should be completely sealed off from other rooms in the house with plastic.
- Contain the dust and paint chips using plastic draping or tarp.
- Bag and dispose the waste.

Working Around Wildlife, Rodents & Bats

Safe Work Practices (Developed by Greg Cameron & Phil Post)

General

Protecting workers from injuries associated with working around rodents and other wildlife in ceiling spaces, crawl spaces or work areas. Bites, scratches and droppings from animals can cause a wide range of minor to serious health issues. It is imperative to report any form of sighting or contact.

When working around areas contaminated with bird and bat droppings, workers can be exposed to fungi that can cause serious infections called Histoplasmosis or Cryptococcosis.

While fresh bird droppings are not expected to contain the fungi, fresh bat droppings may be contaminated. Disturbing the droppings or contaminated soil may release tiny particles into the air called "spores". The spores can be inhaled and infect a worker's lungs.

Most people who become infected with the fungi experience no symptoms, but some may experience mild flu-like symptoms. For some people, especially those with weakened immune systems, the disease can be life-threatening because it can spread to other areas of the body, become severe and eventually cause death.

People and wildlife live side by side in Alberta, therefore, encounters with small wild animals are common. Most small animals are not aggressive; however, conflict may occur when they are trying to meet their basic needs of finding food, water and shelter. It is important to understand and recognize basic animal behaviours, to prevent injuries to both animals and humans. Never touch or handle wild animals – healthy, sick or deceased. Parasites and other infectious diseases may be present. **If bitten by a wild animal, clean the wound with iodine, soap and water, and obtain medical assistance immediately, advising medical staff of the potential for infectious diseases, such as rabies**.

When working in areas with confirmed sightings of wildlife, rodents, bats and droppings; it is strongly recommended that you get a rabies vaccine prior to working in these areas

Application

Always assume droppings are contaminated. Take the following precautions to reduce your risk of infection

- Call your supervisor, lead or foremen as soon as you see or hear any droppings, wildlife, rodents, etc.
- DO NOT attempt to remove waste or any product associated, please wait for further instructions
- If you have a weakened immune system, you should consult your doctor before working in the area.
- Avoid disturbing material that could be contaminated to prevent the generation of dust and inhalation of spores.
- Never dry-sweep or dry-shovel material. Soak the material with water or a wetting agent to keep dust and spores down.

Protective Mechanisms

- Basic PPE
- Rubber boots (if walking in and around waste or animals)
- Disposable gloves under work gloves
- Disposable coveralls
- Respiratory protection.
- ERP (Emergency Response Plan)

Selection and Use

- As per job requirement

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.

SAFE WORK PRACTICES

HAZARD ASSESSMENT – REVIEW PROCESS

There shall be maintained review process for all safe work practices for the Arcom Technical Services Ltd. This review process shall take place during each monthly safety summary meeting.

This is not limited to daily employee input or site reviews that may take place during the Work Site Hazard Assessment (WSHA). All newly identified job site hazards, either at commencement or during a project, shall be noted and corrected. The corrective action shall be updated and submitted on the project WSHA forms. There forms will be submitted to Arcom, so the Hazard Assessment documents may be updated and distributed.

All employees must be made aware of any new hazard on a project.

The review process and action must be signed and dated by senior management each month.

January _____

February _____

March _____

April _____

May _____

June _____

July _____

August _____

September _____

October _____

November _____

December _____

SAFE JOB PROCEDURES

SAFE JOB PROCEDURES INDEX

SAFETY/STANDARD JOB PROCEDURES POLICY

SAFE JOB PROCEDURES POLICY

It is our company's policy to reduce all risks to our employees, sub-contractors and property. This is achieved by a written set of standard safe job procedures in general terms outlining what must be done for each hazardous job.

It is the responsibility of our employees to ensure that all standard job procedures are followed, and all additional standard job procedures not presented in this document are implemented throughout the course of our business.

'A safe job procedure is a written, specific step-by-step description of how to complete a job safely and efficiently from start to finish. These procedures are developed because of the formal hazard assessments conducted for all worksites/tasks including the main office/shop. Look for the identified critical task list for an outline of what Safe Job Procedures should have been developed'

Alberta Construction Safety Association

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

Arcom Technical Services Ltd provides material, labour and design of low voltage signalling and telecommunications cabling infrastructures.

Our installations vary from commercial projects to institutional facilities. We provide infrastructures that pertain to the following low voltage applications:

1. Sound masking for office areas.
2. Data network cabling.
3. Telephone network cabling.
4. Security network cabling.
5. Fibre optic network cabling.
6. Intercom network cabling.
7. Nurse-call systems network cabling.
8. RFTV / Coaxial network cabling.
9. Testing of all telecommunication cabling networks.
10. Conduit and electrical installations that support the above systems.
11. Electrical and Lighting retrofits

Working With 347 Volts

Safe Job Procedure

General

The following provides a guideline to assist in defining safety steps and procedures suitable for facilities to keep employees and contract staff safe from potential hazards associated with working on 347-volt system ballasts. Working on live 347-volt systems presents unusual risks:

- 347-volt systems have complex circuitry
- 3-phase wire systems can become unbalanced when disconnected
- Neutral conductor can become live if not disconnected properly
- T-bar ceiling structure often associated with these systems can conduct electricity

Following the health and safety procedures outlined can reduce potential electrical hazards. OHSA and Regulations for Construction projects requires that all electrical work be performed by workers certified under the Trades Qualification and Apprentice Act (Regulations Section 182.1a) In addition, the Electrical Safety Authority recommends that only certified and licensed electricians work on 347-volt systems and 347-volt system ballasts

Protective Mechanisms:

- The following Personal Protective Equipment (PPE) must be used until systems are tested and confirmed.
- Safety Hard Hat
- Safety Glasses or Goggles
- Rubber gloves rated for 347/600 volts, worn with leather gloves on the outside
- Boot with di-electric property, dry and free of moisture
- V-rated tools

Safety Procedure:

ARCOM is committed to the preventing injuries by providing a safe and healthy environment for its employees. As a result, ARCOM requires electrical systems to be de-energized prior to conducting any electrical upgrades or maintenance work.

These steps will be followed to ensure that potential electrical hazards associated with 347-volt system ballasts are managed.

- Consult relevant electrical drawings and verify that actual wiring installations match the drawing.
- Inspect the work area for any potential electrical hazards such as faulty wiring prior to starting work.
- Check for power at the fixture – a proximity tester can be used. The following procedure should be followed for testing:
- Test the tester on a known circuit.
- Test the live on the circuit you are working on, see if it is energized.
- Go back and test the known circuit for verification.
- Identify the circuit at the panel to be disconnected.
- De-energize the system.
- Lockout & tag out at the panel or switch.
- Verify that you have de-energized the correct circuit – Test the two circuit conductors feeding into the fixture and test each to ground to verify both wires are dead. This procedure requires that you use an approved Category III meter when testing, and that you use the same 3-point testing method outlined above (A.B.C.)

Supervisor Responsibility:

Supervisors are responsible to instruct workers and contract staff to de-energize 347-volt system ballasts prior to initiating electrical work and/or maintenance in accordance with the requirements specified in the Occupational Health and Safety legislation (OHSA) and the Alberta Electrical Safety Code.

Any decision to do live work will be made by the Supervisor in conjunction with the Company's Safety Director. In the field, a risk analysis or job safety plan must be carried out by the supervisor to assess the level of risk of the work being done.
Supervisors are responsible for ensuring employees are provided with personal protective equipment, and that timelines for inspection and maintenance of personal protective equipment have been established and communicated.

Worker Responsibility:

Employees are responsible to notify supervisors of the need for Personal Protective Equipment, and to ensure that 347-volt systems are de-energized, tested, and locked-out/tagged-out.

FIBRE SPLICING

SAFE JOB PROCEDURES

GENERAL

Protecting workers from injuries associated when Splicing Fibre Optic cabling

APPLICATION

At all times when splicing Fibre

PROTECTIVE MECHANISMS

- Safe job procedures
- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)
- Manufacturers specifications
- ERP (Emergency Response Plan)
- Arcom Waste Container
- Gloves

SELECTION AND USE

- Fuser, stripping tool, cleaver, alcohol, Velcro, tray, fibre termination ends, test equipment, cotton wipes

SUPERVISOR RESPONSIBILITY

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.

WORKER RESPONSIBILITY

- Examine area and determine best location for setup to alleviate traffic problems and potential safety problem
- When handling, cutting and cleaving fibre extreme caution must be used as Fibre shards can easily enter your skin as slivers, use caution not to wipe eyes as they are nearly impossible to visually see.
- Use proper cutter to cut length and discard fibre in Arcom Waste container
- Strip and clean fibre with alcohol prior to cleaving, ensuring all ends are in waste basket of fuser
- Insert cleaned and cleaved fibre individually in fuser
- Once fused, place in sticky pack, then into appropriate trays
- Tie down excessive fibre to allow for maintenance access
- Clean all excess fibre shards and dispose in Arcom Waste Container to alleviate cuts and slivers
- Extremely important to not dispose of any fibres ends(shards) on site, the garbage can on cleaver and cut ends must be put into a sealed baggy and disposed of at the Arcom office.

Step Ladders

Safe Job Procedures

General

Protecting workers from potential injuries involving the use of step ladders

Application

Use of step ladders to complete work at heights

Protective Mechanisms

- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)

Job Steps

- Always inspect your ladder for cracks, splits, twisted or jammed parts and loose screws, rivets and rungs prior to use.
- Make sure the ladder is placed on even ground and within reach of your work.
- If you are setting up in front of a door, lock it, open it, utilize a spotter or hang a sign to notify others that you are there.
- Be certain the spreaders are fully extended before climbing the ladder.

Safety Tips

- Face the ladder when climbing up or down.
- Keep your body centered between the side rails.
- Step ladders are required to be fully open while in use. Do not climb a step ladder that is leaning against a wall or any other surface.
- Always climb or descend facing the ladder.
- Never stand on the extension arms, braces, paint shelf, or top two steps.
- Do not paint or repair wooden ladders.
- Dispose of broken ladders immediately.
- Do not over reach. Move the step ladder when needed.
- Do not “shift” or “walk” the ladder when standing on it.

Extension Ladders

Safe Job Procedures

Protective Mechanisms

- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)

Job Steps

- Always inspect your ladder for cracks, splits, twisted or jammed parts and loose screws, rivets and rungs.
- Make sure the ladder is placed on even ground and within reach of your work.
- If you are setting up in front of a door, open the door or lock it.
- Set the ladder ¼ the total extended length, back from the vertical position.
- Use secure blocking; tie the base of the ladder off or have someone hold the ladder.
- Ladder should extend 3 feet past the top of any surface you intend to climb on to.

Safety Tips

- Use the three-point contact method when climbing or descending a ladder.
- Always climb or descend facing the ladder.
- If reaching to the side from the ladder tie off the top rung to a solid object.
- Never use an extension ladder near overhead power lines.
- Do not paint or repair wooden ladders. Dispose of broken ladders immediately.

Boom or Scissor Lift

Safe Job Procedures – Created by Johnathon Van Capelle

General

Protecting workers from injuries associated to using a boom or scissor lift

Application

At all times when using a lift

Protective Mechanisms

- Fall protection and Ariel left safety course (current)
- Inspected and current safety harness and lanyard (different lanyards depending on lift or fall plan)
- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)
- Manufacturers specifications
- ERP (Emergency Response Plan)
- Fall protection plan

Selection and Use

- While using an elevated work platform for any reason

Supervisor Responsibility

- Ensure workers have a valid and current Fall and Lift Ticket
- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Ensure workers are following all rules, regulations and inspection requirements are laid out in the document.
- Ensure all workers are carrying out their responsibilities

Worker Responsibility

- You must have a valid and current Fall and Lift ticket
- You must wear a valid, inspected and up to date safety harness
- Inspect the lift prior to using; follow the safety manual for the lift and complete a 'function test'
- Review and confirm that the lift has been inspected and it is current
- Properly complete a test on all arms and where about of all parts to inspect
- Fall protection shall be used when a worker is at risk of being ejected from the platform. The fall protection provided by the guardrail must be augmented by a fall arrest or a travel restraint system attached to the platform or device. A mobile elevating device shall not be moved unless all workers on it are protected against falling by a full body harness or a safety belt attached to specified attachment points on the platform
- While working on a mobile elevating device, you must use an approved harness fall arrest system consisting of a full body harness or 5-point harness with lanyard
- The lanyard or strap shall be attached to the boom, basket, or platform prior to operating or elevating any mobile elevating device, as specified in the Operator's Manual
- Tying off to an adjacent structure or equipment while working from the basket, or platform should not be permitted
- Communication and observation are essential at all times. This includes a two- way walkie-talkie system and hand signal system.
- Personnel should not work from mobile elevating devices when:
    - Exposed to extreme weather conditions (thunderstorms, heavy rain, extreme heat or cold) unless provisions have been made to ensure their safety and /or protection.
    - Winds exceed the manufacturer's recommendations.
- Personnel should not sit or climb on the guardrail of the basket/platform.
- Personnel should not climb up to an already elevated platform.

- If the operator's manual is missing and/or any registration decals are not clearly visible, the equipment should be rendered out of service.
- If any function is not working as expected the equipment should be rendered out of service.
- Never exceed the rated workload of the platform as per section 148(a) of O. Reg. 213/91. Section 144(8) of O. Reg. 213/91 requires a sign visible to the operator at its controls indicating the rated working load.
- Do not alter or disconnect or disable any safety device (as per section 28 of OHSA).
- Smoking while near the batteries or fuel supply of any mobile elevating devices is extremely dangerous and may cause an explosion.

Use of Power-Operated Hand Tools

Safe Job Procedures

Protective Mechanisms

- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)

Job Steps

- Inspect tools for any damage prior to each use.
- Test the tool before using it to make sure it is in proper working order. If not, the tool must be serviced and not used until repaired.
- Wear or use personal protective equipment (PPE) that is appropriate for the work you are doing.
- Disconnect the power supply before adjusting or changing accessories.
- Electric power operated tools shall be the approved double-insulated type or grounded.
- Do not use electric cords for hoisting or lowering tools.
- The fluid used in hydraulic powered tools must be fire-resistant and the manufacturers' safe operating pressures for hoses, valves, pipes, filters and other fittings must not be exceeded.
- Only employees who have been trained shall use a powder-activated tool.
- Tools must not be loaded until just prior to the intended firing time. DO NOT point tools at any employees. Hands must be kept clear of the open barrel end.
- Tools must not be used in an explosive or flammable atmosphere.
- All tools must be used with correct shield, guard or attachment recommended.
- Be aware of your hand placement on your tools to avoid pinch points.

LOCK OUT PROCEDURE - GENERAL

SAFE JOB PROCEDURES

PROTECTIVE MECHANISMS

- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)
- Locks and Tags

JOB STEPS

- Communicate with those around you to determine what work is being done, and how it could affect you.

- If any device/machine/piece of equipment is to be locked out, and there is a risk of potential injury to you should the lock be removed, you must also place a lock on the lockout being used and add your name to the lockout tag. If there is not enough room for you to add your lock, an alternate lockout must be used, or a separate multi-lock attachment must be used.

- The lock you use must be your own personal lock and must only have one key. Do not give your key to anyone. If you must leave the site, you key, and lock must be properly transferred to a new worker so that the lock can be removed upon completion of the work or in case of an emergency. When this happens, the new worker must be made aware of the work being done, and all potential hazards. The new worker must add their name to the lock out tag.

- Another option if you need to leave site is to have a new worker attach their own personal lock to the lockout in place of yours. In this case, the new lock must be attached before your lock is removed.

- When your work is complete, and you have no other reason to be in the area, or there is no longer a risk of potential injury, you may remove your lock after communicating with others in the area that you are doing so.

Lock Out Procedure - Electrical

Safe Job Procedures

Protective Mechanisms

- PPE
- Lockouts
- Locks and Tags
- Multimeter/Voltage Tester



Job Steps

- Assess the work to be done to determine the risk of injury due to electric shock. If there is any potential risk, the equipment/machinery/device must be electrically locked out.

- Determine the most appropriate energy isolating device in the circuit to install a lockout. This could be a switch, fused disconnect, circuit breaker, etc. In most cases it is preferred that the source of the power be locked out (i.e.: a circuit breaker in the main panel).

- Select the appropriate lockout. There are several different styles to use in different situations, and they come in in different sizes. Consult your supervisor and/or safety rep if you are unsure as to which device suits the application required.

- The lockout must be installed so that it secures the power source in the OFF position.

- Once the lockout is installed, place a lock on it. This lock should prevent the lockout from being removed. It must be your own personal lock and must only have one key. Every worker, or group of workers, must place their own lock on the lockout. If there is no room for multiple locks, a different lockout must be used, or a separate multi-lock attachment must be used.

- Do not give your key to anyone. If you must leave the site, you key, and lock must be properly transferred to a new worker so that the lock can be removed upon completion of the work or in case of an emergency. When this happens, the new worker must be made aware of the work being done, and all potential hazards. The new worker must add their name to the lockout tag.

- Another option if you need to leave site is to have a new worker attach their own personal lock to the lockout in place of yours. In this case, the new lock must be attached before your lock is removed.

- Once the lock is secured, attach a tag to the lock or lockout. This tag shall contain the following information:
    - Your name
    - Date and time, you placed the lock
    - Date and time, you estimate work will be done
    - Instructions to not operate or remove
    - A brief description of work being done
    - Any other relevant information

    - Your signature

- Before you start work, ensure that the lockout has been installed properly and is performing its function by attempting to operate the locked-out energy isolating device. If you are working on a piece of equipment/machinery, attempt to start it to ensure that it won't start. Use your multimeter ONLY to verify absence of voltage (there should be none).

- Once the power is properly locked out, and all attempts to turn on devices/equipment have failed, you may start work.

- Upon completion of work, you may remove your lock and restore power after communication to others in the area that you are doing so.

MANUAL LIFTING

SAFE JOB PROCEDURES

PROTECTIVE MECHANISMS

- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)

JOB STEPS

- Whenever Possible, Use Electrical or Mechanical Aids to Lift or Move Objects.
- Assess the load. If you think you need help, ask for it.
- Get help with heavy or awkward loads.
- Be sure you can lift the load without over-exertion.
- Get a good footing.
- Bend your knees and have a good grip on the object to be lifted.
- Do not bend your back, keep it straight, lift with your legs and keep the object being lifted close to your body.
- Keep your balance and do not twist or turn as you lift.
- To put the object down again do not bend from the waist. Keep your back straight and bend your knees, keeping the object close to your body until it is placed in a secure position.

SCAFFOLDS

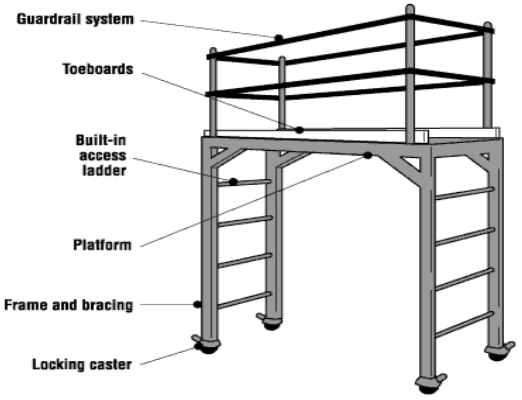
SAFE JOB PROCEDURES

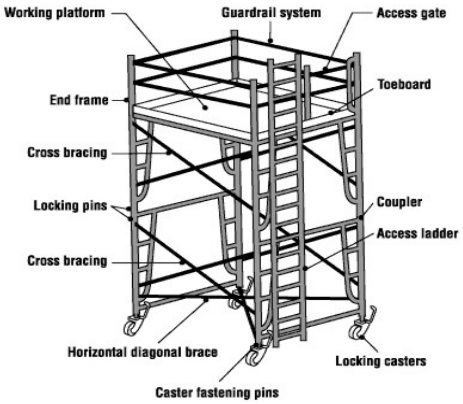
PROTECTIVE MECHANISMS

- PPE (Safety harness, safety boots, hard hat, safety glasses, high vis., safety vest, gloves)

JOB STEPS

- Assemble the rolling scaffold according to manufacturer's instructions.
- Ensure that the surface on which the scaffold is moved is level and without holes or obstructions.
- Brace all rolling scaffolds horizontally and diagonally.
- Cleat or secure all planks.
- Prevent joints from separating.
- Secure access ladders.
- Ensure that each wheel or castor is equipped with brakes to prevent rolling and swivelling.
- Lock the caster brakes before climbing onto scaffold.
- Secure or remove all material, equipment and personnel from platform before moving it.
- Push towards the base when moving.
- Refer to safety regulations for height stability requirements.





- Do not stay on the scaffold when it is being moved. If a worker must remain on the scaffold, make sure the worker is secured to the building (not the scaffold) with appropriate safety harness and lanyard.
- Do not try to move a rolling scaffold without enough help. Watch out for slopes, holes, debris, and overhead obstructions.
- Do not extend adjusting screws more than the manufacturer recommends.
- Do not allow the working platform height to exceed three times the base width, unless it is guyed and equipped with outriggers or otherwise stabilized.
- Do not use powered devices to move scaffolds.
- Do not lean access ladders against rolling scaffolds.

Rescue of a Worker Suspended In a Safety Harness

Safe Job Procedures

CALL 911

The rescue of a worker who has fallen and is being suspended in his/her safety harness needs to be undertaken as quickly as possible for several reasons:

1. The worker may have suffered injuries during the fall and may need medical attention.
2. Workers suspended in their safety harness for long periods may suffer from blood pooling in the lower body and this can result in 'suspension trauma'. (See attached information on treating trauma – have this available on site to provide to First Aid team and to external emergency crews.)
3. The suspended worker may panic if they are not rescued quickly.
4. The even that led to the fall may create additional risks that need to be addressed.

General Rescue Procedures:

A. Follow the process of the Emergency Response Plan (ERP). Should there be none, continue to B.

B. If an Elevated Work Platform is available on site:
   - Bring it to the site and use it to reach the suspended worker.
   - Ensure that rescue workers are protected against falling
   - Ensure that the EWP has the load capacity for both the rescuer(s) and the victim.
   - If the victim is not conscious, 2 rescuers will probably be needed to safely handle the weight of the victim.
   - Position the EWP platform below the worker and disconnect his lanyard when it is safe to do so.
   - Reattach the lanyard to an appropriate connection point on the lift.
   - Treat the victim for Suspension Trauma and any other injures.
   - Arrange for Transport to nearest hospital.

C. If no Elevated Work Platform is available:
   - Where possible, use ladder(s) to reach the victim.
   - Rig separate lifelines for rescuers to use while carrying out the rescue from the ladder(s).
   - If worker is not conscious or cannot reliably help with his/her own rescue, at least 2 rescuers may be needed.
   - If worker is suspended from a lifeline, where possible, move the suspended victim to an area that can be safely reached by the ladder(s)
   - If victim is suspended directly from his/her lanyard or from a lifeline, securely attach a separate lowering line to the victim's harness
   - Other rescuers should lower the victim while he/she is being guided by the rescuer on the ladder
   - Once the victim has been brought to a safe location, administer First Aid and treat the person for Suspension Trauma and any other injuries
   - Arrange for transport to the nearest hospital

D. If the injured person is suspended near the work areas and can be safely reached from the floor below or the area they fell from:
    - Ensure that rescuers are protected against falling
    - If possible, securely attach a second line to the workers' harnesses to assist in pulling them to a safe area. (Note: at least 2 strong workers will be needed to pull someone up.)
    - Ensure that any slack in the retrieving lines is taken up to avoid slippage
    - Once the victim has been brought to a safe location, administer First Aid and treat the person for Suspension Trauma and any other injuries and arrange for transport to the nearest hospital.

