

Phone 780-449-9651

# Fire Safety Plan Guide

The National Fire Code requires that a Fire Safety Plan be created and implemented for your building or business. It is the responsibility of the building owner or occupant to ensure that the information contained within the Fire Safety Plan is accurate and complete.

This Guide is to be used to assist you with building an appropriate and site-specific Fire Safety Plan, as presented in our Fire Safety Plan template. We encourage you to use both the Fire Safety Plan and the Fire Safety Plan Guide to train your fire wardens and other staff.

Your Fire Safety Plan must be current and readily available at all times for use by staff and the responding fire department.

The Fire Safety Plan template has three sections:

# **Part A: Critical Response Information**

This section contains important information for fire crews on arrival, and a copy should be located near your main entrance or adjacent to your fire alarm/annunciator panel, if you have one. A Fire Safety Plan box can be purchased and mounted to store it.

It is important that any changes required to the information be made as soon as possible, and all displayed and distributed copies be updated.

### **Part B: Emergency Procedures**

This section contains important information on fire safety requirements and emergency procedures for building owners and occupants. Use it as a guide to create your safety plan. You must include any hazards particular to your location and assign specific roles and duties to your staff to perform in an emergency. Detail the evacuation procedures for your location, muster points, fire drills, and ongoing staff training. We recommend the plan you create uses terms and titles that your staff or occupants would be familiar with.

The finalized plan must be posted in a location that is highly visible to site and building occupants. We have provided sample posters with general fire safety information, which you may display if desired.

### **Part C: Maintenance Requirements**

This section contains an outline of the maintenance mandated by the National Fire Code for fire and life safety systems.

A copy of your Fire Safety Plan should be submitted to Strathcona County Emergency Services, Fire Prevention for review, via email to <a href="mailto:fireprevention@strathcona.ca">fireprevention@strathcona.ca</a>. A Safety Codes Officer is available to answer questions and provide guidance.



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# **Part A: Critical Response Information**

# 1. Emergency Contact Information

Include all personnel to be contacted in case of emergency and 24-hour contact phone numbers. The person(s) you want contacted first should be at the top of the list.

### 2. Site Plan

Insert a site plan of your site. This could be a drawing, sketch or Google Map photo. Include and label all buildings, access routes and muster points as appropriate. Use the *schematics legend* to place applicable icons on diagram.

# 3. Building Floor Plan

Insert a floor plan of your building. This could be a drawing/sketch. Use the *schematics legend* to place applicable icons on the diagram as appropriate. Copy this page for multiple buildings if needed. Indicate location of lockbox (s), fire protection equipment, fire extinguishers and evacuation routes. Use the schematics below to mark the locations of utilities and life safety elements as appropriate.

# Schematics Legend

X	Kitchen fire suppression pull pin	W	Main water shut off
	Entrance/exit	ABC	ABC type fire extinguisher
	Hydrant	Н	Hose cabinet
GEN	Emergency power generator	(D)	Sprinkler riser, (D) if dry system
FDC	Fire department connection	HAZ	Hazardous materials
FACP	Fire alarm control panel	ROOF	Roof access
FAA	Fire alarm annunciator	ELEC	Electrical panel
	Pull station	SCR	Sprinkler control room
⋈ s	Sprinkler isolation valve	MR	Mechanical room
<b>⋈</b> P	Main power shut off	ER	Electrical room
⋈ e	Natural gas shut off	ELMR	Elevator machine room



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# 4. Building/Business Information

This section details information on your business and the building it occupies.

### Building

Note the location of your Key Lock Box(es). Your Lock Box should include keys to the fire alarm/annunciator panel, mechanical rooms, sprinkler control room, elevator control key, locked stairway doors and roof access. All keys should be accurately labelled.

### Utilities

Provides information in conjunction with your site and floor plan to locate utilities mains.

### Fire Alarm Systems

Provides information in conjunction with your site and floor plan to locate alarm panels.

### Sprinkler Systems

Provides information on your sprinkler system, if you have one installed.

### Other Extinguisher Systems

Provides information about other fire extinguishment measures or systems you may have.

