

01030 Safety Requirements**Index**

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01030-1 Scope

The requirements contained in this document must be followed by all contractors, consultants, sub-contractors, and workers that perform work under the following conditions:

- on a City of Saskatoon Right of Way (ROW),
- performing work under contract with a City Division,
- all City representatives performing work for the City of Saskatoon.

If a non-conformance of any of the following standards are found by City representatives, work may be stopped until the non-conformance is rectified, and/or the affected individual has submitted an acceptable investigation report showing a root cause of the event and a long-term corrective action.

01030-2 General**2.1 Description**

This Specification details the requirements for ensuring the safety of people and property affected by performance of work. Requirements for safety are specified under various City procedures, policies, contracts, *The Saskatchewan Employment Act*, and *The Saskatchewan Occupational Health and Safety Regulations, (Latest version)*. This document is intended to be educational, informational, and supplementary. Some sections of this document will set a stricter standard than the above-mentioned documents. In the event of conflict between any provisions of above authorities, the most stringent provision shall apply. All contractors must comply with or exceed the safety practice of all applicable legislation, regulations, contract, policies, and procedure documents, including the *Saskatchewan Occupational Health and Safety Regulations*. If the standard of practice written in this procedure is above and beyond the actions needed by the regulations, legislation, policy, City contract, or procedure, this document will govern.

2.2 Definitions

Root Cause - The cause or causes of an incident that if controlled would eliminate or lessen to a reasonable amount the re-occurrence of the same or similar incident.

Corrective Action - The actions taken after an incident to ensure an incident re-occurrence is prevented or a hazard is controlled to a reasonable amount to prevent the re-occurrence of the same or similar incident.

A Plant - A place of employment and includes any premises, site, land, mine, water, structure, fixture, or equipment employed or used in the carrying on of an occupation. (*The Saskatchewan Employment Act*).

Temporary Protective Structure - A structure or device in an excavation, trench, tunnel, or excavated shaft that is designed to provide protection from cave-ins, collapse, sliding or rolling materials, and includes shoring, boxes, trench shields and similar structures. (*The Saskatchewan Occupational Health and Safety Regulations*).

City - The City of Saskatoon

City representative - Any person or group of people given authority by a City Division and actively working for the City of Saskatoon Division overseeing the work being performed.

City of Saskatoon Right of Way (ROW) - Right of way is the legal right, established by grant from a landowner or long usage, to pass along a specific route through property belonging to another.

The City of Saskatoon Public (the public) - Any resident of the City of Saskatoon or visitor spending time within the limits of the City of Saskatoon for any amount of time.

2. Construction Safety Measures

2.1. Contractor Safety Responsibility

All consultants, contractors, sub-contractors, and self-employed individuals who perform work for the City must have an Occupational Health and Safety program as outlined in the *Saskatchewan Occupational Health and Safety Regulations*. City representatives may ask for the information outlined in this part of the regulations at any time before or during the performance of work for the City. If the information described is inadequate or cannot be produced, work may not be allowed to commence or may be stopped until the information needed is provided to the City.

The *Saskatchewan Employment Act* General duties of owner's states:

“Every owner of any plant used as a place of employment shall: (a) ensure, insofar as is reasonably practicable, that any area of the plant or activity occurring in or on an area of the plant that is not in the direct and complete control of any contractor, employer or self-employed person who works or employs one or more workers who work in or on the plant: (i) is maintained or is carried on in compliance with this Part and the regulations made pursuant to this Part; and (ii) does not endanger the health or safety of any contractor, employer, worker or self-employed person who works in or on the plant; and (b) comply with this Part and the regulations made pursuant to this Part.”

As the contractor in control of the area of work, the prime or general contractor has the primary responsibility to ensure safe work practices are being adhered to while work is being performed. As the owner of the Right of Way, the City also has a responsibility to ensure that appropriate safety practices are being adhered to during all work activities. Together both parties are responsible to ensure the health and safety of the City public, City staff, as well as all contracted staff.

The City public must always be appropriately and safely separated from all construction activities. The contractor must ensure that all work activities take public safety into consideration and appropriately communicate with the public to ensure they are aware of access restrictions and hazardous conditions or changes in their communities. All safety hazards that may affect the public must be appropriately controlled. This may include communication signs, extra barricades, hazard tape, fencing, ramps, or any other means of control that will ensure public safety during periods of construction activity or inactivity. For more information on pedestrian safety, refer to The City's [Temporary Traffic Control Manual](#), [The Pedestrian and Cyclist Accommodation in Work Zones and Detours Policy](#), and The Traffic Control at [Pedestrian Crossings Policy](#).