E. If a person has fallen and is suspended in an inaccessible area (e.g. a tower, against a building or structure that has no openings):
    - Specialized rescue techniques are needed for this type of situation. It may involve a rescuer rappelling or being lowered down to the victim, it may involve using a lifeline to retrieve the fallen worker, or the use of high-reach emergency equipment.
    - Due to the inherent risk to the rescuers and/or the victim, this type of rescue should not be undertaken by people without specialized training and experience.

Drywall Ceiling Extraction Plan

Safe Job Procedures – Developed by Phil Post

Pre-entering of ceiling space

- extra boards must be kept on hand to allow for second worker to enter ceiling.
- identify alternate access hatches to be used in emergency.
- ensure crew on ground understands roles and tasks on even of emergency
- Never leave worker alone in ceiling. One crew must always remain in verbal contact range.

Actions on worker getting stuck

- notify Site Lead/Project Foreman immediately.
- attempt to gain visual of stuck worker, talk worker free of obstruction.
- failing that second worker climbs into ceiling and assists worker to get free.
- if alternate path can not be found workers shall strategically cut new hatch into ceiling.
- if worker can not be freed, call fire department.

Actions on worker getting injured, but still mobile

- notify Site Lead/Project Foreman immediately.
- attempt to gain visual of injured worker, identify seriousness of injury.
- if appropriate call fire department/ems
- second worker climbs into ceiling and makes safe all hazards, provides first aid.
- cut new hatch as close as possible to worker.
- assist worker in moving to hatch, down ladder.

Actions on worker getting injured, not mobile

- notify Site Lead/Project Foreman immediately.
- attempt to gain visual of injured worker, identify seriousness of injury.
- if appropriate call fire department/ems
- second worker climbs into ceiling and makes safe all hazards
- large hole will be cut in ceiling as close to worker as possible.
- provide first aid until Fire department/EMS arrives

Conduit Installations For Cabling

Safe Job Procedures developed by Arthur Smith

Equipment Required

- Conduit bender, round file, hacksaw, screw drivers and electric drill (cordless).

Material Required

- Conduit, couplings, connectors, straps, screws and plastic anchors.

Protective Mechanisms

- PPE (hard hat, safety glasses, steel toed boots and ladder (if applicable)).

Job Steps

- Use hazard assessment sheets to identify any hazards and make safe.
- Plan conduit installation route and project requirements.
- Remove conduit from shipping bundle.
- If you need to drill through a wall (drywall or concrete) scan or x-ray the wall prior to cutting through the wall (see drilling through a wall)
- Install conduit sections with approved coupling / connectors, ensure connections are tight. When ladder is required, follow safety work practices guidelines.
- When using drill to support conduit anchors and straps, ensure cords are not a tripping hazard to you and others.
- Conduit shall be free of dents that may reduce the inside dimensions of the conduit.
- Conduit that is to be cut with hacksaw shall be secured by means to prevent movement while cutting. Conduit is to be cut at 90 degrees straight angle.
- Conduit that has been cut shall be free of burrs, use round file to remove from cut sections before installing conduit to ensure smooth edges.
- When conduit installation has been completed, inspect work to ensure proper installation methods have been followed.
- Clean area of material and garbage that may be a product of this installation.
- Conduit shall be installed according to CEC standards, being supported 1 foot from any connected box, and every 5 feet thereafter.

Please Note:

NO cutting into walls blindly; this is considered a safety infraction; employee will be written up for a safety infraction and will be removed from site

Arcom contracts out ALL wet coring

DRILLING THROUGH DRYWALL / CONCRETE

SAFE JOB PROCEDURES DEVELOPED BY MIKE HOLLOWAY & LEE HALLS

EQUIPMENT REQUIRED

- Cordless drill (cordless)
- Wall scanner
- Stud Finder
- Hepa Vacuum
- Hole saw kit
- Hand saw

PROTECTIVE MECHANISMS

- PPE (hard hat, safety glasses, steel toed boots and ladder (if applicable))

JOB STEPS

- Use hazard assessment sheets to identify any hazards and apply any of the 3 controls (elimination, PPE or administrative) to make it safe.
- Ensue that hazard materials report has been reviewed (if applicable). Drywall and Drywall mud of certain ages can contain asbestos material. Please see Asbestos procedures.
- Ensure that scan have been completed on BOTH sides of the wall if you are cutting /drilling through to the other side.
- Plan your cut prior to cutting.
- Set-up tent as needed to access penetration location
- Mark preferred location
- Note any obstructions on surface of wall in area of penetration on wall Penetration Permit (if applicable)
- Scan your wall
- If scan shows any electrical or other obstruction relocate to a different area or use a hand saw to open the wall and investigate the obstruction
- Cut opening in wall, utilizing hand saw or hole saw (ensuring NOT to drill both sides of the wall); inspect what is inside the wall.
- Check inside the wall for any obstructions and work around them.
- Ensure positive identity of the obstruction as electrical conduit can look like steel stud in low light
- Once completed; use HEPA vacuum to clean debris from space, do not leave any materials in ceiling space and clean up the area.

Please Note:

NO cutting into walls blindly; this is considered a safety infraction; employee will be written up for a safety infraction and will be removed from site

Arcom contracts out ALL wet coring

Cabling Termination

Safe Job Procedures developed by Arthur Smith

Equipment Required

- Applicable termination tool, cable cutter, cable stripper and Velcro cable straps.

Material Required

- Applicable termination ends / fittings.

Protective Mechanisms

- PPE (hard hat, safety glasses, steel toed boots and ladder (if applicable)).

Job Steps

- Use hazard assessment sheets to identify any hazards and make safe.
- Plan cabling termination route and project requirements.
- Arrange cabling and secure with Velcro cable straps to applicable termination structure.
- When cables are secured, arrange cabling to be prepared for termination.
- Use appropriate cable stripping tool, adhering to the manufacture's installation guidelines. Ensure and make safe any potential cutting hazard to workers hands.
- Once cables have been stripped as per required, ready cable / arrange for termination in applicable device end.
- Terminate using the manufactures guidelines and applicable termination tool. Types of tool will vary as per type of system.
- Once terminating is complete, ensure labelling per termination point is correct.
- Test cabling with applicable cable meter / device.
- Clean area of material and garbage that may be a product of this installation.

Cabling Installation

Safe Job Procedures developed by Arthur Smith

Equipment Required

- Cable reel dispenser, fish tape, cable lubricant and rags.

Material Required

- Cable (applicable to installation type), cable lubricant, cable cutter, electrical tape and ladder (if required).

Protective Mechanisms

- PPE (hard hat, safety glasses, steel toed boots and ladder (if applicable)).

Job Steps

- Use hazard assessment sheets to identify and hazards and make safe.
- Plan cabling installation route and project requirements.
- Remove cabling reels from shipping containers. Caution to be used when lifting cable reels. Refer to lifting guidelines in safe work practices section. Set cabling reels on dispenser.
- Install fish tape in conduit (if applicable) to allow installation / pulling of cable. Ensure fish tape is controlled to avoid hazard. When ladder is required, follow safety work practices guidelines.
- Connect applicable cabling to fish tape to allow installation. Attach cabling by securing with electrical tape to fish tape.
- Commence cabling installation / pulling. Ensure the cable feeds freely into conduit system that cable does not bunch or snag. Apply cable pulling lubricant if applicable to cable. Ensure no lubricant is dripped / lost so that it may be in contact with a ladder or floor. Use rags to contain lubricant.
- Ensure the installation / pulling is at a slow and even pace to avoid cabling dispensing from the reels improperly.
- When cabling has been installed to the applicable length, wipe off any remaining cable lubricant with the rages.
- Cut the cabling from the dispensing reels to the required length.
- Clean area of material and garbage that may be a product of this installation.

Coaxial Cable Installation

Safe Job Procedures developed by Arthur Smith

Equipment Required

- Cutters, Strippers, Crimper, screw driver

Material Required

- Coax cabling, F-connectors, finishing cover, coax coupler (if required)

Protective Mechanisms

- PPE (hard hat, safety glasses, steel toed boots and ladder (if applicable)).

Job Steps

- Use hazard assessment sheets to identify any hazards and make safe.
- If using a stripping tool, the roundness of the cable should be determined. (To properly function, most stripping tools require a round cable). Plan cabling termination route and project requirements.
- To restore the cable's roundness, gently squeeze the cable between thumb and finger.
- Using a stripping tool, strip the cable to a dimension of .250" exposed braid and .157" exposed center conductor. The center conductor can be .125" - .157" in length.
- Then separate the braid from the dielectric – folding the braid back against the cable jacket. Make sure that no braid strands are wrapped around the center conductor. Trim any strands that are loose or in the way.
- Slide the connector's compression support rind over the cable and the folded braid. Seat against the jacket cut point.
- Straighten the center conductor, if necessary, and slide the pin over the center conductor, spin the pin assembly until the pin is fully threaded against the cable's dielectric. Pull the pin holder straight out to remove it from the pin. Make sure that the pin is straight in line and not crooked or tilted.
- Inspect the assembly to ensure that no raid shield strands are in the exposed dielectric area between the compression support ring and the pine base. Loose strands will cause the shield too short to the center conductor.
- The connector assembly should then be places into the rear of the BNC or RCA plug and inserted until the rind is visible in the sight window and it 'clicks. The click is the center pin being secured by a mechanism within the connector body.
- While maintaining pressure on the cable to ensure that the assembly stays properly seated within the connector body, apply the crimping tool and crimp.
- Remove the tool and inspect the crimp to make sure that the connection is fully viable.
- Clean area of material and garbage that may be a product of this installation.

ASBESTOS

SAFE JOB PROCEDURES DEVELOPED BY ARTHUR SMITH

PROTECTIVE MECHANISMS

- PPE (Breathing mask, hard hat, safety glasses, steel toed boots and ladder (if applicable)).

JOB STEPS

1. Determine the location of the asbestos and the current state of material
2. Complete workplace hazard assessment document and workplace corrective action document if applicable. Submit to Management / Safety staff for assessment.
3. Isolate employees from the hazard through safety equipment or a referred abatement plan by other qualified parties. With encapsulated asbestos there is no immediate danger unless encapsulation has been scarred or damaged. Contact the owner for clarification, direction and job action to be taken
4. In areas that are suspected of containing asbestos, have qualified persons contracted to provide pre-construction air quality testing. Owner to provide at their / additional costs. Have qualified persons take primary samples of areas that will be affected by construction or refer to documents that may exist of previous sample testing that may have been performed. Air quality is to be sampled and tested throughout the construction / project duration.
5. No employee shall drill, penetrate, fasten or disrupt the asbestos in the course of performing their duties of installation or service.

WORKING WITH ASBESTOS

SAFE JOB PROCEDURES DEVELOPED BY PHIL POST - AUGUST 2018

GENERAL

Asbestos fibres must be inhaled to cause disease. Asbestos-containing products in good condition and that are not disturbed are not a direct health hazard. These products become a potential health hazard when they are **disturbed,** and fibres are released. Workers having the highest risk of asbestos exposure are those involved in asbestos abatement projects (removal, enclosure or encapsulation of asbestos-containing products), those doing maintenance on equipment or buildings that use asbestos-containing products, or those who may work in an area where asbestos is being disturbed by others.

Arcom's exposure is relatively low but each job will be assessed to determine the level of exposure prior to work commencement.

Where asbestos-containing products must be disturbed, four principles should be followed in any work procedures:

- Isolate the work area
- Protect workers
- Minimize the release of asbestos fibres
- Ensure that the area is properly cleaned up after the work is completed. Detailed recommended work practices for projects involving asbestos-containing materials are provided below.

EQUIPMENT REQUIRED

- Personal basic PPE (steel toed safety boots, hard hat, safety glasses, high vis safety vest, gloves)
- Specialized PPE (NOISH approved half mask respirator)
- Heppa Cart
- Heppa Vacuum
- Dust Bubble
- Asbestos debris disposal bags

JOB STEPS

- Ensure basic PPE is on
- Ensure Specialized PPE (NOISH approved half mask respirator)
- Place heppa cart in place and raise cart
- Put on disposal coveralls
- Ensure your safety glasses and gloves are ON

Option 1	Option 2
▪ Attach dust bubble ▪ Spray area with water ▪ Attached screws by placing your drill bit through the dust bubble	▪ Spray area with water ▪ Start the vacuum ▪ Drill hole or screw

- When you leave your work area; vacuum you, tools and cart with heppa vacuum
- Place ALL debris collected into a clearly marked asbestos bag and seal for disposal
- Leave coveralls in the heppa cart

SAFETY TIPS

- Ensure no particles are left on your clothing
- Ensure your half mask if fitting properly
- Put on safety glasses before you put on your respirator

Working Around Wildlife, Rodents & Bats

Safe Job Procedures (developed by Greg Cameron & Phil Post)

General

Protecting workers from injuries associated with working around rodents and other wildlife in ceiling spaces, crawl spaces or work areas. Bites, scratches and droppings from animals can cause a wide range of minor to serious health issues. It is imperative to report any form of sighting or contact.

Application

At all times in areas of confirmed wildlife, rodents, bats and animal/rodent droppings.

Protective Mechanisms

- Safe job procedures
- PPE (safety boots, hard hat, safety glasses, high vis. safety vest, gloves)
- Manufacturers specifications
- ERP (Emergency Response Plan)
- Arcom waste container
- Gloves
- Rubber boots (if walking in and around waste or animals)
- Disposable gloves under work gloves
- Disposable coveralls
- Respiratory protection

Selection and Use

- Working in ceiling spaces, confined spaces, basements, etc.

Supervisor Responsibility

- Supervisors are responsible to facilitate and/or provide proper instruction to their workers on protection requirements and training.
- Direct worker on what to do if worker confirms sightings.
- Organize a proper clean up of site if confirmed droppings, nest or animal.
- Ensure building management or facilities management are aware of the confirmed sightings.
- Work with and in accordance building/facilities management procedures and protocols.

Worker Responsibility

- Examine area and determine if it is safe, clean and wildlife/rodent/bat free.
- Do NOT handle droppings, nest or wildlife/rodent/bat.
- Contact supervisor, foremen, acting site lead or safety officer immediately.
- Do NOT attempt to remove the material, but if you need to, please follow the instructions below:
  - Never dry-sweep or dry-shovel material. Soak the material with water or a wetting agent to keep down dust and spores.
  - Use a HEPA vacuum, if available, to clean up the contaminated material. Dispose of the waste in 6-ml disposal bags and follow the disposal procedures outlined in company policy.
  - Use a HEPA vacuum to clean up the contaminated material (if available).
  - Dispose of the waste in 6-ml disposal bags and follow the disposal procedures outlined in your company's health and safety policy. For larger contamination, a disinfectant may be used. For these applications, consult the manufacturer's directions.

REVIEW PROCESS

SAFE JOB PROCEDURES

A review of safe job procedures shall be implemented and address at each weekly site safety meeting to ensure current safety requirements are met. Any new procedures shall be added / updated to the Safe Job Procedures before any new practices are commenced to ensure worker safety. A company quarterly review will also be completed, so the Arcom safety manual outlining any new procedures can be kept current and up to date.

The scheduled safety meeting reviews, as well as the quarterly reviews, shall include the following items:

a) A description and outline of the safe job procedure.

b) The date and time of the procedure review.

c) Names of applicable staff that performed the procedure review

Arcom Technical Services Safety Administrator Shelley Smith will be responsible for ensuring these reviews will take place and be properly documented. The applicable document form shall be utilised. (See Safe Job Procedure template on the following page)

Restricted Space

Safe Job Procedures – February 2020

General

Protecting workers from injuries associated with entering a restricted space. Permits are not required for entry, as atmospheric hazards are not present. However, access to, or egress from the space may be limited and movement inside the space may be awkward or difficult. Restricted Spaces are identified in the Confined Space Inventory but are clearly marked as being Restricted rather than Confined spaces.

This Standard applies to all Restricted Spaces that Arcom will identify prior to job start and to any worker who performs or supervises work in these spaces.

Definition

A Restricted Space is one:

- which is fully or partially enclosed,
- that is not both designed and constructed for continuous human occupancy, but in which
- atmospheric hazards are not present nor likely to occur.

Working In Restricted Spaces:

The following items must be included in the procedures for entry and work in Restricted Spaces:

- Access to the space must be controlled and only authorized individuals who will work in accordance with entry, work and emergency procedures for that Restricted Space, shall be permitted access.
- Entry and work in a Restricted Space must be performed using the "buddy" system where at least one other person is present and in contact with the person in the space.
- A reliable means of communication must be available for Restricted Space Work. The method of communication must be tested prior to the commencement of work.
- Depending on the nature of the work and/or the Restricted Space, appropriate protective equipment must be provided and used.
- All sources of energy in and related to the Restricted Space must be properly controlled and locked out.
- Procedures must be in place for the removal of the worker from the space in the event of an emergency.
- A Risk Assessment form has been completed by a Competent Person; and

Protective Mechanisms:

- Safe job procedures
- PPE (Safety boots, hard hat, safety glasses, high vis., safety vest, gloves)
- ERP (Emergency Response Plan)
- Restricted Space signage for posted at the entry location

Supervisor Responsibility:

- Control access to and authorize work in these spaces;
- Provide specific entry, work and emergency procedures for these spaces;
- Ensure that workers are aware of and follow these procedures.
- To ensure that relevant people are informed of changes of shift, job suspension and/or job completion to ensure that the Entry Permit is cancelled or transferred as appropriate.
- To ensure all hazards associated with the proposed work in the restricted space have been identified, assessed and controlled.
- To outline how the work is to be undertaken (e.g. procedures, precautions, equipment, location, start time, duration) – verbally, and where necessary, in writing.

Worker Responsibility:

- work in accordance with the entry, work and emergency procedures for the Restricted Spaces in which they perform work.
- To satisfy themselves that they understand the requirements of the Entry Permit.
- To be skilled, qualified, trained and competent to perform the work, including the use of any PPE or rescue equipment.
- To adhere to the Entry Permit requirements.
- To ensure that the work is performed in a safe manner.
- To be aware of the hazards that could exist and have the necessary controls in place.
- To use all necessary PPE for the purpose for which it is provided as needed and appropriate.
- To make the work area safe and seek immediate advice if in doubt or if circumstances or conditions change.
- To make equipment and area safe on completion of the task.

The Stand-by Person:

- Stand-by Persons are required to keep open communication with the person or persons working in the restricted space and to act effectively in perceived emergencies.
- Agree upon and confirm the communication system or method before the worker enters the restricted space.
- Monitor the employee's entry into the confined space to ensure that it occurs safely, and that any lines and hoses do not foul or tangle.
- Ensure that equipment that is being used to support the worker operates effectively.
- Bring the employee out of the confined space immediately in the event of perceived danger, raise an alarm and take further appropriate emergency actions.

Signposting And Barricades:

- Before any work in relation to a restricted space starts, signs must be erected to prevent entry of persons not involved in the work. Signs must warn against entry by people other than those who are listed on the restricted space entry log.

Persons authorised to enter confined space

I have been advised of and understand the control measures and precautions to be observed with the entry and work in the confined space.

Entry			Exit		
Name	**Date**	**Time**	**Name**	**Date**	**Time**

Withdrawal of written authority

All persons and equipment accounted for Yes ❑ No ❑

Equipment checked and stored correctly Yes ❑ No ❑

Signed (*person in direct control*):

Date: Time:

Remarks or comments about the work:

SAFE JOB PROCEDURES TEMPLATE

SAFE JOB PROCEDURES DEVELOPED BY

EQUIPMENT REQUIRED

-

MATERIAL REQUIRED

-

PROTECTIVE MECHANISMS (PPE – ETC. SAFETY BOOTS, HARD HAT, SAFETY GLASSES, HIGH VIS., SAFETY VEST, GLOVES)

-

JOB STEPS

-

COMPANY RULES

COMPANY RULES INDEX

Rules And Regulations Policy

Arcom Technical Services Ltd is committed to excellence in the health and safety of its workers by providing an injury and accident free workplace. All workers are to abide by the regulations, safety rules, and the use of safe work practices and safe job procedures.

The prevention of accidents is an objective that all levels of our company and its operations are committed to.

We believe that safety is a high priority in operating our business. It is the intent of Arcom Technical Services to comply with all laws concerning the safety of our employees and the public.

Our goal is zero accidents and injuries. To achieve this goal, we must constantly be aware of conditions in all work areas that can produce or lead to injuries.

No employee is required to work at a job known to be unsafe or dangerous to his or her health. Your cooperation in detecting hazards, reporting dangerous conditions and controlling workplace hazards is a condition of your employment. Inform your superintendent immediately of any situation beyond your ability or authority to correct. Employees will not be disciplined for reporting any safety violation in good faith.

Every effort will be made to provide adequate training to employees. However, if you are ever in doubt how to perform a task safely, it is your duty to ask a qualified person for assistance. Employees are expected to assist management in accident prevention activities. Unsafe conditions must be reported immediately. Fellow employees that need help should be assisted.

- All unsafe acts and conditions, including "no-loss" incidents, are to be reported to appropriate supervision promptly.
- All incidents that result in damage or injury are to be reported to a supervisor immediately.
- First aid treatment is to be obtained promptly for any injury.
- Safety boots and safety glasses are always to be worn when on a working site.
- Hard hats -are to be worn when deemed necessary.
- All work shall be carried out in accordance with appropriate safe work practices and the supervisor's direction.
- Hand tools shall not be used for any purpose other than that intended. All damaged or worn parts shall be promptly repaired or replaced.
- All electrical hand tools-shall be grounded or double-insulated.
- Only those tools that are in good repair, with all guards and safety devices in place, shall be used, and only by authorized and trained personnel.
- Explosive/powder-actuated tools shall be used only by persons who have been instructed and trained in their safe use.
- Safety glasses, goggles or face shields shall be worn when concrete breaking, metal chipping, welding, grinding, cutting and for other operations which require eye protection.
- Every worker shall keep his/her work area neat, clean and orderly.

GROUNDS FOR DISMISSAL

RULES AND REGULATIONS

Consuming or being in possession of alcohol, illegal drugs or firearms on company premises, or on any company job site, is prohibited.

Fighting, horseplay, practical jokes or otherwise interfering with other workers is prohibited.

Theft, vandalism or any other abuse or misuse of company property is prohibited.

Violations will be handled in an objective but firm manner. Documentation is required at each stage. The steps of the enforcement progression will be:

Verbal Warning
Written Warning
Suspension
Dismissal

Any measure or combination of measures deemed appropriate to the circumstance can be used.

Note: The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date
AJ Smith e-signature	March 25, 2019

Safety Program Enforcement Policy

Rules and Regulations

The rules and regulations must be followed by every person without exception. The following progressive steps of discipline should be recognized as a guideline only. Each infraction will be viewed on its own specific merits on a case by case basis and the level of discipline will be determined. In the even that these rules are not held or followed, Arcom Technical Services ltd. Supervisors and or management may take the following actions steps to correct the behaviour.
Please note that each infraction is viewed as non-compliance with our safety policy and the employee will be asked to leave the job site immediately (without pay).

1. First infraction – Verbal Warning
2. Second Infraction – Written Warning
3. Third Infraction – Dismissal

Verbal Warning

A verbal warning shall be issued by the workers direct supervisor for any violation of the safety program. The supervisor shall ensure the worker understands the rules and regulations following the verbal warning. A notice of the warning shall be submitted to file or forwarded to the contractor's office.

Written Warning

A written warning will be issued by the employee's direct supervisor and be acknowledged by senior management of Arcom Technical Services Ltd. The warning may be issued on the first infraction depending on the severity. The written warning will be reviewed with the worker and acknowledged in writing to ensure understanding of the rules and regulations. It will be clearly outlined that no other violations will be permitted and that dismissal or removal from site will result should another infraction occur.

Dismissal

Any worker who continues to violate the rules and regulations following a written warning shall be immediately dismissed from their duties. In the case of a subcontractor, they will be banned from site.