### Roof Access, Standpipe System, Fire Department Connections, Fire Pump

Complete the required information in these sections if applicable to your location. Otherwise, indicate "No" in the heading's checkbox.

### Fixed Extinguishing System for Commercial Cooking

If your business includes a commercial cooking operation, please complete this section.

### **Emergency Power**

If your business has a contingency for emergency power, please complete this section.

### Elevators

If there are elevators on your premises, please complete this section.

### **5. Occupants That May Require Assistance During Evacuation (if applicable)**

List the name and expected location of occupants requiring assistance to evacuate.

# 6. Dangerous Goods (if applicable)

Include a list of materials, quantity and location of all Dangerous Goods as well as the location of their Safety Data Sheets.



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# **Part B: Emergency Procedures**

The building owner/occupant has numerous responsibilities related to fire safety. Using the information below as a guide, create a detailed and site-specific list of procedures and responsibilities for occupants and staff to ensure emergency preparedness. Review this section of your fire safety plan with staff often to ensure everyone knows the activities they are responsible for.

Emergency Procedures and Fire Safety Information posters are included in Part B of the Fire Safety Plan template. Feel free to customize these posters for use at your place of business.

# 1. Responsibilities of the Owner/Occupant

The building owner/occupant must ensure that the following measures have been put in place:

- Establish emergency procedures that shall be followed at the time of an emergency.
- The appointment, documentation, and training of designated fire wardens/supervisory staff to carry out safety duties as determined by this Fire Safety Plan.
- Annually review the responsibilities and duties for all fire wardens and supervisory staff so that they are aware of their duties in an emergency situation.
- The holding of fire drills as required and in accordance with the Fire Code, or as determined based on the occupancy, hazards, and safety equipment.
- Have a working knowledge of the building fire and life safety systems. Ensure that the
  systems are in operating condition at all times and that all applicable codes and regulations
  for the required maintenance and maintenance inspection/tests are being adhered to.
- Ensure that the initial verification or test reports for fire protection systems are retained throughout the life of the fire protection systems.
- Ensure that the information in the Fire Safety Plan is current. Review the Fire Safety Plan a minimum of once every 12 months.
- Post a copy of the Fire Safety Plan (Parts A and B only) in at least one visible and accessible location.
- Ensure that all signage as required inside/outside the building is posted and maintained. (i.e. designated fire route, identification of room names and fire protection equipment, etc.).
- Ensure that the Fire Department lock box, if required, contains current keys and/or access cards required by the Fire Department.
- Comply with the most recent Fire Code.

### Fire Protection System Shutdown Measures

When a fire protection system is out of service for more than 2 hours, you must:

- Notify your fire alarm monitoring company.
- Notify Strathcona County Emergency Services at 780-464-8465.
  - Supply your company's name, address, a description of the issue and when you expect it to be corrected.



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- Notify occupants and post instructions with alternative procedures in case of emergency. This
  may include fire watch, bull-horns, portable radios, or PA systems.
- Ensure staff and occupants know how to proceed with an alternate solution should your site's main fire protection system(s) (if applicable) become impaired.
- When repairs are complete and systems are fully operational, notify the building occupants and Strathcona County Emergency Services.

# 2. Emergency Procedures for Fire Wardens and Supervisory Staff

### Key duties:

- Promoting the awareness to other people about the different fire hazards that may occur in your building
- Instructing the people on how to deal with any emergency
- Leading fire drills and evacuation training
- Be knowledgeable in using fire safety equipment in your area and the location of the pull stations
- Knowing all the evacuation routes and exits from the designated area

### Upon Hearing of a Fire

- Ensure that 9-1-1 has been called. If you are the 9-1-1 caller, be prepared to supply the civic address, building/unit number and other relevant information.
- Ensure that the other occupants have been notified of the emergency.
- If it is safe to do so, supervise the evacuation of all occupants.
- Ensure that all evacuated persons are located away from the building/business and away from Fire Department access routes, Fire Department Connections and fire hydrants.
- Restrict access to the building/business so that no person(s) can enter or re-enter until the Fire Department has given permission.
- Upon the arrival of the emergency crews, inform a member of the fire response crew regarding conditions in the building and follow the instructions of emergency personnel.
- Provide access and vital information as to location of persons, master keys, location of the Fire Safety Plan, hazardous materials, and utility shut offs.
- Ensure occupants remain outside the building until advised by the Fire Department that it is safe to return.
- Arrange for a trained substitute fire warden in your absence.