2.2. Prime Contractor

The Saskatchewan Occupational Health and Safety Regulations, 2020, section 33-4 Prescribed activities of prime contractor states:

“The prime contractor shall: (c) ensure, insofar as is reasonably practicable, that all employers and self-employed persons have adequate and appropriate policies, procedures, safe work practices, equipment, competent workers and information to ensure that: (i) the employers, the workers and the self-employed persons comply with Part III of the Act and these regulations; (ii) the activities of the employers, the workers

or the self-employed persons do not jeopardize the health and safety of a worker or self-employed person at the required worksite; and (iii) the employers, the workers and the self-employed persons comply with any health and safety related policies and procedures implemented by the prime contractor; (d) identify a competent person to oversee and direct, on behalf of the prime contractor, the activities of owners, employers, workers and self-employed persons at the required worksite”

It is the prime contractor's responsibility to assure the above-mentioned regulation is followed and communicated to the appropriate parties. The prime contractor must communicate with the relevant City representative who the competent supervisor is on all sites. The prime contractor must also establish a primary individual who will be the contact between the City and each worksite.

The prime contractor must have a sub-contractor management plan to cover the following:

- Ensuring the sub-contractors are aware of and adhere to the City’s traffic control standards.
- Ensuring the sub-contractors are aware of regulatory requirements and City Standards and Specifications related to all work activities.
- Ensuring all onsite incidents are appropriately communicated, documented, and investigated.
- Ensuring the sub-contractors know the lines of communication with the City and the prime contractor to prevent missed communication or interpretation.
- Ensuring the sub-contractors have competent and sufficient supervision.
- Ensuring the sub-contractors are competent to perform their work including having sufficient procedures.
- Ensuring the safe coordination of site activities.
- Ensuring all safety rules are communicated to the City’s representative, sub-contractors, and delivery or support staff that may visit the site.

If the City’s representative finds a sub-contractor under the direct supervision of a contracted prime to be non-compliant with *The Saskatchewan Employment Act*, *The Occupational Health and Safety Regulations*, The City’s standards, specifications, bylaws, or policies, the City will hold the prime contractor responsible for assuring the rectification, documentation, and investigation of the non-compliance.

Site safety and coordination is the responsibility of the prime contractor. The prime contractor must assure that anyone who is inside of or adjacent to their worksite is appropriately protected from all hazards and site conditions. The Prime assumes a safety responsibility for all workers, the public, property, or environment that may be affected by their work.

If City staff are not following the appropriate safety rules on site, it is the prime contractor's responsibility to communicate requirements accordingly. If the contractor needs assistance in communicating safety rules to City staff, the relevant City division must be made aware. The City will then take action to ensure compliance with the safety rules.

3.2 Fire Safety Requirements

All consultants, contractors, sub-contractors, and self-employed individuals who perform work for the City must comply with requirements of standard for Building Construction Operations, DFC No. 301-1975, issued by Dominion Fire Commissioner.

This standard may be viewed at the Regional Engineer's office and copies may be obtained from:

Dominion Fire Commissioner
Sir Charles Tupper Building
Riverside Drive
Ottawa, Ontario K1A 0M2

All consultants, contractors, sub-contractors, and self-employed individuals who perform work for the City must comply with requirement of Bylaw No. 8175 *The Property Maintenance and Nuisance Abatement Bylaw, 2003* as enforced by the municipal inspector appointed by the Fire Chief.

01030-4 Trenching and Excavation Requirements

Trenching and excavation practices must meet or exceed all applicable *Saskatchewan Occupational Health and Safety Regulations, 2020*, Part 17 *Trenches, Tunnels and Excavated Shafts*.

The walls of the trench shall be sloped, shored, or a temporary protective structure must be used to prevent caving.

The City considers all soil beneath previously developed areas to be disturbed and therefore classified as Type 3 or 4 soil. If the soil type encountered on site is considered by the contractor to be Type 1 or 2, the City will require, at the cost of the Contractor, a stamped and signed document from a qualified geotechnical engineer, licensed to practice in Saskatchewan, stating the following:

- Assessment of soil type, as per *The Saskatchewan Occupational Health and Safety Regulations, 2020* on site.
- Proposed trench geometry based on the soil type.
- If the trench geometry proposed is not compliant with *The Saskatchewan Occupational Health and Safety Regulations, 2020* for the soil type encountered, detailed justification, including but not limited to slope stability analysis, is required.