Arcom Technical Services Ltd. puts the safety of our employees above all else

OUT OF TOWN POLICY

RULES AND REGULATIONS

DEFINITION

An employee shall be considered as working out of town if they are outside of the Edmonton area, and would be required to stay in a hotel/motel over one or more nights.

HOURLY RATE

Out of town rate will be considered the same as the regular rate unless otherwise specified by the specific project stipulations. Any incurred overtime hours will be calculated on the staff member's regular base rate. **ALL overtime hours must be approved, before the OT hours are worked,** by the PM&E in charge of that project. Any incurred overtime hours will be calculated towards '**ON SITE**' hours only. **No overtime will be paid for travel time**, which includes travel to site, travel from site and travel between sites. **All travel time is at regular rate ONLY**!

PER DIEM FOOD ALLOWANCE

If a staff member is working out of town (as per the definition above), a $40.00 per day allowance will be paid. Per Diem is not paid when work is a day trip in which the staff member returns to their residence at the end of each work day.

ACCOMMODATIONS

Arcom will pay for the accommodations required for out of town stays. Arcom will book the rooms on a company credit card or provide reimbursement for room receipt if personal credit card is used. Arcom will pay for rooms ONLY, any other charges such as phone calls, room service, etc. will be at the staff members own cost. Damage to any accommodations caused by a staff member will be at the staff members cost.

PER KILOMETER PAY

If a staff member is requested to use their **own** transportation to get to an out of town worksite or out of town accommodations, a mileage rate of 44 cents per kilometer shall be paid. This only applies to projects that are more than 50 kms from the Arcom head office. The applicable kilometer charges will be calculated from Arcom head office to the jobsite or hotel/motel. Calculations will be made on shortest distance between the destinations, referencing online Google map calculator. There is no per kilometer pay from hotel/motel to jobsite, unless they are more than 50 kms apart. There is no per kilometer pay when staff member is using an Arcom company vehicle.

SUBSTANCE ABUSE POLICY

RULES AND REGULATIONS

Arcom Technical Services Ltd.'s policy is to employ a work force free from the influences of alcohol, legal drug abuse or illegal drugs. Any worker who violates this policy will be disciplined. This may include immediate termination, even for the first offence.

Arcom Technical Services Ltd. strives to provide a safe and healthy work environment, free from the use of illegal drugs, alcohol and misuse for legal drugs, as set forth in the following rules:

1. Workers must not consume alcoholic beverages, ingest or inhale illegal drugs or misuse legally prescribed/over the counter drugs (more than prescribed dosages).
2. Workers must not report to work under the influence of alcohol or drugs. This includes any residual quantities that could remain in a person's system, as those quantities may still impair judgement and endanger the worker and/or others.
3. Arcom reserves the right to request a worker to submit to a drug or alcohol test **at any time**. Arcom reserves the right to implement random drug screenings for individuals, groups or the entire company without cause or a specified reason.
4. At no time shall an Arcom employee operate a company vehicle under the influence or residual effects of drugs or alcohol. Immediate termination of employment will result.
5. At no time shall an employee ingest or inhale drugs in accommodations paid for by Arcom or in accommodations which will be claimed for reimbursement to Arcom.
6. All incurred infractions, fines, damages, court costs, liability, law suits, corrective action costs, lost project cost, etc., that may be a result of, or contributing factor to, the violation of this policy and its outlined rules, shall be at the cost of the person found to be at fault or in violation. Arcom reserves the right to deduct any or all these costs from an employee's pay, or their final pay should termination be the result of disciplinary actions. Legal action will be under taken to recover any additional costs that may not be covered in appropriate pay deductions.

MODIFIED WORK POLICIES

RULES AND REGULATIONS

Arcom Technical Services Ltd. recognizes that returning an injured worker back to work following a work-related injury is of critical importance to both the worker and the company. It is the goal of Arcom Technical Services Ltd. to return injured workers to productive work as soon as they are medically able.

Arcom Technical Services Ltd. shall make every effort to accommodate temporary physical restrictions for those workers injured at work. Due to the nature of our business, the availability of transitional work may vary depending on job site and project demands. The transitional duties shall continue as long as the worker is showing progress that their condition is improving.

For an injured worker to be eligible for alternate duties, they must present their manpower coordinator with the Physicians Report of Injury listing any physical restrictions. The manpower coordinator in consultation with the WCB case worker assigned will assess the tasks that would be suitable given the physical restrictions.
In conjunction with WCB Policy 04-05, Part II, Application2, states:

> *A worker, while still recovering from a compensable injury, may benefit from temporary modified employment that helps the worker return to the pre-accident level of employment. In such cases the WCB will seek and promote modified work opportunities for the injured worker.*
> *When a worker is offered suitable modified employment that is appropriate to their physical and medical condition, the WCB determines whether it is reasonable for the worker to accept the employment. If it is reasonable, the WCB adjusts the worker's compensation benefits accordingly.*

Refer to Back to Work Modified Work Agreement
https://www.wcb.ab.ca/assets/pdfs/public/policy/manual/printable_pdfs/0405_2_app2.pdf

OFFER OF MODIFIED WORK

COMPANY NAME: Arcom Technical Services Ltd. _____

EMPLOYEE NAME: _____

(Print full name)

In keeping with our policy to consider alternate suitable employment for any employee unable to perform their regular work due to injury, we are offering the following modified work placement.

The modified work position is _____

(Name or description of position and department or location)

The duties you will be required to perform are as follows:

_____

_____

_____

(Describe specific job duties and the physical requirements of the position)

The hours of work will be from _____ to _____, _____
(Hrs) (Hrs) (Days of week)

The duration of the modified work placement will be from _____ to _____
(Date) (Date)

During the modified work placement your supervisor will be _____

(Name of supervisor)

Your rate of pay will be _____

(Pre-accident job rate recommended)

It is expected you will only perform the duties outlined above. _____

will monitor your progress and meet with you weekly to adjust your duties and/or length of placement as required based on your ability and relevant fitness information. If you have any difficulties performing the modified work please notify your supervisor immediately.

Offer accepted ☐

Offer rejected ☐ _____

(Reason)

Employee signature: _____ Date: _____

Employer signature: _____ Position: _____

IMPORTANT for WCB cases provide: _____
(Injured employee's WCB claim number OR date of accident and SIN or birth date)

Fax directly to WCB adjudicator/case manager, if known, or to (780) 427-5863

FITNESS FOR WORK

COMPANY NAME: Arcom Technical Services Ltd. _____

Company contact: _____

Designated contact Phone: _____ Fax: _____

Arcom Technical Services Ltd. is committed to doing everything we can to achieve a successful recovery and return to work for our injured employees. Our Disability Management program is designed to help them return to work safely and at the earliest opportunity, using appropriate modified work alternatives when required.

We need your help! Please complete the fitness-for-work section at time of treatment and fax to the above number, or have our employee return it. A reporting fee of $_____ will be paid.

Authorization to Release Information (to be completed by injured employee)

Injury: _____ Injury date: _____

I hereby authorize my treating health care provider to release information related to my fitness for work.

Employee's name: _____ Date: _____

(Print)

Employee's signature: _____

Fitness for Work (to be completed by treating health care provider)

Examination date: _____ Injury: _____

This worker is:

- ☐ not capable of any work How long? _____
- ☐ fit for regular work, no restrictions
- ☐ fit for modified work with the following recommendations:

Specific fitness recommendations and physical restrictions:

☐ Sedentary ☐ Light ☐ Medium … Heavy (see over for guidelines)

_____

_____

Estimated date fit for regular work: _____ Next appointment: _____

Health care provider's name: _____

(Please print)

Payment address: _____

Health care provider's signature: _____

Work Capabilities

Sedentary
- Lifting 10 lbs maximum
- Occasional lifting and/or carrying
- Primarily sitting with occasional walking/standing

Light
- Lifting 20 lbs maximum
- Frequent lifting and/or carrying up to 10 lbs
- May require walking/standing to a significant degree
- May involve sitting with pushing and pulling of arm and/or leg controls

Medium
- Lifting 50 lbs maximum
- Frequent lifting and/or carrying up to 20 lbs

Heavy
- Lifting 100 lbs maximum
- Frequent lifting and/or carrying up to 50 lbs

WORKING ALONE POLICY

RULES AND REGULATIONS

It is Arcom Technical Services policy to provide measures to protect the health and safety of, and minimize risk to, any worker working at a workplace who is the only worker of the employer at the workplace, in circumstances where assistance is not readily available to the worker in an event of an injury, ill health or emergency.

Whenever an employee must work alone, a work plan which considers the location and potential hazards of the work must be prepared.

The work plan must be reviewed by the employer, supervisor and any other party who is mentioned in the plan (I.E. call in location) before work starts.

The same plan may be used on future occasions provided any changes are reviewed by employee, supervisor and any other party mentioned in the plan before work starts.

When working alone in an office or base office

- The door must be kept locked
- Only authorized persons should be allowed to enter the building
- The work plan should include instructions for action in case an intruder enters the building

When working alone in a mobile vehicle or in the field

- The work plan must establish intervals for contacting the base or office during normal operations (i.e. every two hours)
- A means of communication such as mobile radio, cell phone, or land line phone must be established.
- The employee must contact the base or office upon entering or leaving a vehicle, and when entering and leaving a dead zone where radio or cell phone will not work, and at the normal intervals established by the work plan.
- When an employee has not contacted the base or office as scheduled, the contact must try to contact the employee.
- When it is not possible to contact the employee, the contact person must ask another base or office to try to contact the employee (to overcome radio or cell phone dead zones)
- When the employee can still not be contacted, the supervisor must be notified, and a search commenced.

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

WORKING ALONE PLAN TEMPLATE

Worker's Name: _____

Worker's Phone: _____

Worker's Job Title: _____

Supervisor: _____

Supervisor's Phone: _____

Contact Person: _____

Contact Person's Phone #(s): _____

Department: _____

Worksite (name, address,) location): _____

It is the responsibility of the supervisor to identify any hazardous agents or activities which arise from the conditions and circumstances of the worker's work.

IT IS STRONGLEY RECOMMENDED THAT HANDLING OF HAZARDOUS SUBSTANCES OR PERFORMING HAZARDOUS ACTIVITES BE PROHIBITED WHEN A WORKER IS WORKING ALONG.
WORK INVOLVING ENTRY INTO CONFINED SPACE MUST NEVER BE CONDUCTED ALONE.

What are the conditions or circumstances under which the employee is required to work alone:

_____

_____

Types of duties to be conducted stating limitations/prohibitions:

_____

_____

IDENTIFY HAZARDOUS ACTIVITIES THE WORKER MAY PERFORM WHILE WORKING ALONE:

Cash Handling Duties	☐	Work with Hazardous Substances	☐
Heavy Physical Labour	☐	Work with Heavy Machinery	☐
Use Ladders, Scaffolding	☐	Work with High Electric Currents	☐
Work with Animals	☐	Work with Power Tools	☐
Work At isolated Area	☐	Work with Equipment Under Pressure or Vacuum	☐

Other Activities Not Listed Above: _____

Personal protective equipment required: _____

Is the employee trained in the proper use of appropriate personal protective equipment and work procedures? Yes ☐ No ☐

Schedule for contacting the employee: _____

Means of communication: _____

Plan to assist the employee in case of an emergency: _____

_____

The working alone plan must be complied with by both the Employing Authority and the Employee. The working alone plan must be reviewed annually or more often if necessary. Records must be maintained of contact times and a check at the end of the work shift must be done.

_____ _____

Signature of Employing Authority Signature of Worker

_____

Date

VIOLENCE, ABUSE OR HARASSMENT POLICY

Arcom Technical Services is committed to providing a physically and psychologically healthy and safe workplace. The management of Arcom recognizes that workers and the company have a shared responsibility to promote the principles of mutual respect, confidentiality and cooperation, as outlined in this policy. Any act of harassment, or violence committed by or against any worker or member of the public is unacceptable and will not be tolerated.

PURPOSE

This policy outlines our commitment to protecting the psychological health and safety of our employees. The purpose of this policy is to ensure that Individuals are aware that any harm to psychological health and safety is considered a serious offence and therefore will be addressed accordingly. Those subjected to psychological harm will be assisted in the pursuit of their complaint and victims will be provided with appropriate support.

DEFINITIONS

Psychologically healthy and safe workplace

A workplace that promotes workers' psychological well-being and actively works to prevent harm to worker psychological health, including neglect, reckless, or intentional ways.

Workplace harassment

Means any objectionable or unwelcome conduct, comment, or action that a person knows or ought reasonably to know will or would cause offence or humiliation to a worker but excludes any reasonable conduct of an employer or supervisor in respect of the management of workers or the workplace.

Workplace violence

According to Alberta's Occupational Health and Safety Code, workplace violence means: "the threatened, attempted or actual conduct of a person that causes or is likely to cause physical injury." Examples of workplace violence include the following:

- Threatening behaviour such as shaking fists, destroying property or throwing objects
- Verbal or written threats (any expression of intent to cause harm)
- Physical attacks such as hitting, shoving, pushing or kicking.

Sexual Harassment

Unwanted sexual advances, unwanted requests for sexual favours, and other unwanted verbal or physical conduct of a sexual nature constitute sexual harassment when:

1. submission to such conduct is made either explicitly or implicitly a term or condition of an individual's employment; or
2. submission to, or rejection of, such conduct by an individual affects that individual's employment.

Sexual harassment can include such things as pinching, patting, rubbing or leering, "dirty" jokes, pictures or pornographic materials, comments, suggestions, innuendoes, requests or demands of a sexual nature. All harassment is offensive and in many cases it intimidates others. It will not be tolerated within our company.

PREVENTING WORKPLACE VIOLENCE

- Assess your work environment: Critically examine all areas of your work environment, including parking lots, entryways, reception areas, work areas, and offices. Is the lighting adequate? Are there convenient escape routes? Do you have a method to summon assistance?

- Pay attention to the warning signs: Many people who become violent communicate their intentions in advance. Threats from customers, current or former co-workers, or third parties should be reported immediately.

- Promote respect: The best way to prevent violence in the workplace is to foster a day to-day attitude of respect and consideration in your work environment for co-workers and clients.

- Eliminate potential weapons: Take a mental inventory of objects in your work area that could potentially be used as weapons. Remove or secure objects that could be thrown.

- Know your violence response procedures: Violence Response Procedures are simple plans designed to minimize injury during a violent incident. These procedures should include a plan to summon assistance and move people to a safe area.

- Trust your instincts: Don't ignore your internal warning system. If you sense impending danger, react accordingly.

- Use a team approach: If you are in a situation where hostility could occur, use the "buddy system."

Training

Arcom will train/educate all staff (managers, supervisors and field staff) on Arcom's code of conduct; the definitions of violence, abuse and harassment, how to prevent violence; to whom to report concerns; and the organization's abuse, violence and harassment policies.

Management Responsibility

It is the responsibility of a director, manager, director of human resources or any other person within this company who supervises one or more employees to take immediate and appropriate action to report or deal with incidents of harassment of any type, whether brought to their attention or personally observed. Under no circumstances should a complaint be dismissed or downplayed, nor should the complainant be told to deal with it personally.

- Foster an organizational culture that promotes psychological health and safety.
- Ensure that a psychological health and safety management system is in place to provide a work environment that is free from psychological harm.
- Ensure that every reported incident of psychological harm is investigated, in an objective and timely manner, and potential areas of improvement are identified.
- Ensure that the worker is advised to consult a health professional if the worker reports psychological injuries or adverse symptoms from psychological harm.
- Maintain the confidentiality of the individuals concerned, except where disclosure is necessary for the purposes of investigating the complaint or taking disciplinary measures in relation to the alleged complaint if discipline is being imposed.
- Providing appropriate support for workers who are affected.

Worker Responsibility

- Workers of (this organization) are required to be familiar with and follow the procedures that are in place to protect their psychological health.
- All employees are to participate in the instruction of violence and harassment prevention. Workers have the responsibility to treat each other with respect. Workers are required to immediately report all violations of this policy to their supervisor.
- Workers are responsible to co-operate in the investigation of complaints. Anyone who investigates or gives evidence in a complaint investigation shall keep details confidential.
- Workers are also responsible for participating in work site hazard assessments and implementing controls and procedures to eliminate or control the associated hazards.

No action shall be taken against an individual for making a complaint unless the complaint is made maliciously or without reasonable and probable grounds. Reasonable actions by managers or supervisors to help manage, guide or direct workers or the workplace are not harassment. Appropriate worker performance reviews, counselling or discipline by a supervisor is not harassment.

How To Proceed If You Are Being Harassed

1. If it is possible, tell the harasser that their behaviour is unwelcome and ask them to stop.
2. Keep a record of incidents (date, times, locations, possible witnesses, what happened, your response). You do not have to have a record of events in order to make a complaint, but a record can strengthen your case and help you remember details over time.
3. Make a complaint. If, after asking the harasser to stop their behaviour, the harassment continues, report the problem to one of the following individuals:
    a) Site Supervisor (Arcom's Foremen) (if possible)
    b) Safety & Wellness Administrator, Shelley Smith
    c) HR & QC Manager Trevor Arden
    d) Owner and Operator Archie Smith

Confidentiality

Arcom and its managers will not identify any involved parties or circumstances about a reported incident, except:

- When it is necessary in investigating the complaint,
- If it is part of disciplinary action, or
- Where it is required by law.

Program Evaluation

Archie Smith will evaluate this policy and procedure yearly; adjustments can be made whenever necessary to ensure the success of this program.

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

AJ Smith _____ May 28, 2019

Owner/President Date

PERSONAL PROTECTIVE EQUIPMENT

PERSONAL PROTECTIVE EQUIPMENT INDEX

PERSONAL PROTECTIVE EQUIPMENT POLICY

The purpose of this policy is to minimize injuries to workers using Personal Protective Equipment (PPE) where and when it is required. This policy will always be observed and practiced on every jobsite.

In accordance with our COR (Certificate of Recognition) requirements, Arcom Technical Services Ltd. has maintained the following, clearly defined PPE policy:

All personnel (managers, employees, sub-contractors and visitors) must wear, at minimum, all PPE that is required for the job site they are on. Basic PPE (safety boots, hard hat, safety glasses and gloves) are to be provided by the employee and specialized PPE will be company provided (HiVis vest, respirators, harnesses etc.).

All PPE must conform to Occupational Health and Safety (OH&S) and CSA standards.

All PPE must be inspected at the time it is issued, before each use, and be maintained as per the manufacturers' specifications. Inspection and service logs/records will be maintained for any specialty PPE (respirators, body harnesses, etc.).

All PPE that is of questionable reliability, damaged, or in need of repair/service will be removed from service immediately.

All PPE that has been removed from service will be tagged '**OUT OF SERVICE'**. Any PPE' tagged '**OUT OF SERVICE'** will not be returned to service until repaired and inspected by a qualified person.

PPE must not be modified or changed in any way and must be used properly and only for its intended purpose.

This policy is a mandated policy and any non-compliance will be requested to leave the work site immediately.

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

Eye and Face Protection

This PPE is designed to protect the worker from such hazards as:

- Particles and flying objects,
- Molten metals,
- Splashing liquids,
- Infrared, visible radiation (welding) and ultraviolet.

This PPE has two types:

The first is, "basic eye protection", includes:

- Eyecup goggles,
- Glasses with or without side shields and mono frame goggles.

The second type "face protection", include:

- Metal mesh face shields for hot and humid conditions or radiant heat,
- Chemical and impact resistant (plastic) face shields,
- Welders shields or helmets with specific cover, and
- Lens and filter plates.

Sport glasses and hardened glass prescription lens are not an acceptable substitute for proper, required industrial safety eye protection.

The comfort and of safety eyewear are very important. Lens coating, venting or fitting may be needed to prevent fogging or to fit with regular prescription eyeglasses.

Contact lens should NOT be worn at the work-site. Contact lens can trap and even absorb particles or gases causing eye irritation or blindness. Hard contact lenses have the potential to break into the eye when hit. Basic eye protection should be worn with face shields. The use of face shields alone is not enough to fully protect the eyes from work hazards. When face and eye protection is required, advice from the OH & S office, Material Safety Data Sheet (MSDS) or your supplier will help in your decision.

Do

- Ensure eye protection fits properly (close to the face).
- Clean safety glasses daily, more often if needed.
- Store safety glasses in a clean, dry, safe place when not in use.
- Replace pitted, bent, scratched, and poorly fitted PPE (damaged face/eye protection cannot produce the results it was designed to deliver).
- Wear the appropriate protective eyewear when working in any areas where welding is being done.

Don't

- Modify eye/face protection.
- Use eye/face protection which does not carry the CSA certification (CSA stamp for safety glasses is usually on the frame inside the temple near the hinges of the glasses).

Reference: OH & S Act, Regulation and Code Part 18, Section 229

Foot Protection

Personal Protective Equipment

General Information

Safety footwear is designed to protect against foot hazards in the workplace, protecting against compression, impact and puncture injuries.

Safety footwear is divided into three grades which are indicated by symbols and colored tags.

The tag color indicates the amount of resistance the toe will supply to the different weights dropped from different heights.

The symbol indicates the strength of the sole. An example is a triangle means puncture-resistant sole which is able to withstand 135kg (300 ft. lbs.) of pressure without being punctured by a 5 cm (2 inch) nail.
More information is provided when you look at Alberta's OH & S Statute and Regulations or CSA Standard "Protective Footwear" Z195-02.

In construction, it is recommended (mandatory for Arcom employees) that only the green triangle grade of footwear (which also provides ankle support) be used.

When choosing protective footwear, one should always over protect, not under protect.

Do

Choose footwear according to CSA Standards and job hazard.
Always fully lace up boots and tie laces securely; boots will not protect if they are a tripping hazard or fall off.

- Using a protective boot dressing will help the boot last longer and provide greater water resistance (wet boots conduct current).
- Choose a high cut boot this will provide ankle support and less injuries.

Don't

- Wear defective safety footwear (ex. Exposed steel toe caps.)
- Modify safety footwear or under protect your feet.

Reference: OH & S Act, Regulation and Code Part 18 Section 233

FOOT PROTECTION – POLICY UPDATE

PERSONAL PROTECTIVE EQUIPMENT

Arcom Technical Services Ltd. is committed to a strong safety program that protects all employees, property and the public from accidents. Our objective is a health and safety program that will reduce the number of injuries and illnesses to an absolute minimum, becoming a leader in our industry by doing so.

As Arcom employees we can be on different worksites daily, most construction sites require boots that are CSA approved and designated with a Green Triangle, providing puncture resistance soles, steel caps and proper ankle support.

In support of that statement we have decided to amend our PPE requirements regarding Safety Footwear. Effective July 1, 2013 the only safety footwear that will be accepted on Arcom Sites will be that of a high cut boot style designated by a CSA Green triangle. Boots should always be fully laced with ties secured to provide maximum support and avoid trips.

..

A full explanation of CSA standards and boot designations may be found under CSA Standard Protective Footwear Z195-02

This policy applies to all Arcom employees that are involved in work outside the immediate office area of the Main Office. If you are in the garage/shop area of the main office, safety footwear is required.

Workers at every level, including management, are responsible and accountable for minimizing accidents within the construction projects of our clients.

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Our goal is an accident free workplace. Only through a continuous safety and loss control effort can we accomplish this.

* The safety information in this policy does not take precedence over applicable government legislation, with which all employees should be familiar.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

PERSONAL PROTECTIVE EQUIPMENT (PPE)

In accordance with the Personal Protective Equipment (PPE) policy, as related during company and jobsite orientations, Arcom Technical Services Ltd. requires all site workers to provide the following items:

1. Steel toed work boots
    a. MUST meet CSA standards (green triangle)
    b. To be worn always
2. Hard hats
    a. Are to be worn brim forward, unless the hard hat has been specifically designed to be worn with the brim at the back, and Arcom Technical Services Ltd. has given approval to wear it.
3. Safety Glasses
    a. Are always to be worn on a job site.
4. Hearing Protection
    a. To be worn in conjunction with equipment operating procedures
    b. Is to be used when sound is over 80 dba
    c. Use hearing protection when you can't carry on a conversation at a normal volume of voice when you are 3 feet apart
5. Gloves
6. Reflective Safety Vest

Head Protection

Personal Protective Equipment

General Information

The use of safety headwear is designed to protect the head from impact caused from falling objects, splashes from chemicals or harmful substances, bumps and contact with energized objects and equipment. The recommended type of headwear, in construction is the Class B hard hat which has the required "dielectric strength". There are many designs, but they must all meet the CSA requirements for Class B industrial head protection. See CSA standard Z94.1-05.

