

Township of Southgate

Community Risk Assessment



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Introduction

This assessment has been completed in accordance with the Office of the Fire Marshal and Emergency Management, Regulation 378/18. This regulation “Community Risk Assessments” is a regulation under the Fire Protection and Prevention Act, 1997. Every municipality, and every fire department in a territory without municipal organization had to complete the mandatory risk assessment by July 1, 2024, to be in compliance. The purpose of the community risk assessment (CRA) is to act as a roadmap for fire departments and Councils to make informed decisions based off data about the types and levels of fire protection services, that will be provided based on identified risk.

Each municipality is required to review the CRA no later than 12 months after it is completed and 12 months after it has been reviewed lapsed. The CRA must be redone every five years or revised if any significant changes are made in the mandatory profiles, or if any other significant matters arise from the review.

As per OFMEM-TG-02-2019 risk is defined as a measure of the probability and consequences of an adverse effect to health, property, organization, environment, or community as a result of an event, activity or operation.

Identifying all fire and life safety risks within the community and prioritizing them based on probability of occurrence and the impact if the risk occurred will provide a basis for a plan. The plan will identify and suggest how to avoid the risk, mitigate the risk, accept the risk or transfer the risk. This assessment will also identify hazards which currently do not have a plan, to be addressed in the future.

Options for treating risks in this assessment and what they mean are:

Avoid the Risk – *implementation of programs to prevent fires or emergencies from occurring.*

Mitigate the Risk – *programs and initiatives implemented to reduce the probability and/or consequences of a fire or emergency.*

Accept the Risk – after identifying and prioritizing a risk, it is determined that there are no specific programs or initiatives to be implemented to address the risk.

Transfer the Risk – the Fire Department has chosen to transfer the impact and/or management of the risk to another organization or body or outside agency.

The CRA is comprised of 9 nine mandatory profiles that include:

1. Geographic profile
2. Building Stock profile
3. Critical infrastructure profile
4. Demographic profile
5. Hazard profile
6. Public safety response profile
7. Community services profile
8. Economic profile
9. Past loss and event history profile

Due to the sensitive information collected within each of the nine profiles this report will provide a summary of each profile.

Geographic Profile Summary

The geographic profile examines the physical features of a community that impact the risk of and response to fire and other emergencies. Southgate four top risks and concerns are:

Body of Water

Southgate has several bodies of water consisting of streams, rivers, ponds, quarries, and lakes. Wilders Lake and the Holstein Dam are two examples of bodies of water open to the public where you may find human powered watercraft. Currently the Fire Department accepts the risk by implementing water/ice rescue training protocols and SOGs. Two of the three Fire Departments servicing Southgate offer shore based water/ice rescue one of them being the Dundalk Fire Department. With the new requirements of technical rescue and the requirement of mandatory certification Southgate may need to consider transferring the risk of water rescues in the future.

Bridges

The municipality has over one hundred bridges/culverts as reported by the Township of Southgate Public Works Department. The Fire Department accepts this risk by implementing appropriate response protocols, SOG's and actively communicating with Southgate's Public Works Department to preplan for any construction work which may delay responses. Southgate will continue to work with its neighboring Fire Departments to assess response times due to construction and modify its response areas to provide the fastest response to its residents.

Roadways

There are several high traffic roadways which travel through or near Southgate. Southgate is surrounded on three sides by MTO roads which include Highway 6, Highway 10 and Highway 89. Main arterial County roads in Southgate are Grey Road 8, Grey Road 9, Grey Road 14, Grey Road 23 and Grey Road 109 all of which see a large volume of traffic each day. The Fire Department accepts the risk by implementing appropriate response protocols, SOGs, purchase of specialized equipment and actively train to continue to provide auto extrication at the operations level. As more development and industry comes to the community the department may be required in the future to train and certify to the technician level which will be evaluated on a yearly basis, using data from the previous year. The department will work with MTO, County of Grey Transportation Department and Southgate Public Works Department to cut down fire apparatus on scene times by working collaboratively to have the respected organization dispatch workers to close the road vs leaving apparatus on scene for several hours to do so.

Town Roads

Several urban streets and newly developed streets (which have not been assumed) within Southgate has parking on both sides which may restrict fire apparatus responding to emergencies due to the width of fire apparatus. This risk will be mitigated by working with Southgate's Public Works Department to ensure appropriate clearance for fire apparatus are maintained and regulate one sided parking when required. The department will engage in public education campaigns regarding clearance levels for fire apparatus and keeping fire hydrants clear from vehicle traffic.

Building Stock Profile

The building stock profile consisted of identifying how many buildings of each occupancy exist in the Township of Southgate in accordance with the Ontario Building Code Major Occupancy classifications. Classifications used are:

Group A – Assembly Occupancy

Group B – Care, Treatment or Detention Occupancy

Group C – Residential Occupancy

Group D – Business and Personal Services Occupancy

Group E – Mercantile Occupancy

Group F – Industrial Occupancy

Other – Occupancies not classified in OBC such as Farm Buildings.