If changes in the soil type are noted as the excavation progresses, the geotechnical engineer shall complete a reassessment and provide an updated geotechnical document detailing the result of the assessment and any changes to trench geometry required.

If no recent geotechnical information is available for the sub surface of the excavation footprint (within the past 5 years), the trench excavation will require reassessment by the geotechnical engineer every 75 m, and the geotechnical document will need to be updated and resubmitted to report the reassessment and any changes required.

All temporary protective structures must have all drawings and instruction necessary for its safe and effective use readily available at the site at which the protective structure will be used. This includes documentation that a professional engineer has certified that the protective structure will provide adequate protection to workers of the excavation, trench, tunnel, excavated shaft or borehole. If drawings and instructions are not on site, the work may be stopped until the documentation is readily available to all workers. If

the protective structure is not being used according to the drawings and instructions of use, the work may be stopped until the non-compliance is rectified.

If a Temporary Protective Structure is to be used in a way not specified by its design, the manufacturer must be consulted, and a written letter must be presented to the City.

All excavations in an urban area, or areas within City limits that could cause a falling hazard to the public, must be appropriately secured during periods of inactivity. This includes Anode holes, daylighting pits, and any other hazardous ground disturbance work. For further direction on this topic, refer to the City's Temporary Traffic Control Manual under the heading "During Periods of Inactivity". Fencing and other means of protecting the public must be placed around the excavation in a manner that it will not affect open sidewalks or pedestrian pathways.

4.1 Existing Utilities and Structures

Locate underground services before work begins. Work shall commence only when underground utilities are conspicuously marked or an all clear has been given in writing by the locating company. Verbal direction by the utility owner, the locating company, or a representative of either party shall not be accepted.

The Contractor is responsible to ensure all underground services are marked by the appropriate authority. This may require multiple service providers to mark their utilities, some of which may or may not subscribe to a third-party locating service (Sask1st Call).

The City utilities that are not subscribers to Sask1st call include Water and Sewer, Traffic Signal Infrastructure, Parks Irrigation, and Facilities.

The contractor is responsible to provide adequate advanced notice for locate requests, which may vary between utility companies. The City requires a minimum of three business days' notice to process the request and mark the lines. The three business days only accounts for the administrative portion of the request; the physical marking of the lines may take longer. For more information on locating underground utilities, visit the City's website at <https://www.saskatoon.ca/services-residents/power-water-sewer/locating-underground-utilities>.

The prime contractor shall ensure the locate expiry timeline is followed. The locate requester is responsible to preserve markings prior to the locate expiry, and have utilities relocated if marks are not clearly visible. After the validity period has expired, the locates must be re-assessed and potentially re-marked by the utility owner.

Up-to-date utility locate maps and relevant written communication must be available on site for workers to reference. If valid locates are not available on site, the work may be stopped until the documentation is readily available to all workers.

All overhead lines must be identified and brought to worker's attention if the lines present a hazard for workers or equipment. Approved methods for identification include signs, a spotter for equipment, or goal posts that highlight the minimum required clearance distance.

Further hazard control, such as deenergizing overhead lines, may be used. When utilities are deenergized, the prime contractor shall ensure permission is granted by the utility owner and the de-energization has occurred as requested before work commences.

Excavation in the vicinity of existing structures or utilities, shall be performed carefully and utilities protected, supported, or shored. The infrastructure owner's requirements must be followed for the inspection and supervision of work. When the owner requires a representative on site to inspect the work, the contractor shall coordinate that supervision. Any accidental damage such as severing a cable, scraping the coating on an underground pipe, or rupturing the pipe must be reported immediately through the appropriate emergency number. Any damage sustained to a utility during construction shall be considered the responsibility of the contractor and it is their responsibility to communicate with the utility company to ensure the utility is fixed.

4.2 Temporary Water Lines

Temporary water lines should be placed 300mm beyond the back of walk on City Property allowing for front and back edges of walk to be discernible for the visually impaired. Where retaining walls, fences, curbs, or other barriers exist, temporary lines are to be placed tight against the barrier or at the City representative's discretion.

All temporary water lines must be installed to not cause a tripping hazard for pedestrians. When tripping hazards from temporary water lines are present, they must

be marked with appropriate paint or appropriately communicated to the public. If the location of the line crosses an entrance to a residence, business, or high foot traffic area such as a walking path or ramp, a control must be created to reduce the potential of tripping.