Most head protection is made up of two parts:

- The shell (which is light and rigid to deflect blows) and
- The suspension (which is designed to absorb and distribute the energy of the blow)

Both parts of the safety headwear must be compatible and maintained according to manufacturer's instructions. Any additional attachments used with headwear, must be designed specifically for use with the specific headwear used. Bump caps are not considered a helmet and can only be used in Alberta, when the only hazard is where a worker might strike his/her head against a stationary object.

Inspection and Maintenance

For headgear to perform efficiently proper care is required. Many factors may affect the service life, including temperature, sunlight, chemicals and ultraviolet radiation (welding). The usual maintenance for head gear is simply washing with a mild detergent and rinsing thoroughly.

Do

- Replace headgear that is pitted, cracked, brittle or holed.
- Replace headgear which has been subjected to a blow even though damage cannot be seen.
- Remove any headgear from service, if its serviceability is in doubt.
- Replace headgear and its components according to manufacturer's instructions.
- Consult OH & S or your supplier for information on headgear.

Don't

- Drill or remove peaks or alter the suspension or shell in any way.
- Use paints or solvent on the shell (makes shells "break down")
- Put chin straps over the brims of Class B headgear.
- Use any liner which may contain metal or conductive material.
- Carry anything in the hard hat while wearing the hard hat.

Reference: OH & S Act, Regulation and Code Part 18 Section 234

Limb and Body Protection

Personal Protective Equipment

General Information

Due to the nature of the construction workplace and the number of different hazards, it is not possible to cover specialized limb and body protection in detail. These types of hazards are referred to as "job exposures" (exposure to fire, body impacts, temperature extremes, corrosives molten metals and cuts from sharp or abrasive materials). PPE in the category would be items such as:

- Arm, legs, chin and belly guards specialty hand pads and grips
- Leather aprons and leggings, fully body suits, flame and chemical resistant clothing, and
- Various types of plastic boot covers, or overshoes

For more information on the type of specialty PPE you require, check your local OH & S office. As with all PPE, following the manufacturer's instructions on its use, care and cleaning is critical and will enable you to get the full-service life from your specialty PPE.

Hand PPE (Gloves and Mitts)

PPE for the hands include: finger guards thimbles and cots, hand pads, gloves, mitts, and barrier creams. Choose hand PPE that will protect against job hazards. Gloves should fit well and be comfortable. This type of PPE must protect against chemicals, abrasions, scrapes, punctures, extreme temperatures, and electrical shocks.

Types

PPE for the hands come in many different forms, each designed to protect against certain hazards. Gloves most commonly used in the construction industry are made from cotton leather, rubber, synthetic rubbers and other man-made materials, or combinations of materials.

Vinyl coated, or leather gloves are good in providing protection while handling metal or wood objects. When selecting hand PPE, keep the following in mind: look for anything at the jobsite that may be a hazard to the hands. If gloves are to be used select the proper type for the job being done. Inspect and maintain hand PPE regularly. If in doubt about the selection or need for glove or hand PPE, consult your safety supplier, Material Safety Data Sheet (MSDS), or local OH & S office.

Do

- Inspect hand PPE for any defects before use.
- Wash all chemicals and fluids off gloves before removing them.
- Ensure the gloves fit properly.
- Use the proper hand PPE for the job.
- I Follow manufacturer's instructions on the care and use of the hand PPE you are using.
- Ensure exposed skin is covered (no gap between the sleeve and the hand PPE).

Don't

- Wear gloves when working with moving machinery (gloves may get tangles or caught).
- Use hand protection or gloves that are worn out or defective.

Reference: OH & S Act, Regulation and Code Part 18 Section 242 and 243

HALF MASK RESPIRATOR

PERSONAL PROTECTIVE EQUIPMENT / SPECIALIZED PPE

GENERAL INFORMATION

Respiratory protection falls into two major categories. The first category is Air Purifying Respirators (APRs) which are particle (dust) chemical cartridges but NO visor plate. The second category is Atmosphere Supply respirators, which includes self-contained breathing apparatus (SCBA), air line systems and protective suits that completely enclose the worker and incorporate a life support system.

Only APRs will be dealt with here. The second category of respirators requires much more specific information and training. If you need to use Atmosphere Supplying Respirators, you should get expert advice.

APRs

There are two basic types of APRs:

- Disposable fibre type with or without charcoal or chemical filter "button" and
- The reusable rubber face mask type with disposable or rechargeable cartridges. The choice depends on your job, cost, labor, and your maintenance facility.

It's important to remember that APRs are limited to areas where there is enough oxygen to support life. APRs do not supply or make oxygen.

The service life is affected by the type of APR, the wearer breathing demand, and the concentration of airborne contaminants. When an APR is required, consult the Material Safety Data Sheet (MSDS), OH & S or supplier for the exact specifications for the APR.

Facial hair can prevent a good seal and fit of an APR: One to three days growth is the worst. Follow the manufacturer's instructions to the letter regarding the mask, filters, cartridges and other components. Workers using respiratory protection should be clean shaven.

As APR is only as good as its seal and its ability to filter out the contaminants it was designed to filter.
Combination Respirators

This type of APR combines separate chemical and mechanical filters. This allows for the change of the different filters when one of them becomes plugged or exhausted before the other filter (usually the dust filter plugs up before the chemical filter). This type of respirator is suitable for most spray painting and welding.
For more information check the:

- Material Safety data Sheet (MSDS),
- OH & S Regulations, or
- The safety equipment supplier.

For more information, look at the:

- Alberta O H & S Statute and Regulations,
- CSA Standards "Compressed Breathing Air Systems" Z180.1-00,
- Selection, Care and Use of Respirators Z94.4-02, and
- Chemical Hazards Regulation (Alberta Reg. 8/82).

Do

- Train workers very carefully in the APRs use, care and limitations.
- Ensure that respirators are properly cleaned and disinfected after each shift, according to the manufacturer's instructions.
- Dispose of exhausted cartridges and masks in sealed bags or containers. Keep new, unused filters separate from old, used filters.
- Monitor APR use; they are useless just hung around the neck.
- Replace filters when breathing becomes difficult.

Don't

- Use with materials that may be highly irritating to the eyes.
- Use with gases that can't be detected by odor or throat or nose irritation.
- Use with gases which are not effectively halted by chemical cartridges regardless of concentration (read the cartridge label).
- Use respirators or masks if the serviceability is in doubt.
- Use APRs when oxygen content in the air is less than 18% or 18 kilopascals (partial pressure or greater).

Reference: OH & S Act, Regulation and Code Part 18 Section 244 and 245

Fit Testing for Half Mask Respirator

Personal Protective Equipment / Specialized PPE – Developed by Phil Post and Justin LaPointe

General Information

Respiratory protection falls into two major categories. The first category is Air Purifying Respirators (APRs) which are particle (dust) chemical cartridges but NO visor plate. The second category is Atmosphere Supply respirators, which includes self-contained breathing apparatus (SCBA), air line systems and protective suits that completely enclose the worker and incorporate a life support system.

Only APRs will be dealt with here. The second category of respirators requires much more specific information and training. If you need to use Atmosphere Supplying Respirators, you should get expert advice.

APRs

There are two basic types of APRs:

- Disposable fibre type with or without charcoal or chemical filter "button" and
- The reusable rubber face mask type with disposable or rechargeable cartridges. The choice depends on your job, cost, labor, and your maintenance facility.

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The service life is affected by the type of APR, the wearer breathing demand, and the concentration of airborne contaminants. When an APR is required, consult the Material Safety Data Sheet (MSDS), OH & S or supplier for the exact specifications for the APR.

Facial hair can prevent a good seal and fit of an APR: One to three days growth is the worst. Follow the manufacturer's instructions to the letter regarding the mask, filters, cartridges and other components. Workers using respiratory protection should be clean shaven.

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For more information check the:

- Material Safety data Sheet (MSDS),
- OH & S Regulations, or
- The safety equipment supplier.

For more information, look at the:

- Alberta O H & S Statute and Regulations,
- CSA Standards "Compressed Breathing Air Systems" Z180.1-00,
- Selection, Care and Use of Respirators Z94.4-02, and
- Chemical Hazards Regulation (Alberta Reg. 8/82).

Qualitative Fit Test Report

Arcom Technical Services Ltd.

North Safety Products
Train the Trainer 2018 Phil Post & Justin LaPointe

Employee's Name: _____

Phone Number: _____

Test Date: _____ Next Due: _____

Protocol: OSHA 29CFR1910.134

Method: ☐ Irritant Smoke ☐ Bitrex

Respirator: _____ Size: _____

Approval: NIOSH-TC-84A

Limitations: ☐ Beard ☐ Denture ☐ None
☐ Other _____

Fitting: ☐ Satisfactory Positive Pressure Check
☐ Satisfactory Negative Pressure Check
☐ Satisfactory Irritant Smoke Fit Test
☐ Satisfactory Bitrex Fit Test

☐ Unsatisfactory Fit Test

Explain: _____

Comfort: ☐ Very Comfortable ☐ Barely Comfortable
☐ Comfortable ☐ Intolerable
☐ Uncomfortable

Employee's Statement:

I understand that my use of this respirator must be in accordance with company work rules, manufacturer's instructions and applicable OSHA Regulations and Standards

Test Subject: _____ Date: _____

Fit Tester: _____ Date: _____

Safety Harness and Life-Lines

Personal Protective Equipment

General Information

In construction body belts and harnesses are used to provide workers working at heights above ground level the freedom of movement and protection from falls. These devices are designed to arrest a fall and absorb some of the shock of the fall. The systems are usually worn around the body and attached to a lanyard, fall arresting device or rope grab. Better quality systems usually have some form of shock absorber in the system.

A safety harness & life-lines can be used if the fall to be arrested is short (less than two feet or 0.6m). If the fall is greater than two feet, a body harness is recommended to prevent further injuries which are caused by the sudden stop at the end of the fall.

A lifeline should never be used as a service line. The only time a lifeline becomes a load bearing line is in the event of a fall. At all other times it should be just slack enough to permit free movement on the service lines.

Waist safety belts are only allowable for use with a travel restraint or fall restrict system (never as part of a fall arrest system (OH&S Part 9 142.1b), however a full body harness is preferred in all cases in the construction industry.

It is very important to get quality advice in the purchase, selection and maintenance of your fall arresting equipment.

See CSA Standards:

- "Fall Arresters, Vertical Lifelines and Rails" Z259.2.1-98 (R2004)
- "Self-Retracting Devices for Personal Fall-Arrest Systems" Z259.2.2-98 (R2004)

Do

- Obtain expert advice before purchasing a fall arresting device.
- Properly train and practice with the system you decide to use. Use webbing type harnesses instead of leather harnesses.
- For replacement parts use only the manufacturer's components.
- Inspect carefully before each use (inspection to be performed by a trained worker).
- Ensure the harness fitted snugly to the worker using the system.
- Ensure the anchor points are secure and able to support the load in the event of a fall.
- Follow the manufacturer's instructions on use and care.
- Ensure that all lines used with the systems have thimbles.
- Use only the proper safety rated fastenings with each system.
- Use a full body harness with shock absorber whenever possible.

Don't

- Change, modify or put additional holes in the harness or hardware.
- Jerry-rig the system.
- Use the system for any other than its intended use.
- Use the lifeline for a service line.
- Use a harness that has been damaged in anyway.

Alberta Construction Safety Association

Safety Harness Inspection Checklist

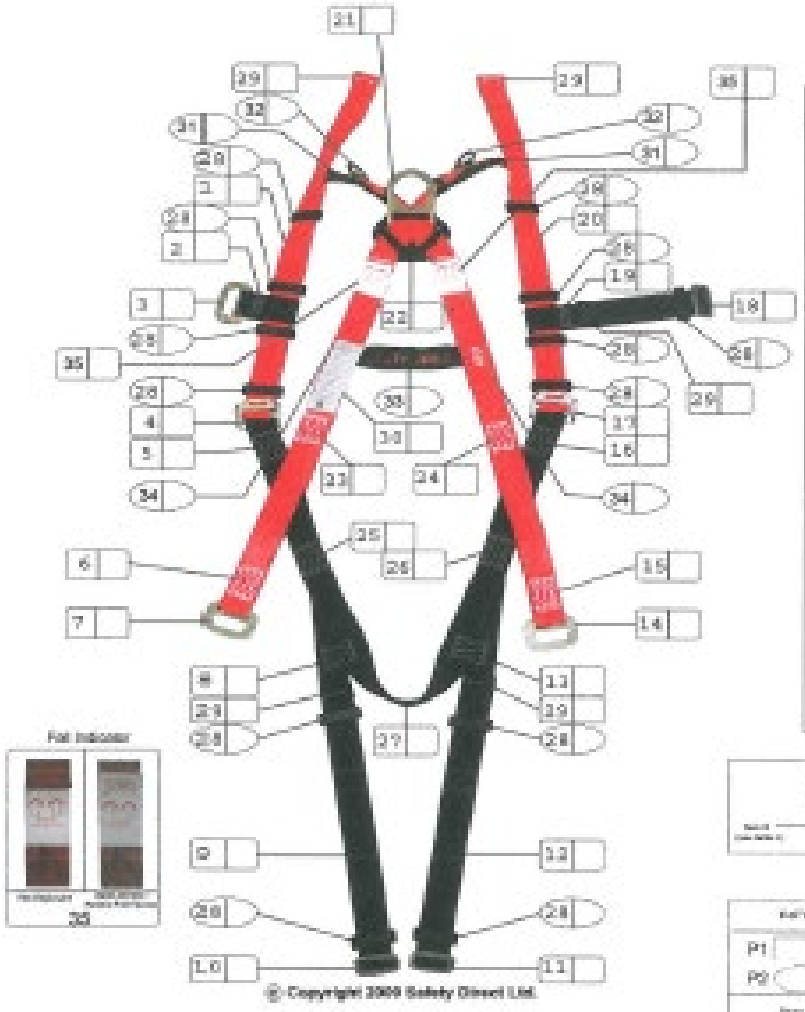


TABLE 2
INSPECTION GUIDE

FULL BODY HARNESS MODEL 181

ITEM NUMBER	NAME/DESCRIPTION	PRIORITY
1	Shoulder strap	1
2	Stitching	1
3	Buckle	1
4	Adjustable roller buckle	1
5	Stitching	1
6	Stitching	1
7	Buckle	1
8	Stitching	1
9	Leg Strap	1
10	Buckle	1
11	Buckle	1
12	Leg Strap	1
13	Stitching	1
14	Buckle	1
15	Stitching	1
16	Stitching	1
17	Adjustable roller buckle	1
18	Buckle	1
19	Stitching	1
20	Shoulder strap	1
21	Dorsal D-ring	1
22	D-ring back pad	1
23	Stitching	1
24	Stitching	1
25	Stitching	1
26	Stitching	1
27	Sub-pelvic strap	1
28	Belt keeper (multiples)	2
29	Stitching-end pattern	1
30	CSA product labels	1
31	Shoulder Pad	2
32	Shoulder D-ring	2
33	Back Strap	2
34	Stitching	2
35	Fall Indicator	1

Summary

P1	0	
P2	5	
Pass only if	F	+ P

= Final Rating

INSPECTOR IDENTIFICATION	
MANUFACTURER'S DATE:	SERIAL #:
NAME:	LOCATION:
SIGNATURE:	DATE:

Comments

Note: The above table is intended as a guide only. Any inspector must be competent, and use good judgement in evaluating a harness or other piece of fall protection equipment. If there is any doubt or question as to the condition of an item - remove it from service!

Safety Harness Inspection Checklist

FALL PROTECTION EQUIPMENT
INSPECTION INSTRUCTIONS PRIOR TO USE

FREQUENCY	INSPECTION INSTRUCTIONS
BEFORE EACH USE	**WEBBING** Visually inspect all webbing for signs of cuts, piercing, fraying, pulled or broken stitching, abrasion, excessive wear, altered or missing straps, burns, and heat or chemical exposure of the webbing. **Pass/Fail criteria:** If any defects are identified on the webbing, it should be removed from service as its integrity has been compromised. **CHEST STRAP** Visually inspect the fastening mechanism. **Pass/Fail criteria:** If the fastening device or mechanism is found to be defective, the harness should be removed from service. **HARDWARE** Verify the design of all buckles. Any buckles that are three-bar slide buckles, and not two-piece metal buckles should be removed from service: only two-piece metal buckles should be used. **Appearance:** Visually inspect all hardware for cracks, burrs, deformations, dents, nicks, corrosion or any other significant defects. **Pass/Fail criteria:** If any cracks are evident, the hardware must be removed from service. Minor defects are acceptable if the function of the hardware is not impaired in any manner.

PERIODIC
INSPECTION INSTRUCTIONS

1. Spread the harness on a flat surface.
2. Visually inspect each component and assess its condition. Refer to Table 1 "Non-acceptable Criteria" and Table 2 "Inspection Guide" for guidance in making the Pass/Fail determination.
3. Mark either "√" (acceptable) or "X" (not acceptable) in the corresponding box for each component.
4. Commencing with the Priority 1 items (rectangular boxes), count the total number of x 's. Enter this total in the summary.
5. Count the total number of x 's for the Priority 2 items (oval boxes). Enter this total in the summary.
6. In the summary box, determine pass (P) or fail (F) for each of the two priorities.
7. Determine the overall evaluation of the harness and mark either pass (P) or fail (F) in the large box.
8. Record the inspector identification information in the area provided at the bottom left of the reverse side of this card.

★ Definitions:

Priority 1 items: Components that are directly related to the fall arrest function.

Priority 2 items: Components that are indirectly related to the fall arrest function.

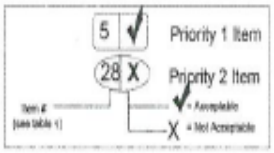
CARE	PROCEDURE
CLEANING	Wipe off all surface dirt with a damp sponge or cloth. Using a solution of a mild detergent and water, rub the web with a sponge or cloth. Rinse thoroughly with clean water and allow to hang dry away from excessive heat.
STORAGE	After cleaning/drying, store in a clean dry area away from fumes, excessive heat and corrosive conditions.

TABLE 1
NON-ACCEPTANCE CRITERIA ★

PART		TYPE OF DAMAGE	ALLOWABLE DEVIATION (FROM NEW CONDITION) Priority 1 Items	Priority 2 Items
Metallic	D-rings O-rings Buckles Snap hooks	Wear/Abrasion	0.8 mm	1.5 mm
		Missing	0 %	0 %
		Deformed/Fractured	0 %	0 %
		Corrosion (coverage)	10 %	10 %
	Grommets Rivets	Missing	0 %	0 %
		Deformed	10 %	20 %
		Fractured	0 %	0 %
		Corrosion (coverage)	10 %	25 %
Plastic	D-ring back pad Belt keepers ** Shoulder pads	Wear/Abrasion	10 %	25 %
		Missing	0 %	0 %
		Deformed	10 %	25 %
		Fractured	0 %	0 %
Stitching	All	Broken Wear/Abrasion Missing	5 %	10 %
Webbing	Shoulder straps Chest straps Leg straps Waist belt	Cuts/Penetrations	5 %	15 %
		Wear/Abrasion	15 %	20 %
		Missing	0 %	0 %
		Heat damage	0 %	5 %
		Chemical damage	0 %	5 %

★ All numeric values are approximate.

★★ Two (2) missing belt keepers on the same leg strap constitute a FAILURE. Remove the harness from service until belt keepers are replaced.



Safety Direct Ltd.

Alberta Construction Safety Association

SAFE WORK PRACTICE

TITLE	Fall Protection
GENERAL	Protect workers from injuries associated by not utilising proper fall arrest protection
APPLICATION	Fall Arrest Protection shall be utilized where there is or may be a danger to workers falling. NO person shall use fall protection devices until they have received adequate training.
PROTECTIVE MECHANISMS	Permit system ERP (Emergency response plan) Fall protection plan PPE Manufacturers specifications Safe work procedure Barricades and warning signs
SELECTION AND USE	Manufacturers specification As per safe work procedure
SUPERVISOR RESPONSIBILITY	To facilitate and/or provide proper instruction to their workers on protection requirements and training Hazard analysis Work site inspection Determine type of equipment required
WORKER RESPONSIBILITY	1. Be fully conversant with Fall protection systems. 2. Ensure you know capabilities of Fall Protection Equipment. 3. Ensure barricades, ribbons and signs identify restricted areas. 4. Ensure you understand the procedures for rescue of workers who may be unable to rescue themselves from an elevated work area. 5. Ensure you know your anchor points. 6. Ensure you do not wrap the lanyards and/or rope around beams, girders, pipes, etc. 7. Utilise buddy system and continually check each other's harness and D ring to ensure that the harness is not too lose and or the D ring has not slipped down the back.

SWP00030-1/1

https://work.alberta.ca/documents/WHS-PUB-gs010.pdf

Occupational Health and Safety Bulletin

Fall Protection Plan

This Safety Bulletin outlines the requirements of specific sections of Alberta's *Occupational Health and Safety (OHS) Code 2009* related to Fall Protection Plans, and includes a basic template. Workers working from heights and employers responsible for the worksites need to understand what is required by law.

Legislative Requirements

Section 140 of the *Code* states:

140(1) An employer must develop procedures that comply with this Part in a fall protection plan for a work site if a worker at the work site may fall 3 metres or more and the worker is not protected by guardrails.

140(2) A fall protection plan must specify
(a) the fall hazards at the work site,
(b) the fall protection system to be used at the work site,
(c) the anchors to be used during the work,
(d) that clearance distances below the work area, if applicable, have been confirmed as sufficient to prevent a worker from striking the ground or an object or level below the work area,
(e) the procedures used to assemble, maintain, inspect, use and disassemble the fall protection system, where applicable, and
(f) the rescue procedures to be used if a worker falls and is suspended by a personal fall arrest system or safety net and needs to be rescued.

140(3) The employer must ensure that the fall protection plan is available at the work site and is reviewed with workers before work with a risk of falling begin.

140(4) The employer must ensure that the plan is updated when conditions affecting fall protection change.

Alberta Government

Key Points to Remember

1. There must be a Fall Protection Plan (FPP) for all work from a height of 3 metres or more where the worker is not protected by guardrails and when a travel restraint or personal fall arrest is used. While a FPP is not required for aerial platforms, it is recommended.

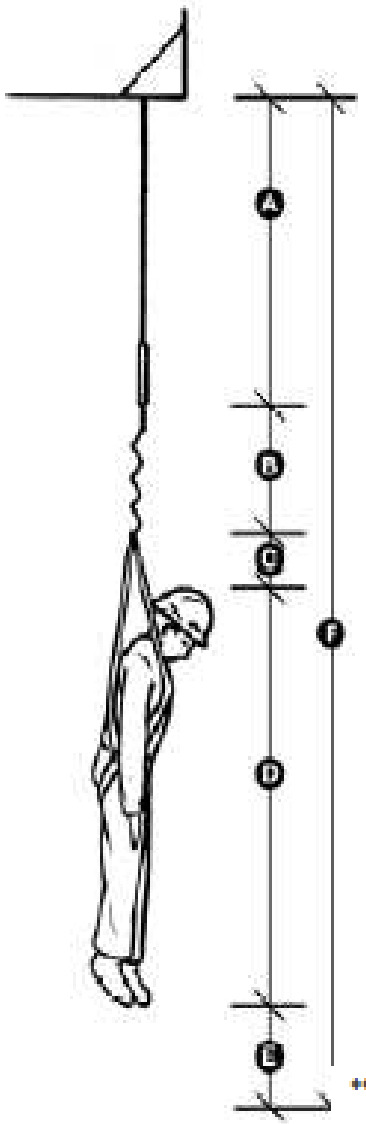
2. The FPP must be available at the work site and be reviewed with workers before starting work at heights.