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### 3. Fire Drills

Fire drills are to be held at least every 12 months by Fire Warden/Supervisor Staff, except that:

- Day cares, care facilities, hospitals, and group homes shall hold drills every month.
- Schools shall hold 3 drills in the Fall and 3 drills in the Spring.

### Fire Drill Records

A record of fire drills is to be maintained on site, for a minimum of 2 years and be available for view by Strathcona County Emergency Services. The fire drill records should indicate the following:

- Date and time of the fire drill.
- Total evacuation time.
- Comments and/or recommendations.

### 4. Control of Fire Hazards

Fire safety recommendations, general and specific. Review this section with staff and occupants and ensure they are familiar with general fire safety and can identify and mitigate fire hazards specific to your site.

- Dispose of all smoking materials appropriately.
- Avoid unsafe cooking practices: deep fat frying, too much heat, unattended stoves, loosely hanging sleeves.
- Keep the doors in fire separations closed at all times.
- Keep exits and the access to exits, both inside and outside, clear of any obstructions or snow/ice at all times.
- Never leave anything that may burn or cause a trip hazard in the halls, corridors and/or stairways.
- Always clean out clothes dryer lint collector before and after use.
- Do not use unsafe electrical appliances or overloaded outlets; do not use extension cords or lamp wire for permanent wiring.
- Do not permit combustible materials to accumulate in quantities or locations that would constitute a fire hazard.
- Promptly remove all combustible waste from areas where other waste is placed for disposal, if possible.
- Keep access roadways, fire routes and Fire Department Connections clear and accessible at all times.



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# **Part C: Fire Safety Maintenance Requirements**

To assist you in fulfilling your obligations, included is a list of the fire and life safety components in the Fire Code that require checks, tests and inspections. During their fire inspections, Safety Codes Officers check to ensure that these necessary tasks are being done.

Fire Code states that records of all mandatory tests and corrective measures, including those performed by qualified technicians, shall be retained on site for a minimum of two (2) years.

### Definitions for key words are as follows:

**Check** means visual observation to ensure the device or system is in place and is

not obviously damaged or obstructed.

**Test** means the operation of a device or system to ensure that it will perform in

accordance with its intended operation or function.

**Inspect** means physical examination to determine that the device or system will

apparently perform in accordance with its intended function.

# 1. Fire Protection Systems/Fire Separation

### Weekly

• Check hoods, filters and ducts for combustible deposits, and clean if necessary.

### Monthly

• Inspect doors in fire separations for proper operation. The self-closing devices must allow for the door to positively latch. Ensure that there are no door stops.

#### Annually

- Test fire rated roll shutters, fire dampers and fire-stop flaps.
- Inspect chimneys, flues and flue pipes and clean as often as necessary to keep them free from accumulations of combustible deposits.
- Test disconnect switches for mechanical air-conditioning and ventilating systems.
- Inspect and clean spark arresters to ensure accumulations of debris will not adversely affect operations. Repair or replace burnt-out arresters.

# 2. Portable Fire Extinguishers

### **Monthly**

- Ensure there is adequate clearance around the extinguisher.
- Check that the gauge indicator in the dial is in the green zone.
- Ensure the pin is in place and that the seal has not been tampered with.
- Ensure there is an inspection tag securely attached.
- Document the monthly inspection on the tag or on a separate spread sheet.

# **Annually**

Extinguishers shall be inspected by a qualified technician.



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### 3. Fire Alarms (CAN/ULC S536-13)

### **Daily**

 Check the fire alarm panel to ensure that the system indicates a "Normal" status. If not, take appropriate action.

### Monthly

- Check to ensure that the fire alarm panel and all fire alarm pull stations have unobstructed access.
- Check that the communication to the monitoring station is correct where applicable.
- Check and confirm the common audible and visual trouble signals.
- Test voice paging capability to one (1) zone on a rotational basis.
- Test one (1) emergency telephone on a rotational basis.