If the temporary water line changes shape through the day and creates a tripping hazard, the line must either be secured in a safe position or re-positioned to not cause a hazard for pedestrians.

All temporary fire hydrants that are put into the temporary line system must be placed in front of or near an existing fire hydrant. The attachments for the fire hose must be 4" in diameter.

01030-5 Emergency Response Plan

The contractor shall have a site-specific emergency response plan identifying measures such as: emergency reporting procedures, incident investigation measures, contact information for emergency and support services, evacuation measures, a site plan indicating evacuation route, and muster locations and emergency equipment (ex. first aid station, fire extinguishers, etc.). The site plan shall also identify access to the worksite, haul routes, laydown areas, site trailer location (if applicable) and other details relevant to becoming orientated to the work site. All workers must be trained according to the emergency response plan, as stated in the *Occupational Health and Safety Regulations*. The emergency response plan must be communicated to the relevant City representative working with the affected crew.

If the construction site is frequently moving, a documented morning toolbox talk of what to do in case of an emergency will suffice, if it is accompanied by an emergency response plan procedure or organizational guidelines. The emergency response toolbox conversation should include but not be limited to, location of first aid kits, muster points, employee responsibilities in case of an emergency, location of nearest hospital, where emergency numbers are located, and who the first aid administrators are.

01030-6 Traffic Control Requirements**6.1 City of Saskatoon Authority**

The Transportation Department is the final authority on temporary traffic control standards and sets the extent of traffic disruption allowed on all City-owned ROW. The Contractor may be required to phase work if the City deems the entire work area may not be closed at one time.

A Right of Way (ROW) permit may be needed when doing work on a City ROW. To know if your work needs a ROW permit or for more information on ROW permits visit the City of Saskatoons website at “<https://www.saskatoon.ca/moving-around/driving-roadways/managing-traffic/traffic-permits/right-way-permit>”.

6.2 Contractor Responsibility

On Local class roadways and below, the contractor shall be responsible for developing, assessing, and updating the Temporary Traffic Control Plan (TTCP). The TTCP and material to be used must adhere to the City’s current edition of Temporary Traffic Control Manual, available at <https://www.saskatoon.ca/moving-around/driving-roadways/managing traffic>, and must include pedestrian and traffic control for all sidewalks, back lanes, etc. The contractor shall submit the proposed TTCP, to the appropriate City representative for approval or while submitting a right of way permit, a minimum of six (6) days prior to the work commencing. The TTCP must be readily available at the location of construction and approved by the Transportation Department.

Contractors are responsible to communicate any specific needs when submitting their traffic control plan for review before work commences. These needs may include staging or delivery areas, extra room for loading, extra room for larger equipment, or a specific change needed to accommodate the work.

6.3 City of Saskatoon Responsibility

On collector class roadways and above, the City shall be responsible for providing a TTCP to the contractor. For collector class roadways and above, the contractor must request the entire TTCP phasing for all work to be completed at a location. The contractor must provide six (6) business days’ notice for any changes to the TTCP.

For more information on Traffic Detour Requests, visit the City's website at <https://www.saskatoon.ca/moving-around/driving-roadways/managing-traffic/traffic-permits/traffic-detour-requests>.

6.4 Traffic Control Material and Devices

All traffic control material used, such as signs, barricades, and delineation devices, must be consistent with the dimensions, description, and colour information described in the City's Temporary Traffic Control Manual (TTCM). If set traffic control material does not meet the City's standards, a City representative may ask for the material to be changed. For example, barricades must be orange or yellow with reflective tape and must meet the dimensions set out in the TTCM.

The City must post or authorize the posting of all regulatory signs used as construction material during a full or partial closure, for example speed limit signs, no parking signs, stop signs etc.

1030-7 Powered Mobile Equipment

All powered mobile equipment that will be operated outside of a controlled work area requires a blanket annual vehicle permit. Further, all powered mobile equipment operating outside of a controlled work area must have an operating beacon, slow moving sign, and signal lights or be accompanied by a pilot vehicle.

"Fleet lists are required for all annual permits with multiple units. Please state the year, make, model, type (tractor unit, skid steer, loader, etc.) and serial number or plate number for each piece of equipment/vehicle (unlicensed and/or licensed)." For more information on permits the City's website should be visited at "<https://www.saskatoon.ca/moving-around/driving-roadways/managing-traffic/traffic-permits/truck-permits>".

All over dimensioned powered mobile equipment must follow Section 3.5 of the [Traffic Bylaw Special Permits Policy](#).