3. The FPP must be site and situation specific and updated when conditions change. This means there may be several FPPs for different jobs at a single site, such as work on structural steel, Q-decking, etc.

4. The FPP must contain the detailed information in Section 140(2).

Clearance Requirement

This must be calculated. The distance the worker would fall must be less than the distance to the nearest object/surface below the worker. Note: If using a lifeline and rope grab, the calculation will have to be from the grab location.



A (length of lanyard) is ____

B (extension of shock absorber) is ____

C (D-ring slippage) is 1'(0.3 metres)

D (height of worker to D-ring) is ____

E (safety factor) is 2'(0.6 metres)

**Swing fall distance if worker not directly below anchor is ____

Clearance Requirement = ____

Calculating Clearance Requirement

Add A + B + C + D + E + **, to determine minimum distance from anchor point to nearest surface below worker.

Clearance requirement = ____

Distance to surface below ____

Clearance requirement must be less than the distance from the worker to the nearest surface below the worker.

Note: If your clearance distance is **greater** than the distance to the next surface below, you will need to change your anchor point, or your type of fall protection equipment.

You should also calculate **Free Fall Distance.**

Calculating Free Fall Distance

This must not be greater than1.2 m (4') if there is no shock absorber. It must not be greater than that permitted by fall protection manufacturer.

Calculate by adding:

Length of lanyard & connecting hardware ____

Height of D-ring from-worker's feet ____

and subtracting:

Distance between anchor point & unguarded edge ____

Free Fall Distance = ____

Note: If your free fall distance is greater than noted above, you will have to change your anchor point or your type of fall protection equipment.

Procedures to assemble, maintain, inspect, use and disassemble the Fall Protection System
Be detailed. It would be acceptable to attach the manufacturer's specifications for the specific equipment being used, and ensure that workers are trained in these procedures.

Rescue procedure
Using 911 alone is not acceptable! The FPP must specify how the worker will be rescued if he/she falls and is suspended. Examples include ladders, aerial devices, self-rescue fall protection equipment (suspension steps that deploy when the shock-absorber deploys, self-rescue SRLs, etc.) The employer is required to ensure that workers are trained in rescue procedures and conduct practice drills.

Worker sign-off
The employer must ensure that all workers affected by this FPP have read and understood the plan. Prior to a worker signing this FPP, the employer needs to ensure that workers have read and understood all information in and attached to this FPP. This is required in order for the employer to comply with Sec. 141 of the Code (Instruction of Workers). Many other Code sections also require worker training.

Created by: _____

Workers Involved:

Worker Name:	Signature:
Worker Name:	Signature:
Worker Name:	Signature:
Worker Name:	Signature:
Worker Name:	Signature:
Worker Name:	Signature

Contact us:

Province-Wide Contact Centre

Edmonton
780-415-8690

Other locations
1-866-415-8690
(Toll Free)

Deaf or hearing impaired
- Edmonton 780-427-9999
- Other locations 1-800-232-7215
(Toll Free)

Web Site

www.worksafe.alberta.ca

Getting copies of *OHS Act*, Regulation & Code:

Queen's Printer

www.qp.alberta.ca

Edmonton 780-427-4952

Occupational Health and Safety

http://humanservices.alberta.ca/working-in-alberta/295.html

Call any Government of Alberta office toll-free
Dial 310-0000, then the area code and telephone number you want to reach

ADDITIONAL/SPECIALIZED PPE

-PLEASE CONTACT SITE SUPERVISOR FOR ACCESS TO THE FOLLOWING

	Location	Condition	Purchase Date	Review Date
Hearing Protection	Main Office - Shelley Smith	New	Q1,2017	Q1, 2017
Dust Masks	Main Office - Shelley Smith	New	Q1,2010	Q1, 2017
Body Harness/Lanyard	Service Truck/Van - Trevor Arden Main Office - Shelley Smith/Trevor Arden RAH SITE Office - Mike Mulzet	Good	Q1,2010	Q1,2017
Face Shields	Main Office - Shelley Smith/Trevor Arden RAH Site office - Mike Mulzet	Good	Q1,2009	Q1, 2017


STANDARDS
RECORDS
VEHICLES
REGULATIONS
COMPLIANCE
PREVENTATIVE MAINTENANCE
SAFETY
REGULATION
POLICY
TOOLS
INSPECTION

PREVENTATIVE MAINTENANCE POLICY

Preventative Maintenance Policy
Maintenance and Defective Tool Policy
Monthly Tool Maintenance Checklist
Return Procedure

PREVENTATIVE MAINTENANCE POLICY

It is the policy of this Arcom Technical Services Ltd. to maintain all tools, vehicles, and equipment in a condition that will maximize the safety of all personnel.

- Adherence to applicable regulations, standards, and manufacturers' specifications.
- Services of appropriately qualified maintenance personnel.
- Scheduling and documentation of all maintenance work.

Supervision shall ensure that all preventative maintenance is carried out by qualified personnel according to established schedules and that records are maintained.

All workers shall inspect all tools and equipment prior to use. If the tool is defective or in need of repair, tag it, date it, take it out of service and report it to your supervisor immediately.

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

MAINTENANCE AND DEFECTIVE TOOL POLICY

All tools and equipment (whether owned by Arcom, workers, or supplied by outside contractors) shall be properly maintained to reduce risk of personal injuries or damage to property.

All workers shall regularly check tools and equipment for compliance. If workers find any defective tools or equipment in need of repair, they must:

1. Remove defective items from use.
2. 'Tag' item
3. Fill out 'Tool Repair' form
4. Inform their supervisor

Supervisor shall ensure that all preventive maintenance is carried out by qualified personnel according to established schedules or practices, all maintenance records shall be maintained by the field coordinator.

ARCOM TECHNICAL SERVICES LTD.

MONTHLY TOOL MAINTENANCE CHECKLIST

Tool Check List for Project Package

Arcom Technical Services Ltd.

Job Name:		Project #:
Site Lead:	Signature:	Date:

Tool Description	ATS #	OUT	IN
Safety Kit			
Safety Board			

RETURN

Quality Control

All tools returned to shop in good condition?	YES	NO
If 'NO'; List tools:		

Returner's Name	Signature	Date
Project Manager's Name	Signature	Date
QC Name	Signature	Date

Return Procedure

Preventative Maintenance Program

Tools / Ladders / Equipment that has been deemed as not safe for use after inspection, including any equipment missing appropriate safety guards must be removed from service immediately and tagged.

An example of the tag is attached, please provide your name and date on the front and description of damage on the back of the tag and ensure it is securely attached to the defective equipment.

The job supervisor should remove the equipment from site and return it to the Arcom Main Office/Shop for repair.

Each removed tool will be tagged and a tool repair sheet MUST be filled out

Tool Repair Request

Arcom Technical Services Ltd.

Job Name:	Project #:
Site Lead:	Signature:

Reason Circle one

REPAIR	LOST	DECOMMISSIONED (BY SITE)

Description of Tool:	Date of Request:
ATS #:	
Description of Problem:	

Corrective Action (Office use)

Issue Found:		
Corrective Action:		
REPAIRED	REPLACED	DECOMMISSIONED (BY OFFICE)

Fixed By Signature Date

TRAINING

AND COMMUNICATION

TRAINING AND COMMUNICATION INDEX

COMPANY HEALTH AND SAFETY POLICY

Arcom Technical Services Ltd. has developed, and is committed to, a robust and effective health & safety program that protects all employees, property and the public from accidents. Our objective is to utilize this health and safety program to reduce the number of injuries and illnesses to an absolute minimum, becoming a leader in our industry by doing so.

All personnel, including management, employees, sub-contractors and visitors are responsible and accountable for minimizing accidents within the construction projects of our clients. This is accomplished by our commitment to follow all Safe Work Practices and Safe Job Procedures that are clearly defined in the Safety Manual.

Arcom Technical Services Ltd. will have a dedicated Safety Officer responsible for maintaining this health and safety program by ensuring that all policies follow Occupational Health and Safety (OH&S) standards. In addition, the Safety Officer will ensure that all COR (Certificate of Recognition) requirements are being met, through such actions as safety orientations, jobsite inspections, training and the review and updating of policies and procedures as they are needed.

Complete participation in this Safety Program is required. Arcom Technical Services Ltd. will provide well maintained equipment, suitable training and fully developed procedures as they are needed. All personnel (managers, employees, sub-contractors and visitors) are responsible for following all procedures, working safely and wherever possible being proactive in improving safety measures.

Arcom Technical Services Ltd. will develop a comprehensive Safety Plan for each worksite. This plan will include, but is not limited to, hazard identification, safety meeting schedule, emergency response plan, fire/explosion procedures and medical/first aid provisions. All personnel, including managers, employees, sub-contractors and visitors, will be orientated to each site they are working on/visiting, and will be made aware of their rights, obligations, responsibilities, and accountabilities regarding health and safety onsite, as laid out by the Safety Plan. The dedicated Safety Officer will maintain the Safety Plan and ensure it is kept current through site visits and audits.

Our goal is an accident free workplace.

Only through a continuous safety and loss control effort can we accomplish this.

***The safety information in this policy does not take precedence over applicable government legislation, with which all employees should be familiar.**

Signature:	Date:
AJ Smith e-signature	March 25, 2019

SAFETY TRAINING POLICY

TRAINING AND COMMUNICATION

PURPOSE

The purpose of this policy is to provide for general and specialized safety and related training throughout all levels of the organization.

POLICY

Arcom Technical Services ltd. will provide all safety and related training that is necessary to minimize losses of human and physical resources of the company. Employees will participate in this training. This training will include, but not be limited to:

- Safety orientation
- Safety training for workers, supervisors and management
- Task and trade-specific training and certification
- Workplace hazardous materials information system (WHMIS) orientation
- Fall protection training
- Safe work practices and job procedures, as applicable and
- The proper fitting, safe use, cleaning and maintenance of respiratory protective equipment, as applicable.

In addition, safety meetings involving workers will be held on a weekly basis or as determined by site requirement.

All employees shall complete the New Employee Safety Orientation booklet before signing it as read and agreed to.

Job specific training shall be provided and documented when completed on the Employee Training Record. Periodically (quarterly) there will be refresher training as applicable and as required / requested.

*The safety information in this policy does not take precedence over Occupational Health and Safety legislation. All employees should be familiar with the Occupational Health and Safety Act and the Regulations for Construction Projects (current edition). *

Emergency Contact Information

Workers Name: _____

Address: _____Postal Code:_____

Home Phone: _____

Cell Phone: _____

Email: _____

Emergency Contact Information

First Contact Name: _____

Relationship: _____

Phone Number: _____

Cell Phone: _____

Work Phone: _____

Second Contact Name: _____

Relationship: _____

Phone Number: _____

Cell Phone: _____

Work Phone: _____

New Hire Safety Orientation Questionnaire

Name:	Date:
Hire Date:	

Circle Correct Responses		
1.	Hazard identification and control is important to maintain a safe working environment?	
	YES	NO
2.	Working safely is a condition of employment?	
	YES	NO
3.	All injuries, regardless how minor, must be reported immediately to you supervisor?	
	YES	NO
4.	It is important to maintain good housekeeping in your work area?	
	YES	NO
5.	You observe an unsafe condition on site, should you?	
	a) Wait for the weekly toolbox safety meeting and report it b) Report it immediately to your supervisor c) Let someone else worry about it	
6.	It is permissible to carry material or equipment up or down any access ladder?	
	YES	NO
7.	Openings that are covered with plywood will have the plywood secured to prevent accidental dislodgement and will be marked with?	
	a) A circle b) A cross c) Letters warning of the opening d) All of the above	
8.	A trench is 6 feet deep. It is permissible for you to enter the trench to work if it is not cutback or shored?	
	YES	NO
9.	Personal protective equipment (hearing protection, fall protection) should be worn whenever?	
	a) Someone else is wearing it b) Your supervisor advises you to wear it c) The potential for personal injury exists	

New Hire Safety Orientation Questionnaire

Name:	Date:
Hire Date:	

Circle Correct Responses		
10.	When you are working from heights, and guardrails are missing, you must use fall arresting equipment?	
	YES	NO
11.	Tools and equipment whose guards are inoperative or missing are okay to use 'just this once'?	
	YES	NO
12.	The Workplace Hazardous Material Information System (WHMIS)/Hazardous Communication system (HAZCOM) designates certain products as controlled products and require them to be labelled. This label is a warning for you, the worker. The label tells you?	
	a) Name of the product b) Hazard Symbol c) Risks when you use it d) Personal Protective Equipment e) First Aid Treatment if Necessary f) All of the Above	
13.	Material Safety Data Sheets (MSDS) are also required for WHMIS/HAZCOM controlled products. These sheets are readily available for your additional information by asking your supervisor to see them?	
	YES	NO

Arcom
Technical Services Ltd.

PROJECT INFORMATION

TRAINING AND COMMUNICATION

Worker Name: _____

Project Name: _____

Work Site Address: _____

Superintendent: _____

Superintendent Contact #: _____

Welcome to the Arcom Worker Safety Handbook. All workers on Arcom Construction work sites are responsible for fully complying with all Health and Safety Standards and regulations. All workers are responsible for cooperating in the implementation of this program through regular toolbox/safety meetings, hazard assessments, work site inspections, incident/accident investigations and maintenance; and in the continuous improvement of this Program.

Arcom management, subcontractor management and all workers are collectively responsible to ensure compliance with Workplace Health & Safety Program complete with policies and related forms.
A complete copy of the Health & Safety Program along with Occupational Health & Safety Legislations is available on site for review by any employee upon request.

Additional rules and instructions will be issued during the safety orientation.

The information contained in this hand book does not take precedence over local Government Legislation. It is the responsibility of all workers to be familiar with Government Safety Legislation.

PERSONAL PROTECTIVE EQUIPMENT (PPE)

TRAINING AND COMMUNICATION

In the interest of workers and job site safety, Arcom Technical Services ltd. requires all workers to be advised as to the company rules as received during orientation.
Arcom requires all site workers to provide the following items.

1. Steel toed work boots
    a. MUST meet CSA standards (green triangle)
    b. To be worn always

2. Hard hats
    a. Are always to be worn brim forward, unless the hard hat is specifically designed to be worn with the brim at the back, and Arcom has given you approval to wear it

3. Safety Glasses
    a. Are always to be worn

4. Hearing Protection
    a. To be worn in conjunction with equipment operating procedures
    b. Is to be used when sound is over 80dba
    c. Use hearing protection when you can't carry on a conversation at a normal volume of voice when you are 3 feet apart
5. Gloves

6. Reflective Safety Vest

ToolBox Meeting

Arcom Technical Services Ltd.

Date:	Time:
Project / Facility:	

Agenda

1. Review of Previous Meeting
2. Review of Inspections/Incidents
3. Current Topic(s) Discussion
4. Employee Input
5. Date, Time & Topic(s) for next Meeting

Attendance

Print Name	Signature
1.	
2.	
3.	
4.	
5.	
6.	
7.	
8.	

Current Topic(s) Discussion

Employee Input

Action(s) to be taken	By Whom	By when

Next Meeting

Date:	Time:
Next Meeting Topic(s):	

Manager/Supervisor Signature	Reviewed By Signature

WORKSITE ORIENTATION CHECKLIST

Work Site Orientation Checklist

Arcom Technical Services Ltd.

Employee name: _____

Position: _____

Job Site: _____ Date Orientation: _____

Supervisor: _____

Topic	Initials	Initials
1. Rights and responsibilities		
a) General duties of employers, workers, and supervisors		
b) Worker right to refuse unsafe work and procedure for doing so		
c) Worker responsibility to report hazards and procedure for doing so		
d) Worker's right to orientation and training and additional training on request		
2. Work Site Tour		
a) Arcom's laydown area		
b) Review the sites hazards		
c) Lunch Room		
d) Washrooms		
e) Smoking area (rules)		
3. Review Emergency Response Plan		
a) Entrances		
b) Emergency Exists		
c) First Aid Provider (name and cell)		
d) Location of First Aid Kit		
e) What to do in an emergency		
f) What to do when injured		
g) Location of OH&S manual		
h) Location of Arcom's Health & Safety Manual		
i) PSI and Safety paper work review		
j) Site specific safety concerns listed #5 workplace hazards		

Topic				
4. Workplace health and safety rules			**Initials**	**Initials**
Fall protection systems in use on this site:	YES	NO		
a) Guard rails				
b) Fall restraint				
c) Fall arrest				
d) Control zone				
e) Approved work procedures				
f) Is a written fall protection plan required?				
g) Worker knows about the plan and where it can be found				
h) Worker understands housekeeping rules				
i) Worker understands after-hours work safety rules				
j) Supervision and progressive discipline				
k) Other (e.g.: operating equipment safely):				
5. Workplace hazards that workers may be exposed to			**Initials**	**Initials**
Hazardous materials on construction site (e.g.: asbestos, silica dust):				
Excavations (e.g.: trenches, shoring)				
Ladders				
Falls (other than ladders; e.g.: roof and floor opening)				
Other hazards (e.g.: exposure to power lines, risk of robbery, assault or confrontation):				
Procedures for working alone or in isolation				
Measures to reduce risk of violence in the workplace and how to deal with violent situations				

Topic			Initials	Initials
6. Personal Protective Equipment (what to use, when to use it, where to find it)				
	YES	NO		
a) Footwear (steel toed boots)				
b) Hardhat (use and instructions for sites)				
c) Work gloves				
d) High visibility apparel				
e) Face and eye protection				
f) Respiratory protection				
g) Other clothing				
h) Special PPE Requirements for site (list below)				
7. Instruction/ demonstration of work tasks/ processes			Initials	Initials
List of safe work procedures that the worker has been oriented in:				
8. Worker Safety Certifications			Initials	Initials
List of safety certifications that the worker holds (e.g.: WHMIS, Fall Protection, Aerial Lift, Confined Space):				
9. Safety Health & Safety Representative for this job:			Initials	Initials

Employee's Signature:		Date:	
Supervisor's Signature:		Date:	

INSPECTIONS

INSPECTIONS INDEX

SAFETY INSPECTION POLICY

PURPOSE

The purpose of this policy is to control losses of human and material resources by identifying and correcting unsafe acts and conditions.

POLICY

Arcom Technical Services ltd. will maintain a comprehensive program of safety inspections at all facilities and job sites.

Formal inspections of will take place monthly of Arcom office / shop, facilities and project sites where applicable. A complete monthly summary of this formal inspection shall be included with all other monthly safety documents to be submitted, corrected, updated and filed.

Site specific inspections are to be done on project start-up and monthly depending on duration of job. General house keeping is done daily with review prior to job start-up, mid day and end of day clean-up.

RESPONSIBILITIES

The Safety Supervisor is responsible for the overall operation of this program. A quarterly review by senior management, will ensure the Safety Supervisors performance is acceptable and due diligence has been performed.

Project Supervisors are responsible for conducting ongoing informal inspections of areas where their applicable crew/man power are performing work duties.

Workers are responsible for participating and contributing to the informal and formal inspections.

Worksite Safety Inspection Report

Arcom Technical Services Ltd.

Date:		
☐ Weekly	☐ Monthly	☐ Quarterly
Location:	Time:	
Inspected By:		
Inspected By:		

Priority Index: 1. Imminent Danger 2. Serious 3. Minor 4. Acceptable 5. Not Applicable (N/A)

Priority	INSPECTED ITEMS	Priority	INSPECTED ITEMS	Priority	INSPECTED ITEMS
	Hazard Assessment Procedure		Fire Extinguishers		Confined Space Entry
	Code of Practice/Procedures		Smoking in Restricted Areas		Fall Protection
	Protection of Public		First Aid Kits/First Aid		Safety Promotion/Education
	Excavation Procedures		Lockouts/Energy Control		Vehicle/Equip Operator Cert.
	Occ. Health & Safety Act/Regs.		Handling of Pipe		Vehicle/Equipment Condition
	Traffic Control, Flashers, Barricades		Improper Lifting, Manual/Mechanical		Air Receivers & Compressors
	Hard Hat, Safety Footwear		Cables, Ropes & Chains		Circle Check
	Other PPE i.e., Traffic Vests, Safety Glasses, Hearing Prot.		Tools - Use, Storage & Maintenance		Gas Cylinders, Hoses & Regulators
	Fire Retardant Coveralls		Electrical Wiring & Guards		Trans. of Dangerous Goods Act
	Non-Synthetic Clothing		Materials Storage & Handling		Log Books
	Grounding/Bonding Device		Waste Disposal/Housekeeping		WHMIS

Corrective Actions

Corrective Action			
* Priority #	Description	By Whom	Date/Time
Job Supervisor:		Date:	
Comments:			

INVESTIGATIONS AND REPORTING

INVESTIGATIONS AND REPORTING INDEX

Investigation Policy

Incident Investigation Report

Accident/Incident Investigation Report

INVESTIGATION POLICY

To investigate accidents/incidents so that causes can be determined, and corrective actions can be implemented to prevent recurrence.

At Arcom Technical Services Ltd. the following types of incidents shall be fully investigated:

1. Accidents that result in injuries requiring medical aid from hospital or medicentre (does not include basic first aid injuries).
2. Accidents that cause property damage or interrupt operations with potential loss.
3. Incidents that have the potential to result in (1) or (2) above, such as close calls or near misses.

All incidents that fall under Section 18 of the OH&S Act must be reported to OH&S and WCB, or any other regulatory agencies as defined by the OH&S Act, within three (3) business days.

1. All workers shall report all incidents as soon as possible to their immediate supervisor and assist in the investigation when requested.
2. Supervisors shall conduct initial investigations and submit their reports to the company safety officer promptly, along with witness statements.
3. The safety officer shall:
    a. Review all reports, determine the need for, and if necessary shall direct, detailed investigations
    b. Determine causes
    c. Recommend corrective action
    d. Report to all relevant parties
    e. Follow up to ensure that corrective action is implemented
    f. Report findings to project manager for action & follow up

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

Incident/Near Miss Investigation Form

Arcom Technical Services Ltd.

Date of incident:			**Time of incident:**	
Job Name & Location:				
Type of Incident:	Injury/Illness	Property Damage	Vehicle Collision	Other:
	Fire	Spill	Major Potential	

Injury / Illness

First Aid	Medical Aid	Modified Work	Lost Time	Fatal
Name of Employee:				
Occupation:			Experience:	
Nature of Injury:				
Object/Equipment/Substance Inflicting Injury / Damage:				

Full description of events

Area of incident/near miss occurred:
Specific Location:
Briefly describe what happened including the sequence of events, investigate scene of incident/near miss; who was involved e.g. worker, visitor; conditions present at time of incident; what activity (if any) was taking place prior & at time of incident. What hazards was the worker exposed to? What hazards may have contributed to the incident occurring? Attach photos if available)
Diagram

Property Damage

Description of Property:
Description of Damage:
Estimated Loss/Damage Cost:

Other Actual/Potential Loss

Type:
Description of Damage:
Estimated Loss/Damage Cost:

Details of the Incident/Near Miss Investigation

Name of injured person:	Injury sustained:
Name of person who reported incident:	Date of report:
Name of person completing this form:	
Telephone number:	Date report completed:

Evaluation

Risk Potential in Not Corrected:			
a) Loss Severity Potential	Major	Serious	Minor
b) Probable Recurrence Rate	Frequent	Occasional	Rare
Immediate Cause(s): Description:			
Underlying Cause(s): Description:			
Corrective Action(s):			
Immediate:			
Interim:			
Final:			

Witness(es) Report

Witness(es) Name (s):	Phone:
Job title (if relevant):	
Witness(es) Statement (s) Attached: Yes No	

Recommendations / Notes:	
Supervisor:	Date:
Employee:	Date:

Incident/Near Miss Investigation Defined

The reason for investigating an incident or near miss is to determine: the cause or causes of the incident; to identify any risks, hazards, systems or procedures that contributed to the incident; and to recommend corrective action to prevent similar incidents.