### **Annually**

Annual technician testing/servicing required.

# 4. Smoke Alarms (CAN/ULC S552-02)

- For dwelling units, including hotels and motels, all smoke alarms must be tested monthly to ensure they are in operating condition.
- For Apartment buildings, the smoke alarms must be inspected, cleaned and tested prior to a new occupant taking possession. Upon occupancy, ALL occupants must be provided with information on maintaining and testing the smoke alarms.
- It is recommended that smoke alarm batteries be replaced two (2) times a year.
- Replace smoke alarms a minimum of every ten (10) years or more frequently if recommended by the smoke alarm manufacturer.

### 5. Carbon Monoxide Alarms

Follow all manufacturer's instructions for mounting, maintaining, and replacement.

# **6. Standpipe Systems and Hose Systems** (NFPA 25 - Chapter 6)

Standpipe hose is to be re-racked after any use.

### Monthly

- Inspect hose cabinets to ensure that the hose and equipment are in the proper position and appear to be operable.
- Check gauges for good condition and normal water supply pressure.
- Check caps are in place on Fire Department Connections. If missing, examine the Fire Department Connection for obstructions, back flush if necessary and replace the caps.

### Annually

• Annual technician testing/servicing required.



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# **7. Sprinkler Systems** (NFPA 25, Section 13)

- In cold weather, inspect auxiliary drains as required to prevent freezing.
- Test the main drain any time the control valve is closed and reopened at system riser.

### Weekly

- Except for electrically supervised valves (which are to be checked monthly), check all valves controlling water supplies to sprinklers and alarm connections to ensure they:
  - o are free from external leaks and are accessible and locked in the open position
  - o have applicable identification and correct wrenches.

### <u>Monthly</u>

- Check alarm valves and system riser check valves externally to verify:
  - o the gauges indicate they have normal supply water pressure
  - they are free of physical damage
  - they are in appropriate open or closed position
  - o the retarding chamber or alarm drains are not leaking.

### Quarterly

- Test mechanical water flow devices including water gongs.
- Inspect water-flow alarm and supervisory signal initiating devices to ensure that they are free from mechanical damage.
- Test the main drain of at least one system downstream of a device that has the sole water supply through a backflow preventer and/or pressure reducing valves.

### Semi-annually

- Test vane and pressure switch-type devices.
- Test gate-valve supervisory switches and other sprinkler system supervisory devices.

### **Annually**

Annual technician testing/servicing required.

# 8. Sprinkler Systems - Dry, pre-action and deluge (NFPA 25, Section 13)

• Auxiliary drains, dry-pipe valve rooms or enclosures in unheated buildings shall be inspected as required to prevent freezing.

### Weekly

- Except for electrically supervised valves, check all valves controlling water supplies to sprinklers and alarm connections to ensure they are locked in the open position.
- Gauges on dry and pre-action systems are to be checked to ensure that the normal air or nitrogen and water pressures are being maintained.

#### Monthly

 On deluge systems, inspect the gauges to ensure good working condition and that normal water supply pressure is being maintained.



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- Inspect the waterflow and supervisory signal initiating devices to ensure that they are free of physical damage.
- Check that the hydraulic design information sign is securely attached and is legible.

### Semi-Annually

Test vane-type and pressure switch-type waterflow alarm devices.

### <u>Annually</u>

Annual technician testing/servicing required.

# **9. Water Supplies for Firefighting - Fire Pumps** (NFPA 25, Chapter 8)

- Maintain the system as per manufacturer's requirements.
- The temperature of pump rooms shall be checked daily during freezing weather.
- Maintain records of all maintenance and testing.

#### Weekly

- Visually check the pump system assembly to ensure that it is in operating condition and is free from physical damage.
- Test the fire pump assemblies without flowing water. This test shall be conducted by starting the pump automatically. An electric pump is to run for a minimum of 10 minutes and a diesel for a minimum of 30 minutes.
- Inspect valves controlling water supplies exclusively for fire protection systems to ensure that they are fully open and sealed or locked in that position.
- Check fuel and oil level, and water level in reservoirs.
- Start fire pumps at the rated speed. Inspect the fire pump discharge pressure, suction pressure, lubricating oil level, operative condition of relief valves, priming water level and general operating condition.
- Internal combustion engine fire pumps shall be run for sufficient time to bring the engine up to normal operating temperature. Storage batteries, lubrication systems and fuel levels/supplies shall be inspected.