7.1 Operator Certification and Training Requirements

All contractor employees on site must be trained and have applicable certification on the type of job to be performed. All employees operating powered mobile equipment (PME) shall successfully complete the required training for operation of this equipment in

compliance with *The Saskatchewan Employment Act* and Part 11 of *The Occupational Health and Safety Regulations, 2020*. Proof of the successfully completed training shall be produced upon request by City authorized representatives. If an operator cannot produce proof of training upon request, the operator shall not be allowed to continue operations until the appropriate documentation is provided as outlined in Table 11.

01030-8 Dust Control

All activities that cause the entry of dust into the air where workers or the City public may be affected must be prevented.

Appropriate dust prevention measures shall be used according to the dust material's Safety Data Sheet, the *Saskatchewan Occupational Health and Safety Regulations* or the direction given by the City's engineer or contract. If no dust control measures are specified to prevent the entry of dust into the air by the previously mentioned authorities, water must be used as the primary dust control measure. In the event of conflict between any provisions of above authorities, the most stringent provision shall apply.

Wind erosion measures must be applied if the dust may cause property damage or nuisance to a neighborhood. Wind erosion measures may include water dampening of the dust or covering the source of the dust.

01030-9 Incident Reporting and Communication

In accordance with the *Saskatchewan Occupational Health and Safety Regulations*, an occupational health and safety program must include a procedure for the investigation of accidents, dangerous occurrences, and refusals to work, which occur at a place of work.

If the prime contractor is under contract with or is working in collaboration with a City Department, any work-related incidents that occur during construction must be reported by the prime contractor to City representatives in the form of an investigation report.

The prime contractor or its competent designate are responsible for investigating and creating an investigation report. All investigation reports must identify the root cause(s) of the incident and the corrective actions taken by the prime contractor. Incident reports must also have a detailed overview of the incident and the investigations as well as pictures that show the scene of the incident.

Any dangerous occurrence as defined in *The Saskatchewan Employment Act* and *The Occupational Health and Safety Regulations*, shall be reported to the applicable City representative as soon as reasonably possible, and with enough time for the City to perform their own incident assessment at the site if deemed necessary. The incident must also be reported to the Government (Ministry of Labor Relations & Workplace Safety – Division of Occupational Health & Safety) as soon as reasonably possible. If applicable, the City shall be copied on any communication with the government.

Any dangerous occurrence mentioned above must be investigated by a competent contractor representative and a written investigation report must be provided outlining the root cause and corrective action. If a City representative or contract indicates that work must be stopped in the event of a dangerous occurrence, work must be stopped until the incident investigation is completed, and City representatives have indicated they are satisfied with the actions taken in response to the incident.

01030-10 Harassment and Actions of Violence

All organizations or self-employed persons doing work for the City shall have a policy in writing to prevent harassment and acts of violence. For more information on these requirements, refer to the *Occupational Health and Safety Regulations*.

The City has a zero-tolerance rule for verbal or physical abuse. If a concern is raised to a City representative by a member of our staff, a contractor, or a member of the public, the concern will be treated seriously and without bias. Each concern will be investigated, and the amount of time allocated to the investigation will be dependent on the severity of the concern. As part of the investigation process, the City will rely on the cooperation of all parties involved to achieve the goal of the investigation, which is to work collaboratively together to allow us to adhere to our respectful workplace commitment.

01030-11 Authority

The City as a municipality has the authority to set standards for public safety, City employee safety, and construction operation safety. To ensure that work is being done safely for anyone using the City Right of Way, it is mandatory to adhere to City Policies and standards that are set by Bylaw, Contracts, *The Occupational Health and Safety Regulations*, *The Saskatchewan Employment Act*, *The Cities Act*, and any other

regulatory document that sets a legal standard for safe work operations, the safe operation or use of equipment and material, and to protect natural life.

The Ministry of Labour Relations and Workplace Safety sets a minimum standard for safe work operations. If the City's contracts, bylaws, policies, or standards are more stringent than the regulations, The City standards must be adhered to.

Canadian National Railway (CN) and the Canadian Pacific (CP) Railway have mandatory training and communication that must be completed before work commences in their Right of Ways. It is the contractor or the self-employed person's responsibility to ensure that they meet or exceed any standards set by CN or CP.

It is the prime contractor's and/or the owners responsibility to observe and enforce construction safety measures required by Canadian Construction Safety Code, Provincial Government, Worker's Compensation Board and municipal statutes and authorities. In the event of conflict between any provisions of above authorities, the most stringent provision will apply.

End of Specification 01030