Incidents should be investigated by people knowledgeable about the type of work involved at the time of the incident. HSRs or relevant workers should also be involved in the investigation.

An incident /near miss investigation report should answer the WHO, WHERE, WHEN, WHAT, WHY and HOW questions with regards to an incident.

When the following serious incidents occur, they must be immediately reported to Occupational Health & Safety and possibly The Workers' Compensation Board of Alberta in the timeframes provided in the table below.

	Report to:	Timeframe:
Serious incidents involving a death(fatality) or a serious injury or illness	1. Employer 2. OH&S 3. WCB	Immediately Within 48 hrs
Serious incidents involving injury or illness to non-workers at your workplace	1. Employer	Immediately
Other incidents involving an injury or illness where workers compensation is payable	1. Employer 2. WCB	Immediately 48 hrs

Complete the following based on the type of incident (if applicable)

	Yes	No
Employer	☐	☐
Occupational Health & Safety Alberta	☐	☐
WCB – Workers Compensation Board - *Alberta*	☐	☐

Comments:

Reporting and Investigating Injuries and Incidents

OHS information for employers

Reporting and Investigating Injuries and Incidents

The information in this Safety Bulletin is intended to help employers report and investigate workplace injuries and incidents as required by the Occupational Health and Safety (OHS) Act. This is the law that governs workplace health and safety in Alberta.

Injuries may also have to be reported to the Workers' Compensation Board – Alberta as outlined under the Workers' Compensation Act, which falls outside the scope of this Bulletin.

What types of injuries and incidents have to be reported?

According to the OHS Act, injuries and incidents have to be reported to the Government of Alberta if they:

a) result in a death;
b) cause a worker to be admitted to hospital for more than two days;
c) involve an unplanned or uncontrolled explosion, fire or flood that causes or has the potential to cause a serious injury;
d) involve the collapse or upset of a crane, derrick or hoist; or
e) involve the collapse or failure of any component of a building or structure necessary for the structural integrity of the building or structure.

Certain workplace injuries and incidents must be reported and investigated.

If you are unsure about whether to report the injury or incident, report it.

For dangerous occurrences at a mine or mine site, there are additional reporting requirements. Refer to section 544 of the OHS Code here for details.

WHOS RESPONSIBLE FOR REPORTING THE INJURY OR INCIDENT?

It's the responsibility of the prime contractor, or if there is no prime contractor, then the contractor or employer responsible for the work site.

HOW SOON AFTER THE INJURY OR INCIDENT MUST IT BE REPORTED?

Immediately, or as soon as possible given the circumstances.

If an injury is serious enough that it may cause a worker to stay in hospital for more than 2 days, report the injury right away. Do not wait for 2 days to confirm that it is a reportable injury.

Notify the Government of Alberta's Occupational Health and Safety Contact Centre by telephone at **1-866-415-8690** (780-415-8690 in the Edmonton local calling area).

The Contact Centre is able to accept calls 24 hours per day, seven days per week.

alberta.ca
LI016 – February 2017 ISBN 978-1-4601-3292-0 (PDF)

Alberta Government

Reporting and Investigating Injuries and Incidents

What information will I be asked to provide?

Be prepared to provide the following information:

a) location of incident or injury;
b) site contact person's name, job title and phone number(s);
c) general details of what happened;
d) time and date the incident or injury occurred;
e) name of employer;
f) employer's relationship to the worksite (owner, prime contractor, contractor or supplier);
g) injured worker's name, date of birth, and job title (if applicable); and
h) name and location of hospital the worker was taken to (if applicable).

If the incident or injury happened at a well site, be prepared to provide the following additional information:

a) name of the rig manager;
b) well site supervisor's name and phone number;
c) name of the drilling company;
d) rig number; and
e) rig phone number(s).

If all the information regarding the incident or injury isn't immediately available, call in with the information that is available. Additional information can be provided when it becomes available.

WHAT ABOUT REPORTING OTHER TYPES OF INCIDENTS OR INJURIES?

The *OHS Act* doesn't require the reporting of other types of injuries and incidents to government. If you're unsure about whether to report the incident or injury, call it in.

What happens after an incident or injury has been reported?

An OHS officer or investigator may be dispatched to the incident scene to gather additional information or conduct an investigation. An officer or investigator has the authority to:

a) visit the scene of the incident;
b) ask any questions to determine the causes and circumstances of the incident;
c) request information from anyone present at the time of an incident;
d) seize or take samples of any substance, material, product, tool, appliance or equipment that was present at, involved in, or related to the incident; and
e) stop all or some of the activities at the worksite.

Did You Know?

A government investigator may visit the worksite and conduct a formal investigation.

I WAS TOLD I CAN'T TOUCH OR MOVE ANYTHING AT THE SCENE OR A REPORTABLE INCIDENT OR INJURY. IS THIS TRUE?

Yes and no. You can't disturb the scene of a reportable incident or injury unless:

a) you have to attend to someone who has been injured or killed;
b) you have to take some action to prevent further injuries;
c) you have to protect property that is endangered as a result of the incident; or
d) you have been given permission to do so by an OHS officer or a peace officer.

Alberta Government

Reporting and Investigating Injuries and Incidents

When and by whom does an investigation have to be conducted?

When any reportable injury or incident happens, an investigation has to be conducted and an investigation report completed. An investigation also has to be conducted and an investigation report completed for other incidents that had the potential to cause a serious injury.

It's the responsibility of the prime contractor, or if there is no prime contractor, then the contractor or employer responsible for the work site to investigate and complete an investigation report. The prime contractor, contractor or employer is required to conduct their own independent investigation regardless of whether the government conducts an investigation.

Why bother with an investigation report?

Three reasons. First, it's the law. Second, finding out what happened can help prevent a similar injury or incident from happening. And third, finding out what happened can help prevent future property damage and production losses.

What do I do with the investigation report when it's completed?

The prime contractor's, contractor's or employer's investigation report is an internal company document and must be kept on file for a ***minimum of two years*** following the incident or injury. You're not required to send a copy to the government.

However, the report has to be readily available for inspection by an OHS officer when requested.

Can an employer's investigation report or employee witness statements be used in court evidence?

Employer/Contractor/Prime Contractor Investigation Reports and Witness Statements must be disclosed to OHS officers upon request, but have the following legal protection:

Investigation Report

The Investigation Report created by employers/contractors/prime contractors cannot be used as evidence in any legal proceeding including, but not limited to, OHS Act prosecutions, criminal prosecutions, private lawsuits, and Fatality Inquiries. The Report, however, can be used in evidence in a prosecution for perjury or giving contradictory evidence. (Reference OHS Act Section 18).

Witness Statements

Witnesses Statements collected by OHS Officer either directly from the witnesses, or those collected from the employers then obtained by an OHS Officer, cannot be used in evidence in any legal proceeding including, but not limited to, OHS Act prosecutions, criminal prosecutions, private lawsuits, and Fatality Inquiries. Witness statements, however, can be used in evidence in a prosecution for providing a false statement to an OHS Officer or to establish non-compliance with the OHS Officer's authority to investigate. (Reference OHS Act Section 19).

Alberta Government

Reporting and Investigating Injuries and Incidents

Contact Us

OHS Contact Centre

Edmonton & Surrounding area
- 780-415-8690

Throughout Alberta
- 1-866-415-8690

Deaf or hearing impaired:
- 780-427-9999 (Edmonton)
- 1-800-232-7215 (Alberta)

Website
work.alberta.ca/ohs-contact us

Get Copies of OHS Act, Regulation and Code

Alberta Queen's Printer
www.qp.gov.ab.ca

Occupational Health and Safety
work.alberta.ca/ohs-legislation

FOR MORE INFORMATION:

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Alberta Government

EMERGENCY PREPAREDNESS

EMERGENCY PREPAREDNESS INDEX

EMERGENCY PREPAREDNESS

EMERGENCY RESPONSE PROCEDURE

Arcom's emergency response plan (ERP's) intent is to have in place a well-planned response in the event of a serious injury, explosion, fire or hazardous spill. At the very least Arcom's basic (ERP) plan will be capable of:

1. Providing first aid to any injured persons
2. Provide transport to appropriate medical destination for any injured person.
3. Providing initial fire suppression control.
4. Cleaning up any minor material spills
5. Contacting outside agencies for appropriate assistance

MEDICAL AID / FIRST AID – PROCEDURE TO FOLLOW IN THE EVENT OF SERIOUS INJURY

1. Notify Superintendent immediately of an injury. Emergency contact list shall be kept in each service vehicle and job site office for quick and easy access
2. Assess the situation. Secure immediate area so that you and others are prevented from any further injury
3. Administer first aid if qualified, to the best of your ability
4. Do not move injured person(s) unless immediate danger of further injury is present
5. Superintendent or Foreman to contact EMS as required
6. Direct persons to meet with EMS to expedite direction to the injured person(s)
7. Do not take any further actions that may endanger yourself or others

FIRE / EXPLOSION – PROCEDURE TO FOLLOW IN THE EVENT OF FIRE OR EXPLOSION

Small Fires

1. Remove any possible fuels that may be feeding the small fire
2. Use appropriate method or fire extinguisher until the small fire is out
3. Contact Superintendent or Foreman immediately
4. Continue with action described for larger fire response if needed
5. Do not endanger yourself or others

Large Fires

1. Call 911
2. Evacuate all personnel to designated muster area, ensure all personal accounted for
3. Contact Superintendent or Foreman immediately after calling 911
4. Assess situation, if possible remove source of fuel that may be fuelling the fire
5. If safe to do so, remove any mobile equipment that may be endangered
6. Maintain safe perimeter around fire/explosion area until emergency service arrives
7. Do not endanger yourself or others.

Spill Response

- Protect yourself and others from injury
- Minimize damage to the environment
- Minimize property damage
- Notify your Superintendent or Foremen
- Determine source of spill and if possible prevent further loss of product
- Initiate containment measures to limit the effects of the spill (this could be absorbent material, dykes, bell-holes, or trenches)
- Initiate cleanup of as much of the product as possible using equipment such as absorbent material, vacuum trucks or skimmers

Rescue of a Worker Suspended In a Safety Harness

Emergency Preparedness

CALL 911

The rescue of a worker who has fallen and is being suspended in his/her safety harness needs to be undertaken as quickly as possible for several reasons:

1. The worker may have suffered injuries during the fall and may need medical attention.
2. Workers suspended in their safety harness for long periods may suffer from blood pooling in the lower body and this can result in 'suspension trauma'. (See attached information on treating trauma – have this available on site to provide to First Aid team and to external emergency crews.)
3. The suspended worker may panic if they are not rescued quickly.
4. The even that led to the fall may create additional risks that need to be addressed.

General Rescue Procedures

A. Follow the process of the Emergency Response Plan (ERP). Should there be none, continue to B.

B. If an Elevated Work Platform is available on site:
   - Bring it to the site and use it to reach the suspended worker.
   - Ensure that rescue workers are protected against falling
   - Ensure that the EWP has the load capacity for both the rescuer(s) and the victim.
   - If the victim is not conscious, 2 rescuers will probably be needed to safely handle the weight of the victim.
   - Position the EWP platform below the worker and disconnect his lanyard when it is safe to do so.
   - Reattach the lanyard to an appropriate connection point on the lift.
   - Treat the victim for Suspension Trauma and any other injures.
   - Arrange for Transport to nearest hospital.

C. If no Elevated Work Platform is available:
   - Where possible, use ladder(s) to reach the victim.
   - Rig separate lifelines for rescuers to use while carrying out the rescue from the ladder(s).
   - If worker is not conscious or cannot reliably help with his/her own rescue, at least 2 rescuers may be needed.
   - If worker is suspended from a lifeline, where possible, move the suspended victim to an area that can be safely reached by the ladder(s)
   - If victim is suspended directly from his/her lanyard or from a lifeline, securely attach a separate lowering line to the victim's harness
   - Other rescuers should lower the victim while he/she is being guided by the rescuer on the ladder
   - Once the victim has been brought to a safe location, administer First Aid and treat the person for Suspension Trauma and any other injuries
   - Arrange for transport to the nearest hospital

D. If the injured person is suspended near the work areas and can be safely reached from the floor below or the area they fell from:
    a. Ensure that rescuers are protected against falling
    b. If possible, securely attach a second line to the workers' harnesses to assist in pulling them to a safe area. (Note: at least 2 strong workers will be needed to pull someone up.)
    c. Ensure that any slack in the retrieving lines is taken up to avoid slippage
    d. Once the victim has been brought to a safe location, administer First Aid and treat the person for Suspension Trauma and any other injuries and arrange for transport to the nearest hospital.

E. If a person has fallen and is suspended in an inaccessible area (e.g. a tower, against a building or structure that has no openings):
    a. Specialized rescue techniques are needed for this type of situation. It may involve a rescuer rappelling or being lowered down to the victim, it may involve using a lifeline to retrieve the fallen worker, or the use of high-reach emergency equipment.
    b. Due to the inherent risk to the rescuers and/or the victim, this type of rescue should not be undertaken by people without specialized training and experience.

Schedule 2 First Aid

Table 1 Low hazard work

"Low hazard work" means work at:

(a) administrative sites where the work performed is clerical or administrative in nature;

(b) dispersal sites

- (i) where a worker is based,
- (ii) where a worker is required to report for instruction, and
- (iii) from which a worker is transported to a work site where the work is performed.

Table 2 High hazard work

"High hazard work" means work involving:

(a) construction or demolition, including

- (i) industrial and commercial process facilities,
- (ii) pipelines and related gas or oil transmission facilities,
- (iii) commercial, residential and industrial buildings,
- (iv) roads, highways, bridges and related installations,
- (v) sewage gathering systems,
- (vi) utility installations, and
- (vii) water distribution systems;

(b) operation and maintenance of

- (i) food packing or processing plants,
- (ii) beverage processing plants,
- (iii) electrical generation and distribution systems,
- (iv) foundries,
- (v) industrial heavy equipment repair and service facilities,
- (vi) sawmills and lumber processing facilities,
- (vii) machine shops,
- (viii) metal fabrication shops,
- (ix) gas, oil and chemical process plants,
- (x) steel and other base metal processing plants, and
- (xi) industrial process facilities not elsewhere specified;

(c) woodlands operations;

(d) gas and oil well drilling and servicing operations;

(e) mining and quarrying operations;

(f) seismic operations;

(g) detonation of explosives.

Table 3 First aid equipment and supplies

[See section 178]

(1) A Number 1 First Aid Kit consists of the following:

(a)	10	antiseptic cleansing towelettes, individually packaged;
(b)	25	sterile adhesive dressings, individually packaged;
(c)	10	10 centimetres x 10 centimetres sterile gauze pads, individually packaged;
(d)	2	10 centimetres x 10 centimetres sterile compress dressings, with ties, individually packaged;
(e)	2	15 centimetres x 15 centimetres sterile compress dressings, with ties, individually packaged;
(f)	2	conform gauze bandages — 75 millimetres wide;
(g)	3	cotton triangular bandages;
(h)	5	safety pins — assorted sizes;
(i)	1	pair of scissors;
(j)	1	pair of tweezers;
(k)	1	25 millimetres x 4.5 metres of adhesive tape;
(l)	1	crepe tension bandage — 75 millimetres wide;
(m)	1	resuscitation barrier device with a one-way valve;
(n)	4	pairs of disposable surgical gloves;
(o)	1	first aid instruction manual (condensed);
(p)	1	inventory of kit contents;
(q)	1	waterproof waste bag.

(2) A Number 2 First Aid Kit consists of the following:

(a)	10	antiseptic cleansing towelettes, individually packaged;
(b)	50	sterile adhesive dressings, individually packaged;
(c)	20	10 centimetres x 10 centimetres sterile gauze pads individually packaged;
(d)	3	10 centimetres x 10 centimetres sterile compress dressings, with ties, individually packaged;
(e)	3	15 centimetres x 15 centimetres sterile compress dressings, with ties, individually packaged;
(f)	1	20 centimetres x 25 centimetres sterile abdominal dressing;
(g)	2	conform gauze bandages — 75 millimetres wide;
(h)	4	cotton triangular bandages;
(i)	8	safety pins — assorted sizes;
(j)	1	air of scissors;
(k)	1	pair of tweezers;
(l)	1	25 millimetres x 4.5 metres roll of adhesive tape;
(m)	2	crepe tension bandages — 75 millimetres wide;
(n)	1	resuscitation barrier device with a one-way valve;

(o)	6	pairs of disposable surgical gloves;
(p)	1	sterile, dry eye dressing;
(q)	1	first aid instruction manual (condensed);
(r)	1	inventory of kit contents;
(s)	1	waterproof waste bag.

(3) A Number 3 First Aid Kit consists of the following:

(a)	24	antiseptic cleansing towelettes, individually packaged;
(b)	100	sterile adhesive dressings, individually packaged;
(c)	50	10 centimetres x 10 centimetres sterile gauze pads individually packaged;
(d)	6	10 centimetres x 10 centimetres sterile compress dressings, with ties, individually packaged;
(e)	6	15 centimetres x 15 centimetres sterile compress dressings, with ties, individually packaged;
(f)	4	20 centimetres x 25 centimetres sterile abdominal dressings, individually packaged;
(g)	6	conform gauze bandages — 75 millimetres wide;
(h)	12	cotton triangular bandages;
(i)	12	safety pins — assorted sizes;
(j)	1	pair of scissors;
(k)	1	pair of tweezers;
(l)	2	25 millimetres x 4.5 metres rolls of adhesive tape;
(m)	4	crepe tension bandages — 75 millimetres wide;
(n)	1	resuscitation barrier device with a one-way valve;
(o)	12	pairs of disposable surgical gloves;
(p)	2	sterile, dry eye dressings, individually packaged;
(q)	1	tubular finger bandage with applicator;
(r)	1	first aid instruction manual (condensed);
(s)	1	inventory of kit contents;
(t)	2	waterproof waste bags.

(4) A Type P First Aid Kit consists of the following:

(a)	10	sterile adhesive dressings, assorted sizes, individually packaged;
(b)	5	10 centimetres x 10 centimetres sterile gauze pads, individually packaged;
(c)	1	10 centimetres x 10 centimetres sterile compress dressing, with ties;
(d)	5	antiseptic cleansing towelettes, individually packaged;
(e)	1	cotton triangular bandage;
(f)	1	waterproof waste bag;
(g)	1	pair disposable surgical gloves.

Table 4 First aid room requirements

[See section 178]

(1) If an employer is required to provide a first aid room by Part 11, the employer must ensure that it is

- (a) located near the work area or areas it is to serve,
- (b) easily accessible to workers at all times,
- (c) able to accommodate a stretcher,
- (d) close to bathroom facilities,
- (e) of adequate size,
- (f) kept clean and sanitary,
- (g) provided with adequate lighting, ventilation and heating,
- (h) designated as non-smoking,
- (i) under the supervision of an advanced first aider, a nurse or an Emergency Medical Technician-Paramedic,
- (j) clearly identified as a first aid facility and appropriately marked with how and where to access the first aider,
- (k) used only to administer first aid or health related services, and
- (l) equipped with:
  - (i) a communication system;
  - (ii) a permanently installed sink with hot and cold running water;
  - (iii) a cot or bed with a moisture-protected mattress and 2 pillows;
  - (iv) 6 towels and 3 blankets;
  - (v) eye wash equipment;
  - (vi) a shower, or is close to a shower facility if it is a work site described in section 24;
  - (vii) a Number 3 First Aid Kit.

(2) A first aid room must contain the following:

- (a) the supplies of a Number 2 First Aid Kit;
- (b) space blanket;
- (c) hot and cold packs;
- (d) spine board and straps;
- (e) adjustable cervical collar or set of different sized cervical collars;
- (f) stretcher;
- (g) splint set;
- (h) waterproof waste bag;
- (i) sphygmomanometer (blood pressure cuff);
- (j) stethoscope;
- (k) disposable drinking cups;
- (l) portable oxygen therapy unit consisting of a cylinder(s) containing compressed oxygen, a pressure regulator, pressure gauge, a flow meter and oxygen delivery equipment;
- (m) flashlight;
- (n) bandage scissors.

Table 5 First aid requirements for low hazard work

[See sections 178, 181(1)]

Number of workers at work site per shift	Close work site (up to 20 minutes)	Distant work site (20 – 40 minutes)	Isolated work site (more than 40 minutes)
1	Type P First Aid Kit	Type P First Aid Kit	Type P First Aid Kit
2 – 9	No. 1 First Aid Kit	1 Emergency First Aider No. 2 First Aid Kit	1 Standard First Aider No. 2 First Aid Kit
10 – 49	1 Emergency First Aider No. 1 First Aid Kit	1 Emergency First Aider No. 2 First Aid Kit	1 Standard First Aider No. 2 First Aid Kit
50 – 99	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit	2 Standard First Aiders No. 2 First Aid Kit
100 – 199	1 Emergency First Aider 2 Standard First Aiders No. 3 First Aid Kit Designated area for first aid services	1 Emergency First Aider 2 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints Designated area for first aid services	3 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints Designated area for first aid services
200 or more	1 Emergency First Aider 2 Standard First Aiders **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers No. 3 First Aid Kit Designated area for first aid services	1 Emergency First Aider 2 Standard First Aiders **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers No. 3 First Aid Kit 3 blankets, stretcher, splints Designated area for first aid services	3 Standard First Aiders **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers No. 3 First Aid Kit 3 blankets, stretcher, splints Designated area for first aid services

Note: Number of first aiders indicated is for a shift at all times.

Table 6 First aid requirements for medium hazard work

[See sections 178, 181(1)]

Number of workers at work site per shift	Close work site (up to 20 minutes)	Distant work site (20 – 40 minutes)	Isolated work site (more than 40 minutes)
1	Type P First Aid Kit	Type P First Aid Kit	Type P First Aid Kit
2 – 9	1 Emergency First Aider No. 1 First Aid Kit	1 Standard First Aider No. 2 First Aid Kit 3 blankets	1 Standard First Aider No. 2 First Aid Kit 3 blankets
10 – 19	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit 3 blankets	2 Standard First Aiders No. 2 First Aid Kit 3 blankets
20 – 49	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit 3 blankets	2 Standard First Aiders No. 2 First Aid Kit 3 blankets
50 – 99	2 Emergency First Aiders 1 Standard First Aider No. 3 First Aid Kit	2 Emergency First Aiders 1 Standard First Aider No. 3 First Aid Kit 3 blankets	3 Standard First Aiders No. 3 First Aid Kit 3 blankets
100 – 199	2 Emergency First Aiders 2 Standard First Aiders No. 3 First Aid Kit Designated area for first aid services	2 Emergency First Aiders 2 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints Designated area for first aid services	3 Standard First Aiders 1 Advanced First Aider No. 3 First Aid Kit 3 blankets, stretcher, splints Designated area for first aid services
200 or more	2 Emergency First Aiders 2 Standard First Aiders 1 Nurse or 1 EMT-P **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers First Aid Room	2 Emergency First Aiders 2 Standard First Aiders 1 Nurse or 1 EMT-P **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers First Aid Room	4 Standard First Aiders 1 Nurse or 1 EMT-P **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers First Aid Room

Note: Number of first aiders indicated is for a shift at all times.