#### Annually

Annual technician testing/servicing required.

# **10.** Water Supplies for Firefighting - Water Tanks (NFPA 25, Chapter 9)

#### Weekly

- Check water levels and air pressure in tanks.
- Inspect the relief valves on the air and the water lines.
- Inspect the heating system and temperature alarms (during cold weather) if not connected to a constantly attended location.

### **Monthly**

Check the air pressure in tanks that do not have the pressure source supervised.



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### <u>Annually</u>

- Inspect water tanks for fire protection, tank supporting structures and water supply systems including piping, control valves, check valves, heating systems, mercury gauges and expansion joints to ensure that they are in operating condition.
- Inspect cathodic protection equipment in water tanks.
- Test all automatic tank fill valves.
- The exposed surfaces of an Embankment-Supported Coated Fabric Suction Tank shall be cleaned and painted every two (2) years.
- Inspect the interior of steel tanks without corrosion protection every three (3) years.
- Inspect the interior of all other tanks every five (5) years.
- Test pressure gauges every five (5) years. Gauges not accurate to within 3% of the scale shall be recalibrated or replaced.
- Test level indicators for accuracy and freedom of movement every five (5) years.

# **11.** Commercial Cooking (NFPA 96)

### Kitchen Exhaust Systems

- Commercial kitchen exhaust systems must be inspected for grease build up and cleaned by a qualified technician, acceptable to SCES, according to the following schedule or as required by use:
  - Monthly Solid fuel cooking operations
  - Quarterly High volume operations, i.e., 24 hour, charbroiling, or wok cooking
  - Semi Annually Moderate volume cooking operations
  - Annually Low volume cooking operations such as churches, day camps, seasonal businesses or senior centres.
- Remove grease filters from the exhaust hood and clean at least once per week.

### Kitchen Suppression Systems

- Ensure a K-class portable fire extinguisher is provided to protect commercial cooking equipment.
- Ensure caps are on all suppression nozzles daily. Clean the exterior of the nozzles at the same time as the grease filters are removed, or more often as required.
- Have a qualified technician inspect the system once every 6 months.

# 12. Emergency Lighting Systems/Exit Signs

### Monthly

- Test emergency lighting to ensure it will function if the primary power supply fails.
- Test emergency lighting to ensure that it will properly illuminate egress paths.
- Inspect exit signs to ensure they are illuminated on primary power.



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- Test exit signs to ensure that they are illuminated on backup power (battery or generator)
  when the power is off.
- Maintain documentation of all inspections and tests.

### **Annually**

- Test emergency lighting to ensure it meets design specifications for operation duration under simulated power failure conditions.
- Test the emergency lighting charging conditions for voltage, current and recovery period to ensure that the charging system meets manufacturer's specifications.
- Maintain documentation of all inspections and tests.

# **13.** Emergency Power Systems (CAN/SCA C282-09 and NFPA 110)

Emergency power systems shall be maintained according to the manufacturer's instructions.

### Weekly

- Check all components for cleanliness and wear.
- Ensure room is kept above 10 degrees Celsius.

### Monthly

- Simulate a failure of the normal electrical supply.
- Run the generator for 60 minutes at a 30% load.
- Inspect block heater, hoses and wires. Correct any defects found.

### Semi-Annually

- Perform required maintenance as per manufacturer's specifications.
- Perform two full cranking cycle tests.

### <u>Annually</u>

- Perform required maintenance as per manufacturer's specifications.
- Run the generator for 2 hours at full load.

# **14. Private Hydrants** (NFPA 25, Chapter 7)

Hydrants shall be unobstructed and readily available for use at all times.

#### Annually

- Hydrants must be serviced annually by Strathcona County Utilities department, or a qualified technician.
- Visually inspect the hydrant for deficiencies, obstructions, cracks and stability.
- Check for leaks in outlets or at top of the hydrant.