Table 7 First aid requirements for high hazard work

[See sections 178, 181(1)]

Number of workers at work site per shift	Close work site (up to 20 minutes)	Distant work site (20 – 40 minutes)	Isolated work site (more than 40 minutes)
1	Type P First Aid Kit	Type P First Aid Kit	Type P First Aid Kit
2 – 4	1 Emergency First Aider No. 1 First Aid Kit	1 Standard First Aider No. 2 First Aid Kit 3 blankets	1 Standard First Aider No. 2 First Aid Kit 3 blankets
5 – 9	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit	2 Standard First Aiders No. 2 First Aid Kit 3 blankets	2 Standard First Aiders No. 2 First Aid Kit 3 blankets
10 – 19	1 Emergency First Aider 1 Standard First Aider No. 2 First Aid Kit 3 blankets	2 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints	2 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints
20 – 49	2 Emergency First Aiders 1 Standard First Aider No. 2 First Aid Kit 3 blankets	3 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints	3 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints
50 – 99	2 Emergency First Aiders 2 Standard First Aiders No. 3 First Aid Kit 3 blankets	2 Emergency First Aiders 3 Standard First Aiders No. 3 First Aid Kit 3 blankets, stretcher, splints	4 Standard First Aiders 1 Advanced First Aider No. 3 First Aid Kit 3 blankets, stretcher, splints
100 – 199	2 Emergency First Aiders 2 Standard First Aiders 1 Advanced First Aider First Aid Room	4 Standard First Aiders 1 Advanced First Aider First Aid Room	4 Standard First Aiders 1 Advanced First Aider First Aid Room
200 or more	2 Emergency First Aiders 2 Standard First Aiders 1 Nurse or 1 EMT-P **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers First Aid Room	4 Standard First Aiders 1 Nurse or 1 EMT-P **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers First Aid Room	4 Standard First Aiders 1 Advanced First Aider 1 Nurse or 1 EMT-P **Plus** 1 Standard First Aider for each additional increment of 1 to 100 workers First Aid Room

Note: Number of first aiders indicated is for a shift at all times.

Schedule 3 Noise

Table 1 Occupational exposure limits for noise

[See sections 218, 219(1)]

Exposure level (dBA)	Exposure duration
82	16 hours
83	12 hours and 41minutes
84	10 hours and 4 minutes
85	8 hours
88	4 hours
91	2 hours
94	1 hour
97	30 minutes
100	15 minutes
103	8 minutes
106	4 minutes
109	2 minutes
112	56 seconds
115 and greater	0

Note: Exposure levels and exposure durations to be prorated if not specified

Table 2 Selection of hearing protection devices

[See subsection 222(1)]

Maximum equivalent noise level (dBA L_{ex})	CSA Class of hearing protection	CSA Grade of hearing protection
≤ 90	C, B or A	1, 2, 3, or 4
≤ 95	B or A	2, 3, or 4
≤ 100	A	3 or 4
≤ 105	A	4
≤ 110	A earplug + A or B earmuff	3 or 4 earplug + 2, 3, or 4 earmuff
> 110	A earplug + A or B earmuff and limited exposure time to keep sound reaching the worker's ear drum below 85 dBA L_{ex}	3 or 4 earplug + 2, 3, or 4 earmuff and limited exposure time to keep sound reaching the worker's ear drum below 85 dBA L_{ex}

Table 3 Permissible background noise conditions during audiometric testing

[See subsection 223(2)]

Octave band centre frequency (Hz)	Maximum level (dB)
500	22
1000	30
2000	35
4000	42
8000	45

Schedule 4 Safe Limit of Approach Distances

[See sections 225, 226]

Table 1 Safe limit of approach distances from overhead power lines for persons and equipment

Operating voltage between conductors of overhead power line	Safe limit of approach distance for persons and equipment
0 — 750 volts Insulated or polyethylene covered conductors (1)	300 millimetres
0 — 750 volts Bare, uninsulated	1.0 metre
Above 750 volts Insulated conductors (1) (2)	1.0 metre
750 volts — 40 kilovolts	3.0 metres
69 kilovolts, 72 kilovolts	3.5 metres
138 kilovolts, 144 kilovolts	4.0 metres
230 kilovolts, 260 kilovolts	5.0 metres
500 kilovolts	7.0 metres

Notes:
(1) Conductors must be insulated or covered throughout their entire length to comply with this group.
(2) Conductors must be manufactured to rated and tested insulation levels.

Schedule 6 Dimensions of Scaffold Members

Table 1 Light duty double-pole scaffolds less than 6 metres in height

[See subsection 333(2)]

Member	Dimensions
Uprights	38 millimetres by 89 millimetres
Ledgers	2 — 21 millimetres by 140 millimetres or 1 — 21 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Braces	21 millimetres by 140 millimetres

Table 2 Light duty double-pole scaffolds 6 metres or more in height

[See subsection 333(2)]

Member	Dimensions
Uprights	89 millimetres by 89 millimetres
Ledgers	2 — 21 millimetres by 140 millimetres or 1 — 21 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Braces	21 millimetres by 140 millimetres

Table 3 Heavy duty double-pole scaffolds less than 6 metres in height

[See subsection 333(2)]

Member	Dimensions
Uprights	38 millimetres by 140 millimetres
Ledgers	2 — 21 millimetres by 140 millimetres or 1 — 38 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Braces	21 millimetres by 140 millimetres

Table 4 Heavy duty double-pole scaffolds 6 metres or more in height

[See subsection 333(2)]

Member	Dimension
Uprights	89 millimetres by 140 millimetres
Ledgers	2 — 21 millimetres by 140 millimetres or 1 — 38 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Braces	21 millimetres by 140 millimetres

Table 5 Half-horse scaffolds less than 3 metres in height

[See subsection 335(2)]

Member	Dimensions
Ledgers	38 millimetres by 140 millimetres
Legs	38 millimetres by 89 millimetres
Braces	21 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Leg spread	1 metre

Table 6 Half-horse scaffolds 3 metres to 5 metres in height

[See subsection 335(2)]

Member	Dimensions
Ledgers	38 millimetres by 140 millimetres
Legs	38 millimetres by 140 millimetres
Braces	21 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Leg spread	1.5 metres

Table 7 Single-pole scaffolds less than 6 metres in height

[See section 340]

Member	Dimensions
Uprights	38 millimetres by 89 millimetres
Ledgers	2 — 21 millimetres by 140 millimetres or 1 — 21 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Braces	21 millimetres by 140 millimetres
Wall scabs	38 millimetres by 140 millimetres

Table 8 Single-pole scaffolds 6 metres to 9 metres in height

[See section 340]

Member	Dimensions
Uprights	90 millimetres by 89 millimetres 91
Ledgers	2 — 21 millimetres by 140 millimetres or 1 — 21 millimetres by 184 millimetres
Ribbons	21 millimetres by 140 millimetres
Braces	21 millimetres by 140 millimetres
Wall scabs	38 millimetres by 140 millimetres

Schedule 10 Fire Extinguishers and Minimum Separation Distances

Table 1 Fire extinguisher required based on quantity of explosive

[See subsection 473(4)]

Quantity of explosive	Quantity and type of fire extinguisher required
< 25 kilograms	1 — 5 BC fire extinguisher required
25 kg — 2,000 kilograms	1 (minimum) 10 BC fire extinguisher
> 2,000 kilograms	2 (minimum) 10 BC fire extinguishers

Table 2 Minimum separation distances between explosives and fixed radiofrequency transmitters

[See subsections 503(1), 503(2)]

Transmitter power (watts)	Minimum separation distance (metres)
25 or less	30
26 – 50	45
51 – 100	65
101 – 250	110
251 – 500	135
501 – 1,000	200
1,001 – 2,500	300
2,501 – 5,000	450
5,001 – 10,000	675
10,001 – 25,000	1,100
25,001 – 50,000	1,500
> 50,000	By extrapolation of this data

First Aid FOR Emergencies

To handle an emergency situation, use Emergency Scene Management (ESM).

1. Take charge.
2. Call out for help.
3. Assess hazards and make the area safe.
4. Find out what happened.
5. Identify yourself and offer to help.
6. If head or spinal injuries are suspected, support the head and neck.
7. Assess responsiveness.
8. Send or go for medical help.

Note: Protect yourself and others by wearing non-latex gloves when giving first aid. Use a shield or face mask with a one-way valve when giving CPR.

Cardiopulmonary Resuscitation (CPR – Adult)

1. Open airway – push back on forehead and lift chin.
2. **Check breathing. If the casualty is not breathing...**
3. Pinch nose and make a tight seal over the mouth. Give 2 breaths.
4. Make sure casualty is on a firm flat surface.
5. Place hands on centre of chest.
6. Position shoulders directly over hands and keep elbows locked.
7. Compress firmly 30 times then give 2 breaths. Push hard - Push fast
8. Continue cycles of 30 compressions and 2 breaths until help arrives.


OPEN AIRWAY


CHECK BREATHING


BREATHE INTO CASUALTY TWICE


POSITION YOUR HANDS IN THE CENTRE OF THE CHEST


PRESS DOWN FIRMLY 30 TIMES, THEN GIVE 2 BREATHS. CONTINUE CPR UNTIL HELP ARRIVES

Choking (Adult)

If a choking person can speak, breathe or cough – STAND BY and encourage coughing.

If a conscious person cannot speak, breathe or cough:

1. Stand behind person and find top of the hip bones with your hands.
2. Place a fist midline against the abdomen.
3. Grasp fist with other hand and press inward and upward forcefully.
4. Continue until object is expelled or person becomes unconscious.


FIND TOP OF HIPBONES


PLACE FIST MIDLINE ON ABDOMEN


PRESS INWARD AND UPWARD

If the person becomes unconscious ease him or her to the ground and send for medical help

1. Open the mouth and look for obstruction.
2. Open the airway and check breathing. If not breathing...
3. Give two breaths. If air doesn't go in the first time, reposition the head and try again.
4. Begin CPR. Give 30 compressions.
5. Each time you finish 30 compressions, look in mouth before giving the first breath.

Bleeding

To control severe bleeding

Immediately apply direct pressure to the wound over a pad of dressings

Keep the casualty lying down


CONTROL BLEEDING IMMEDIATELY

Unconsciousness

Get medical help. Make certain person is breathing and then place the casualty in the recovery position. If the casualty is not breathing, start CPR


RECOVERY POSITION

Emergency Numbers

AMBULANCE _____

FIRE _____

POLICE _____

FAMILY DOCTOR _____

POISON INFORMATION CENTRE _____

NOTE: This poster is a step-by-step guide to what you can do until medical help arrives. These tips do not take the place of first aid training.

St. John Ambulance
SAVING LIVES
at work, home and play

9901/10/00

www.sja.ca

WHMIS Symbols

WHMIS Pictograms

Workplace Hazardous Materials Information System

2015

Flame

Flammable

Self-Reactive

Pyrophoric

Self-Heating

In Contact with Water, Emits Flammable Gases

Organic Peroxide

Flame over Circle

Oxidizer

Exploding Bomb

Explosive*

Self-Reactive (severe)

Organic Peroxide (severe)

Skull and Crossbones

Acute Toxicity (fatal or toxic)

Gas Cylinder

Gas Under Pressure

Corrosion

Serious Eye Damage

Skin Corrosion

Corrosive to Metals

Biohazardous

Biohazardous Infectious Materials

Exclamation Mark

Irritation (skin or eyes)

Skin Sensitization

Acute Toxicity (harmful)

Specific Target Organ Toxicity (drowsiness or dizziness, or respiratory irritation)

Hazardous to the Ozone Layer*

Health Hazard

Carcinogenicity

Respiratory Sensitization

Reproductive Toxicity

Specific Target Organ Toxicity

Germ Cell Mutagenicity

Aspiration Hazard

Environment

Aquatic Toxicity*

A GHS pictogram appropriate for the hazard

Physical Hazards Not Otherwise Classified

Health Hazards Not Otherwise Classified

NOTE: No pictogram is assigned to some hazard classes e.g., Combustible Dusts and Simple Asphyxiants, and some less severe hazard categories.

*Not required by WHMIS, but may be used.

EMERGENCY CONTACT INFORMATION

Workers Name: _____

Address: _____Postal Code:_____

Home Phone: _____

Cell Phone: _____

Email: _____

Emergency Contact Information

First Contact Name: _____

Relationship: _____

Phone Number: _____

Cell Phone: _____

Work Phone: _____

Second Contact Name: _____

Relationship: _____

Phone Number: _____

Cell Phone: _____

Work Phone: _____

EMERGENCY RESPONSE PLAN ERP

EMERGENCY PREPAREDNESS

Project / Constructions Locations

PROJECT LOCATION ADDRESS: _____

POTENTIAL EMERGENCIES AS IDENTIFIED ON THE ARCOM HAZARD ASSESSMENT FORM

1. _____
2. _____
3. _____
4. _____
5. _____
6. _____

EMERGENCY PROCEDURES

See attached emergency response procedures. There ERP documents are to be posted at an easily accessible

EMERGENCY PROCEDURES

Emergency related equipment is located at:

1. Fire Alarm pull / signal station _____
2. Fire Extinguishers _____
3. Fire Hose _____
4. Panic Alarm / Security Signaller _____
5. PPE Masks and Shields: _____
6. Fire Blankets: _____
7. First Aid Kit: _____

On Site ERP Trained Workers

Emergency Preparedness

Project / Constructions Locations

Project Location Address: _____

Potential Emergencies as identified on the Arcom Hazard Assessment Form

1. _____
2. _____
3. _____
4. _____
5. _____
6. _____

Emergency Procedures

See attached emergency response procedures. There ERP documents are to be posted at an easily accessible

Emergency Procedures

Emergency related equipment is located at:

8. Fire Alarm pull / signal station _____
9. Fire Extinguishers _____
10. Fire Hose _____
11. Panic Alarm / Security Signaller _____
12. PPE Masks and Shields: _____
13. Fire Blankets: _____
14. First Aid Kit: _____

Arcom Technical Services – Main Office

4438 97 Street
Edmonton, Alberta
T6E 5R9
(780) 463-5850

 First Aiders on Site 

Bobbi Tooke (780) 690-4742

Fire Extinguishers	First Aid Kits	Eye Wash Station
Hallway locations, kitchen, shop and main floor	Kitchen & Safety Office	Safety Office

EMERGENCY FACILITIES

911

Hospital Grey Nun's Hospital 1100- Youville Drive (780) 735-7000	**Police** 7903-104st T6E 6N8 (780) 496-8565
STARS (780) 447-5492 Cell: #4567	**Poison Control** 1-800-332-1414

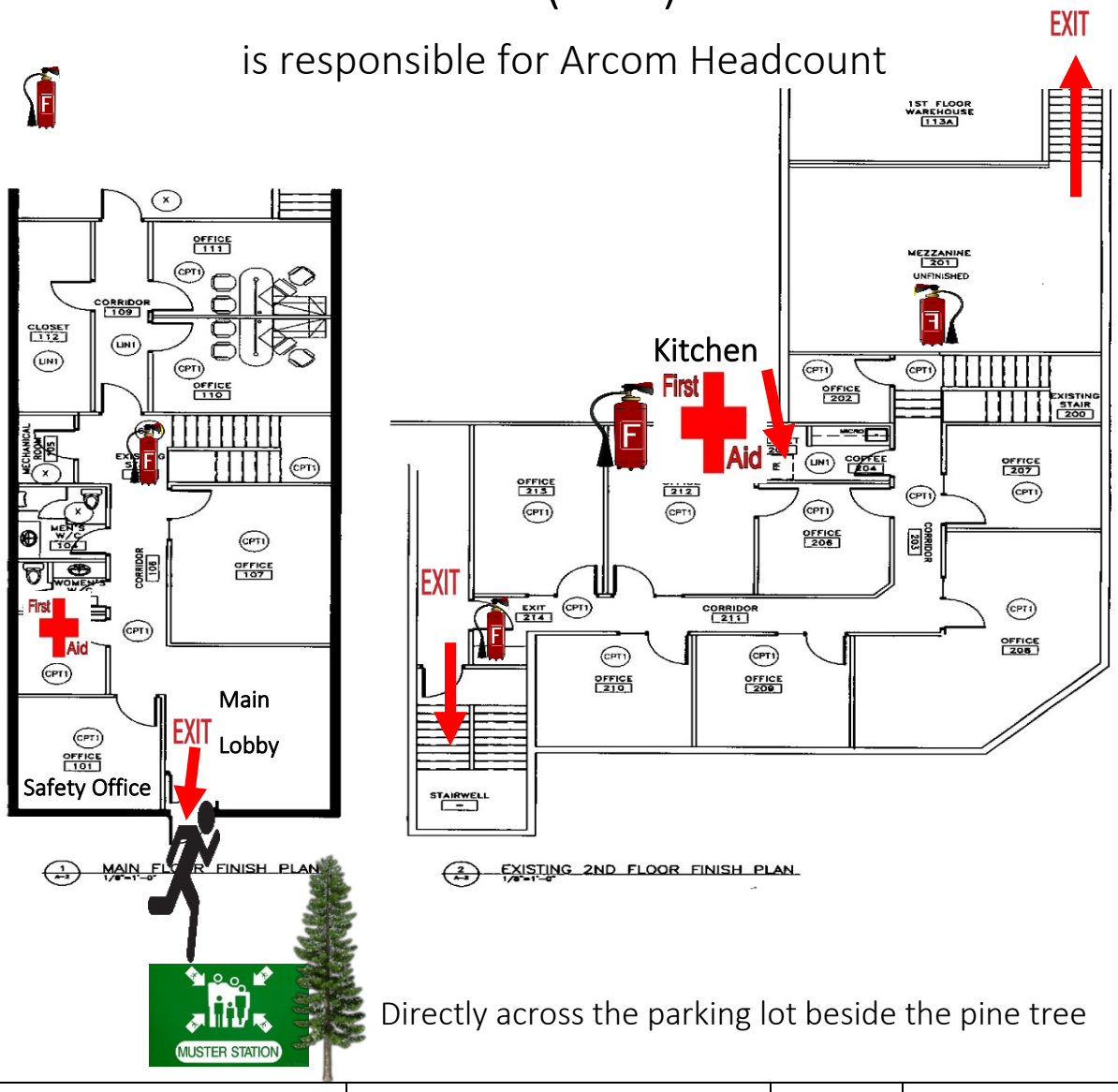
Emergency Utility Contacts

Alberta One Call 1-800-242-3447	**Water Utility** (780) 412-4500 (Edmonton & Area)
Electrical Utility (780) 412-4500 – Edmonton (780) 310-9473 – Outside Edmonton	**Gas Utility** (780) 420-5585

Muster Point

Trevor Arden (780) 887-9757

is responsible for Arcom Headcount



Directly across the parking lot beside the pine tree

Muster Point Confirmed by:		Date:	
Safety start-up completed by:		Date:	

RECORDS AND STATISTICS

RECORDS AND STATISTICS INDEX

Records and Statistics Policy

It is the policy of Arcom Technical Services Ltd. to record and trend all accidents from every project site.

Records and Statistics will provide vital information to assess our company's Safety Program, and to make the necessary modifications to prevent any serious accidents from occurring in the future and eliminate all negative trends in our company's Safety Program.

All Construction Professionals are responsible for the completion of our Safety Activity Summary and to supply correct and timely information to the company Manager.

An injury and incident-free workplace is our goal. Through continuous health and safety efforts, we can accomplish this.

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

Yearly Safety Summary

Date	Type/Aid	Location	Description	WCB/Mod	Work Days Missed	Corrective action	Due	Completed	M1 Review
PD = Property Damage		NM = Near Miss							
Year									

ARCOM Technical Services Ltd.

EMPLOYEE TRAINING RECORD

Date:

	Course # & Date/Time Completed									
	1	2	3	4	5	6	7	8	9	10
1. Employee Name: Date of Hire: Trade/Occupation:										
2. Employee Name: Date of Hire: Trade/Occupation:										
3. Employee Name: Date of Hire: Trade/Occupation:										
4. Employee Name: Date of Hire: Trade/Occupation:										

Course #	Expiry Date	Comments:
1. Auditor	3 Years	
2. Confined Space/Gas Detection & Monitoring	Ongoing	
3. Explosive/Powder Actuated Tools	Ongoing	
4. First Aid	3 Years	
5. Flag person	3 Years	
6. CSTS/RSTS	Ongoing	
7. LSE	Ongoing	
8. Orientation	Ongoing	
9. TDG	3 Years	
10. WHMIS	3 Years	

ARCOM Technical Services Ltd.

EMPLOYEE TRAINING SUMMARY

EMPLOYEE NAME	Orientation	PPE	Safe Work Practices	Job Procedures	Apprenticeship Training	First Aid	WHMIS	TDG	Confined Space	H2S	Trenching	Comments
	Date Training Completed											

LEGISLATION

LEGISLATION INDEX

LEGISLATION POLICY

It is the policy of Arcom Technical Services Ltd. to abide by the OH & S regulations regarding the work place health and safety of all company employees.

The safety information in this manual does not take precedence over OH & S Regulations. All employees should be familiar with the OH & S Act, Regulations and Code.

All employees shall always have access to the most recent copy of the OH & S Act and Regulations on all sites.

The safety information in this policy does not take precedence over applicable government legislation. All employees should be familiar with the OH & S Act and Regulations.

Signature:	Date:
AJ Smith e-signature	March 25, 2019

Reporting and Investigating Injuries and Incidents

OHS information for employers

Reporting and Investigating Injuries and Incidents

The information in this Safety Bulletin is intended to help employers report and investigate workplace injuries and incidents as required by the Occupational Health and Safety (OHS) Act. This is the law that governs workplace health and safety in Alberta.

Injuries may also have to be reported to the Workers' Compensation Board – Alberta as outlined under the Workers' Compensation Act, which falls outside the scope of this Bulletin.

What types of injuries and incidents have to be reported?

According to the OHS Act, injuries and incidents have to be reported to the Government of Alberta if they:

a) result in a death;
b) cause a worker to be admitted to hospital for more than two days;
c) involve an unplanned or uncontrolled explosion, fire or flood that causes or has the potential to cause a serious injury;
d) involve the collapse or upset of a crane, derrick or hoist; or
e) involve the collapse or failure of any component of a building or structure necessary for the structural integrity of the building or structure.

Certain workplace injuries and incidents must be reported and investigated.

If you are unsure about whether to report the injury or incident, report it.

For dangerous occurrences at a mine or mine site, there are additional reporting requirements. Refer to section 544 of the OHS Code here for details.

WHOS RESPONSIBLE FOR REPORTING THE INJURY OR INCIDENT?

It's the responsibility of the prime contractor, or if there is no prime contractor, then the contractor or employer responsible for the work site.

HOW SOON AFTER THE INJURY OR INCIDENT MUST IT BE REPORTED?

Immediately, or as soon as possible given the circumstances.

If an injury is serious enough that it may cause a worker to stay in hospital for more than 2 days, report the injury right away. Do not wait for 2 days to confirm that it is a reportable injury.

Notify the Government of Alberta's Occupational Health and Safety Contact Centre by telephone at 1-866-415-8690 (780-415-8690 in the Edmonton local calling area).

The Contact Centre is able to accept calls 24 hours per day, seven days per week.

alberta.ca
LI016 – February 2017 ISBN 978-1-4601-3302-0 (PDF)

Alberta Government

Reporting and Investigating Injuries and Incidents

What information will I be asked to provide?

Be prepared to provide the following information:

a) location of incident or injury;
b) site contact person's name, job title and phone number(s);
c) general details of what happened;
d) time and date the incident or injury occurred;
e) name of employer;
f) employer's relationship to the worksite (owner, prime contractor, contractor or supplier);
g) injured worker's name, date of birth, and job title (if applicable); and
h) name and location of hospital the worker was taken to (if applicable).

If the incident or injury happened at a well site, be prepared to provide the following additional information:

a) name of the rig manager;
b) well site supervisor's name and phone number;
c) name of the drilling company;
d) rig number; and
e) rig phone number(s).

If all the information regarding the incident or injury isn't immediately available, call in with the information that is available. Additional information can be provided when it becomes available.

WHAT ABOUT REPORTING OTHER TYPES OF INCIDENTS OR INJURIES?

The *OHS Act* doesn't require the reporting of other types of injuries and incidents to government. If you're unsure about whether to report the incident or injury, call it in.

What happens after an incident or injury has been reported?

An OHS officer or investigator may be dispatched to the incident scene to gather additional information or conduct an investigation. An officer or investigator has the authority to:

a) visit the scene of the incident;
b) ask any questions to determine the causes and circumstances of the incident;
c) request information from anyone present at the time of an incident;
d) seize or take samples of any substance, material, product, tool, appliance or equipment that was present at, involved in, or related to the incident; and
e) stop all or some of the activities at the worksite.

Did You Know?

A government investigator may visit the worksite and conduct a formal investigation.

I WAS TOLD I CAN'T TOUCH OR MOVE ANYTHING AT THE SCENE OR A REPORTABLE INCIDENT OR INJURY. IS THIS TRUE?

Yes and no. You can't disturb the scene of a reportable incident or injury unless:

a) you have to attend to someone who has been injured or killed;
b) you have to take some action to prevent further injuries;
c) you have to protect property that is endangered as a result of the incident; or
d) you have been given permission to do so by an OHS officer or a peace officer.

Alberta Government

Reporting and Investigating Injuries and Incidents

When and by whom does an investigation have to be conducted?

When any reportable injury or incident happens, an investigation has to be conducted and an investigation report completed. An investigation also has to be conducted and an investigation report completed for other incidents that had the potential to cause a serious injury.

It's the responsibility of the prime contractor, or if there is no prime contractor, then the contractor or employer responsible for the work site to investigate and complete an investigation report. The prime contractor, contractor or employer is required to conduct their own independent investigation regardless of whether the government conducts an investigation.

Why bother with an investigation report?

Three reasons. First, it's the law. Second, finding out what happened can help prevent a similar injury or incident from happening. And third, finding out what happened can help prevent future property damage and production losses.

What do I do with the investigation report when it's completed?

The prime contractor's, contractor's or employer's investigation report is an internal company document and must be kept on file for a ***minimum of two years*** following the incident or injury. You're not required to send a copy to the government.

However, the report has to be readily available for inspection by an OHS officer when requested.

Can an employer's investigation report or employee witness statements be used in court evidence?

Employer/Contractor/Prime Contractor Investigation Reports and Witness Statements must be disclosed to OHS officers upon request, but have the following legal protection:

Investigation Report

The Investigation Report created by employers/contractors/prime contractors cannot be used as evidence in any legal proceeding including, but not limited to, OHS Act prosecutions, criminal prosecutions, private lawsuits, and Fatality Inquiries. The Report, however, can be used in evidence in a prosecution for perjury or giving contradictory evidence. (Reference OHS Act Section 18).

Witness Statements

Witnesses Statements collected by OHS Officer either directly from the witnesses, or those collected from the employers then obtained by an OHS Officer, cannot be used in evidence in any legal proceeding including, but not limited to, OHS Act prosecutions, criminal prosecutions, private lawsuits, and Fatality Inquiries. Witness statements, however, can be used in evidence in a prosecution for providing a false statement to an OHS Officer or to establish non-compliance with the OHS Officer's authority to investigate. (Reference OHS Act Section 19).

Alberta Government

Reporting and Investigating Injuries and Incidents

Contact Us

OHS Contact Centre

Edmonton & Surrounding area
- 780-415-8690

Throughout Alberta
- 1-866-415-8690

Deaf or hearing impaired:
- 780-427-9999 (Edmonton)
- 1-800-232-7215 (Alberta)

Website
work.alberta.ca/ohs-contact us

Get Copies of OHS Act, Regulation and Code

Alberta Queen's Printer
www.qp.gov.ab.ca

Occupational Health and Safety
work.alberta.ca/ohs-legislation

FOR MORE INFORMATION:

Government of Alberta E-Learning Programs

Alberta Government

Occupational Health and Safety Bulletin

Fall Protection Plan

This Safety Bulletin outlines the requirements of specific sections of Alberta's *Occupational Health and Safety (OHS) Code 2009* related to Fall Protection Plans, and includes a basic template. Workers working from heights and employers responsible for the worksites need to understand what is required by law.

Legislative Requirements

Section 140 of the *Code* states:

140(1) An employer must develop procedures that comply with this Part in a fall protection plan for a work site if a worker at the work site may fall 3 metres or more and the worker is not protected by guardrails.

140(2) A fall protection plan must specify
(a) the fall hazards at the work site,
(b) the fall protection system to be used at the work site,
(c) the anchors to be used during the work,
(d) that clearance distances below the work area, if applicable, have been confirmed as sufficient to prevent a worker from striking the ground or an object or level below the work area,
(e) the procedures used to assemble, maintain, inspect, use and disassemble the fall protection system, where applicable, and
(f) the rescue procedures to be used if a worker falls and is suspended by a personal fall arrest system or safety net and needs to be rescued.

140(3) The employer must ensure that the fall protection plan is available at the work site and is reviewed with workers before work with a risk of falling begin.

140(4) The employer must ensure that the plan is updated when conditions affecting fall protection change.

Alberta Government

Key Points to Remember

1. There must be a Fall Protection Plan (FPP) for all work from a height of 3 metres or more where the worker is not protected by guardrails and when a travel restraint or personal fall arrest is used. While a FPP is not required for aerial platforms, it is recommended.

2. The FPP must be available at the work site and be reviewed with workers before starting work at heights.

3. The FPP must be site and situation specific and updated when conditions change. This means there may be several FPPs for different jobs at a single site, such as work on structural steel, Q-decking, etc.

4. The FPP must contain the detailed information in Section 140(2).

Responsibility and Accountability for Health and Safety

Obligations

Management

- Ensure the health and safety of all Arcom Technical Services ltd. personnel (managers, employees, sub-contractors and visitors) that are present at the worksite.
- Provide a "Company Health and Safety Policy". This policy provides a commitment and philosophy that sets levels of expectations for safety performance throughout the corporation.
- Provide information, instructions, and assistance to all personnel to protect their health and safety.
- Understand and enforce the accident prevention policy as well as the Occupational Health and Safety legislation.
- Provide all personnel with an understanding of our accident prevention program as well as relevant Occupational Health and Safety legislation.
- Ensure all established safety policies are administered and enforced in all areas at all times.
- Ensure that all personnel are aware of their responsibilities and duties under the Occupational Health and Safety Act, as well as any other applicable regulations and codes.
- Maintain overall control and direction of the Safety and Loss Prevention Program.
- Provide all personnel with proper, well-maintained tools and equipment, as well as any specialty PPE that may be required for a job.
- Provide ongoing safety training and education in the form of approved courses, such as first aid, fall arrest, elevated work platform, etc.
- Monitor all departments and projects for the purpose of maintaining accountability for individual safety performance.

Supervisory Staff

- Provide jobsite orientation to all personnel entering the site.
- Know and apply the company's safety policies and relevant Occupational Health and Safety legislation.
- Ensure that all personnel are educated to work in a safe manner, using all protective devices, and following all procedures required by Arcom Technical Services ltd., and by Occupational Health and Safety legislation to protect their health and safety.
- Warn all personnel of any potential or actual dangers, and advise them how to isolate, prevent, and/or remove such dangers.
- Arrange for medical treatment, when required, in the case of injury or illness, including transportation to a doctor or hospital when necessary.
- Report all accidents immediately, investigate all accidents fully, and advise management on how to prevent similar accidents in the future.
- Carry out regular inspections of the work place to ensure a safe and healthy environment.
- Provide a good example for employees by always directing and performing work in a safe manner.
- Maintain a high housekeeping standard and assign specific responsibilities to individuals to foster good housekeeping practices.
- Be knowledgeable of and responsible for complying with all regulations, laws and codes, and enforce all established safety regulations and work methods.

WORKERS RESPONSIBILITIES:

- Read, understand, and comply with Arcom Technical Services Ltd. safety policy, safe work practices, safe job procedures, and rules, as well as all Occupational Health and Safety legislation.
- Understand and abide by all company Rules and Regulations, accepting our standard of health and safety.
- Wear the safety equipment, personal protective devices and clothing required by OH&S Regulations and Arcom Technical Services Ltd.
- Notify their supervisor(s) of any unsafe conditions or acts that may be of danger to other workers or themselves.
- Report all accidents, incidents, near misses and/or injuries to their supervisor(s) as soon as possible.
- Take every reasonable precaution to protect the safety of other workers, the public, and themselves.

SUB-CONTRACTORS/SUPPLIERS:

- Employers on the worksite are responsible for the health and safety of their employees, as regulated by all applicable acts and regulations. Sub-Contractors/suppliers are obligated to comply with all laws, regulations and codes.
- Actively promote safe working performance on the part of their employees.
- always Maintain good housekeeping practices and orderliness.
- Ensure that all employees are equipped with, and trained in, the proper use of Personal Protective Equipment (PPE) as required by Occupational Health and Safety regulations.
- Ensure that the general public is protected from damage and/or injury due to the work the sub-contractor is doing (proper barricading, signage and other safety precautions must be followed.)
- Every supplier shall ensure, as far as it is reasonably practicable for the supplier to do so, that any tool, appliance or equipment that the supplier supplies is in safe operating condition.
- Every supplier shall ensure that any tool, appliance, equipment, designated substance or hazardous material that the supplier supplies complies with Occupational Health and Safety standards, as well as all other applicable regulations and codes.
- Every sub-contractor who directs the activities of any other sub-contractors involved in work at the worksite shall ensure, as far as it is reasonably practicable to do so, that the sub-contractor complies with Occupational Health and Safety standards, as well as any other applicable regulations and codes being implemented at that worksite.
- Report all accidents, incidents, near misses and/or injuries to Arcom Technical Services Ltd. as soon as possible. Conduct investigations where incidents involving personal injury, damaged equipment or property occur. This information must be passed on to Arcom Technical Services Ltd.

VISITORS:

- Report to the project office and obtain permission for entry onto the site. This may require completing a site safety orientation.

- Wear all Personal Protective Equipment (PPE) required for the site, ensuring it is in good condition, free of defects and alterations.

- Comply with the safety policies of Arcom Technical Services Ltd., Occupational Health and Safety standards, as well as any other applicable regulations and codes being implemented at that worksite.

- Report all accidents, incidents, near misses and/or injuries to Arcom Technical Services Ltd. as soon as possible.

Personal Rights and Duties

What Personal Rights and Duties do I have under occupational health and safety laws in Canada?

Everyone who works has rights and duties under the workplace health and safety law in Canada. This law is called the Occupational Health and Safety (OH&S) Act.

Rights of Employees

Under this legislation, employees have two important rights and one obligation:

4. The right to know
   All employees have a right to know what hazards are present on the job, and how those hazards can affect them. They usually learn about this in health and safety training, including WHMIS.
5. The right to participate
   All employees have a right to take part in health and safety activities, for example, they can choose to be a health and safety representative. They also have a right to report unsafe practices and conditions.
6. The obligation to refuse dangerous work
   All employees must refuse work that is dangerous to themselves or to co-workers. In this case, they follow specific procedures.

Duties of Employers

It is the employer's responsibility to:

7. Take every reasonable action to ensure the workplace is safe
8. Train employees on how to work safely with hazardous materials. They need to know how to use, store, handle and dispose of them. They also need to know what to do in an emergency.
9. Supply personal protective equipment. They also need to make sure workers know how to use the equipment safely and properly.
10. Report all critical injuries right away.
11. Appoint a health and safety representative or set up a joint health and safety committee.

For more information go to:
www.ccohsca.ca

SUBCONTRACTOR FORMS AND REPORTING

SUBCONTRACTOR FORMS AND REPORTING INDEX

Sub-Contractor Safety Sign-Off Form

Subcontractors Under Arcom Technical Services

Check List for Safety Plan – Subcontractor

Sub-Contractor Safety Performance Assessment

Responsibility and Accountability for Health and Safety

Personal Rights and Duties

SUB-CONTRACTOR SAFETY SIGN-OFF FORM

Project Name: _____ Subcontractor Name: _____

1. With respect to the work process prescribed for the above project number the subcontractor will ensure all requirements of the respective Provincial or Territorial, Occupational Health and Safety and Employment Standards Legislation are always adhered to by **all** workers in their employ. Furthermore, the subcontractor will immediately comply with all orders regarding safety issued by O.H. & S., Contractor and/or the Client.
2. The subcontractor will take adequate measures and apply necessary precautions to identify and eliminate hazards with can affect the health and safety of the workers in their control during the ongoing work process. PSI's shall be performed daily for all tasks.
3. The subcontractor will participate in and abide by the requirements of the Contractor and Clients Safety and Loss Prevention programs. The subcontractor will designate a person(s) capable of contributing to the program and this person(s) will be made available to serve on the Contractor and Clients own Safety Committee as required.
4. The subcontractor will provide, always, an adequate number of Certified First Aid Attendants and ensure the provisions of the pertinent legislation and site requirements are met or exceeded. All equipment, facilities and record books, as prescribed for in Occupational Health and Safety Legislation and Worker's Compensation Board rule, will be provided by the subcontractor.
5. If subcontractor implements a site Safety Program, such a program and all associated reporting procedures are deemed as being ancillary to the Contractor and Client's own Safety and Loss Prevention Program and reporting requirements
6. Prevention of accidents and the correction of unsafe conditions and acts remain the responsibility of the Subcontractor
7. The subcontractor shall actively promote safe working performance on the part of their employees
8. An effective system of indoctrination and education of safety policies and procedures of all employees is mandatory.
9. Good housekeeping and orderliness are a basic requirement for all jobs and must always be maintained.
10. The subcontractor shall ensure that all employees are equipped with personal protective equipment required by Occupational Health and Safety Regulations.
11. An investigation must be conducted where incidents involving personal injury, damaged equipment or property occur. This information must be passed on to the site supervisor.
12. Failure to comply with OH&S, WCB, Arcom Technical Services or Client safety and environmental rules and regulations may be used as grounds to terminate the contract agreement.

Date Subcontractor Signature

Date: Witness Signature/Seal

SUBCONTRACTORS UNDER ARCOM TECHNICAL SERVICES

- Employers on a worksite are responsible for the health and safety of their workers as regulated by all applicable acts and regulations

- Our sub-contractors are obligated to comply with all laws, regulations and codes concerning safety as they are applicable to the work they are doing and to any pre-established safety standards, for the duration of the project.

- The sub-contractor shall actively promote safe working performance on the part of their employees

- Good housekeeping and orderliness are a basic requirement for all jobs and must always be maintained

- The sub-contractor shall ensure that all employees are equipped with personal protective equipment required by the Occupational Health and Safety Regulations.

- The sub-contractor shall ensure that the public is protected from damage and injury due to the work the sub-contractor is doing (proper barricading, signage and other safety precautions must be followed)

- An investigation must be conducted where incidents involving personal injury, damaged equipment or property occur.

- This information must be passed on to the site supervisor

SUB-CONTRACTOR CHECK LIST

Arcom Technical Services Ltd.

Sub-Contractor Name: _____

Representative: _____

Phone Number: _____

1. Does your company have a current health and safety program?	☐ YES	☐ NO
1.1 Do you have a Health & Safety Program?	☐ YES	☐ NO
1.2 Are you COR certified?	☐ YES	☐ NO
1.3 Do you have current WCB coverage	☐ YES	☐ NO
What is the name of your Health & Safety Representative?		
2. Have you developed safe work practices & procedures?	☐ YES	☐ NO
If "No" or for any variances, please explain.		
3. Will you be conducting safety inspections on this work site?	☐ YES	☐ NO
3.1 Are there specific procedures for reporting hazards to you?	☐ YES	☐ NO
3.2 Will Arcom be notified if you identify a hazard?	☐ YES	☐ NO
If "No" or for any variances, please explain.		
4. Do you have an Emergency Response Plan for each site?	☐ YES	☐ NO
4.1 Site evacuation (responsibilities, signals, communications)?	☐ YES	☐ NO
4.2 Medical emergency evacuations?	☐ YES	☐ NO
4.3 First aid for serious injuries?	☐ YES	☐ NO
If "No" or for any variances, please explain.		
5. If an incident occurs on site; will you ensure Arcom gets a copy of your incident report?	☐ YES	☐ NO
If "No" or for any variances, please explain.		

SUB-CONTRACTOR CHECK LIST

6. Does you company have a PPE policy?	☐ YES	☐ NO
Please explain.		
7. Does your company have a drug and alcohol policy?	☐ YES	☐ NO
Please explain.		
8. Does your company have a discipline/harassment policy?	☐ YES	☐ NO
Please explain.		
9. Are your employees current in the required safety training? Eg. Fall/lift tickets, 1st aid, confined space, etc. (certificates of training are required for specific sites)	☐ YES	☐ NO
If "No" or for any variances, please explain.		

Site Orientations and WCB clearance letters are mandatory for every ARCOM site; please report to the Site-Supervisor (foremen) prior to entering site

Sub-Contractor Name: _____

Representative: _____

Phone Number: _____

_____ _____

Sub-Contractor's Signature: Date

SUB-CONTRACTOR SAFETY PERFORMANCE ASSESSMENT

PROJECT & LOCATION: _____ DATE: _____

#	Assessment Action Required	When	Who	Done

Inspection/ Discussion Date	Action Items	Compliance

Overall Safety Performance Item	Excellent	Satisfactory	Poor
OH&S Compliance			
Site Safety requirements complied with			
Cooperation			
Deficiencies corrected in a timely manner			

Documentation complete & submitted in timely fashion			
Interaction with clients			
Interaction with the public			
Other/Describe			

Any corrective action required before re-hire?

RECOMMENDATION FOR FUTURE CONTRACTS

Position	Signature	Yes	No	Under Review
Project Manager/Supervisor				
Safety Coordinator				
Management				

Sub-Contractor Representative	Signature	Date

Responsibility and Accountability for Health and Safety

Obligations

Management

- Ensure the health and safety of all Arcom Technical Services ltd. personnel (managers, employees, sub-contractors and visitors) that are present at the worksite.
- Provide a "Company Health and Safety Policy". This policy provides a commitment and philosophy that sets levels of expectations for safety performance throughout the corporation.
- Provide information, instructions, and assistance to all personnel to protect their health and safety.
- Understand and enforce the accident prevention policy as well as the Occupational Health and Safety legislation.
- Provide all personnel with an understanding of our accident prevention program as well as relevant Occupational Health and Safety legislation.
- Ensure all established safety policies are always administered and enforced in all areas.
- Ensure that all personnel are aware of their responsibilities and duties under the Occupational Health and Safety Act, as well as any other applicable regulations and codes.
- Maintain overall control and direction of the Safety and Loss Prevention Program.
- Provide all personnel with proper, well-maintained tools and equipment, as well as any specialty PPE that may be required for a job.
- Provide ongoing safety training and education in the form of approved courses, such as first aid, fall arrest, elevated work platform, etc.
- Monitor all departments and projects for maintaining accountability for individual safety performance.

Supervisory Staff

- Provide jobsite orientation to all personnel entering the site.
- Know and apply the company's safety policies and relevant Occupational Health and Safety legislation.
- Ensure that all personnel are educated to work in a safe manner, using all protective devices, and following all procedures required by Arcom Technical Services ltd., and by Occupational Health and Safety legislation to protect their health and safety.
- Warn all personnel of any potential or actual dangers, and advise them how to isolate, prevent, and/or remove such dangers.
- Arrange for medical treatment, when required, in the case of injury or illness, including transportation to a doctor or hospital when necessary.
- Report all accidents immediately, investigate all accidents fully, and advise management on how to prevent similar accidents in the future.
- Carry out regular inspections of the work place to ensure a safe and healthy environment.
- Provide a good example for employees by always directing and performing work in a safe manner.
- Maintain a high housekeeping standard and assign specific responsibilities to individuals to foster good housekeeping practices.
- Be knowledgeable of and responsible for complying with all regulations, laws and codes, and enforce all established safety regulations and work methods.

Workers Responsibilities:

- Read, understand, and comply with Arcom Technical Services Ltd. safety policy, safe work practices, safe job procedures, and rules, as well as all Occupational Health and Safety legislation.
- Understand and abide by all company Rules and Regulations, accepting our standard of health and safety.
- Wear the safety equipment, personal protective devices and clothing required by OH&S Regulations and Arcom Technical Services Ltd.
- Notify their supervisor(s) of any unsafe conditions or acts that may be of danger to other workers or themselves.
- Report all accidents, incidents, near misses and/or injuries to their supervisor(s) as soon as possible.
- Take every reasonable precaution to protect the safety of other workers, the public, and themselves.

SUB-CONTRACTORS/SUPPLIERS:

- Employers on the worksite are responsible for the health and safety of their employees, as regulated by all applicable acts and regulations. Sub-Contractors/suppliers are obligated to comply with all laws, regulations and codes.
- Actively promote safe working performance on the part of their employees.
- always Maintain good housekeeping practices and orderliness.
- Ensure that all employees are equipped with, and trained in, the proper use of Personal Protective Equipment (PPE) as required by Occupational Health and Safety regulations.
- Ensure that the public is protected from damage and/or injury due to the work the sub-contractor is doing (proper barricading, signage and other safety precautions must be followed.)
- Every supplier shall ensure, as far as it is reasonably practicable for the supplier to do so, that any tool, appliance or equipment that the supplier supplies is in safe operating condition.
- Every supplier shall ensure that any tool, appliance, equipment, designated substance or hazardous material that the supplier supplies complies with Occupational Health and Safety standards, as well as all other applicable regulations and codes.
- Every sub-contractor who directs the activities of any other sub-contractors involved in work at the worksite shall ensure, as far as it is reasonably practicable to do so, that the sub-contractor complies with Occupational Health and Safety standards, as well as any other applicable regulations and codes being implemented at that worksite.
- Report all accidents, incidents, near misses and/or injuries to Arcom Technical Services Ltd. as soon as possible. Conduct investigations where incidents involving personal injury, damaged equipment or property occur. This information must be passed on to Arcom Technical Services Ltd.

VISITORS:

- Report to the project office and obtain permission for entry onto the site. This may require completing a site safety orientation.

- Wear all Personal Protective Equipment (PPE) required for the site, ensuring it is in good condition, free of defects and alterations.

- Comply with the safety policies of Arcom Technical Services Ltd., Occupational Health and Safety standards, as well as any other applicable regulations and codes being implemented at that worksite.

- Report all accidents, incidents, near misses and/or injuries to Arcom Technical Services Ltd. as soon as possible.

Personal Rights and Duties

What Personal Rights and Duties do I have under occupational health and safety laws in Canada?

Everyone who works has rights and duties under the workplace health and safety law in Canada. This law is called the Occupational Health and Safety (OH&S) Act.

Rights of Employees

Under this legislation, employees have two important rights and one obligation:

7. The right to know
   All employees have a right to know what hazards are present on the job, and how those hazards can affect them. They usually learn about this in health and safety training, including WHMIS.
8. The right to participate
   All employees have a right to take part in health and safety activities, for example, they can choose to be a health and safety representative. They also have a right to report unsafe practices and conditions.
9. The obligation to refuse dangerous work
   All employees must refuse work that is dangerous to themselves or to co-workers. In this case, they follow specific procedures.

Duties of Employers

It is the employer's responsibility to:

12. Take every reasonable action to ensure the workplace is safe
13. Train employees on how to work safely with hazardous materials. They need to know how to use, store, handle and dispose of them. They also need to know what to do in an emergency.
14. Supply personal protective equipment. They also need to make sure workers know how to use the equipment safely and properly.
15. Report all critical injuries right away.
16. Appoint a health and safety representative or set up a joint health and safety committee.

For more information go to:
www.ccohsca.ca

ARCOM TECHNICAL SERVICES

Safety Forms