The Fire Department plans to mitigate the risk for Occupancies from Group A – Group F through public education programs directed at each type of occupancy. Ensuring buildings are in compliance with the Ontario Fire Code by completing

regular inspections in accordance with Southgate's Establishing and Regulating Bylaw Dundalk Fire Department Bylaw of Group A, D, E and F Occupancies. The department will continue to complete inspections of Group C occupancies by request and complaints only. The Fire Department will continue to work alongside the building department to identify and act upon change of use buildings without permits as this puts firefighters and community members in danger.

The Fire Department's treatment option for *Other* occupancies is avoiding the risk. During the CRA there were 785+ properties with farm buildings located on them. 298 properties located within Southgate had a grain bin or silo located on it. In the event of an emergency, these buildings may require specialized training of high angle rescue and confined space rescue. The definition of a "confined space" means a fully or partially enclosed space, (a) that is not both designed and constructed for continuous human occupancy, and (b) in which atmospheric hazards may occur because of its construction, location or contents or because of work that is done in it.

The department plans on implementing public education programs regarding farm safety. While public education programs may assist in preventing accidents the department will look into engaging in conversations with any available confined space rescue providers due to the large amount of confined space rescue potential within the Township. Staff will review and assess if the department should be providing confined space rescue service due to the large amount of potential and the lack of departments within an hour radius who offer this service. Staff will be engaging in conversations for high angle technical rescue providers in the event of an emergency.

One factor that will be considered when determining if the department will offer confined space rescue is the potential availability and cost savings for other specialized rescue services. Once a department offers a specialized rescue service it may be included into the mutual aid agreement in exchange for other specialized rescue services. By exchanging services, not one single municipality must bear the expense of training and specialized equipment for all disciplines of technical rescue. Municipalities without technical rescue abilities will in the event of an emergency have to purchase these services from a private contractor or another Fire Department as it is not a reciprocal service and will not be accessible to them via mutual aid.

Critical Infrastructure Profile

A community's critical infrastructure refers to the systems, facilities and assets that are vital for the functioning of society and the economy which includes electricity distribution, water distribution, telecommunications, hospitals, airports, banks, emergency services and more.

Critical infrastructure is identified and addressed within the Township's Southgate's Emergency Plan. Due to security reasons this report will not get into

depth about critical infrastructure. The Township will accept the risk with majority of its infrastructure due to it being outside of the Townships control. The department will continue to train its members on the Township of Southgate's Emergency Plan to respond to incidents involving critical infrastructure, purchase equipment needed, preplan for events and enter into agreements when needed for continuity of operations.

Demographic Profile

The CRA examines demographics in two profiles. The first profile includes age, gender, and language of Southgate residents. The second profile requires residents to be placed into demographic groups based off the answers from the first profile. Each demographic group then is examined for any emergency issues/concerns relating to each demographic group which may affect the Fire Department.

Large Population Increase

The Township has seen a large population increase predominantly on the East side of the Township. Population effects emergency response call numbers but also the level of service the community is expecting from the Fire Department. The Township and department will accept this risk by ensuring the Fire Departments certification and training aligns with the municipalities current and future fire protection requirements and resources. The current staffing level is able to accommodate an increase in call volume during the evening hours and weekends. Staff will continue to monitor daytime call staffing levels as this will be the main concern due to the lack of employment opportunities in the community. Majority of the volunteer firefighters must travel out of town for employment during the day which reduces the number of available firefighters to respond. The addition of Eco Park may help with daytime responders. The department is looking into a business recognition program to properly thank employers within our Township who allow workers to respond to calls during the working day.

With large population increase comes different cultures and languages. Staff will be exploring offering public education material in multiple different languages moving forward so everyone can receive the same safety messages. In the past public education information has predominantly been offered in English.

Mennonite Community

Southgate has a large community of Mennonites. The Dundalk Fire Department has a good working relationship with this demographic. The Mennonite community has limited technology within their homes and limited access to social media. The Dundalk Fire Department will continue to provide public education through the schools to this group. Staff are actively looking into other opportunities to engage with this demographic through churches and workplaces during inspections, for those reason the risk treatment option is mitigate the risk.

Large Working Age Population

The majority of Southgate's population falls within the ages of 15 to 64 years of age. This is known as the "working age population." As per stats Canada the majority of this population must travel for work which increases traffic on the road network and increasing the probability of motor vehicle accidents. This population group also tends to have more technology in their homes including the presence of lithium-ion battery devices. Lithium-ion batteries are a growing area of concern for all fire services due to the fire risks they pose. The Fire Department will promote lithium battery public education as part of its plan to mitigate the risk.

Visitors

During the summer months there is a large number of visitors that travel through the municipality utilizing the road network system through Southgate. This increases traffic on the road network which increases the probability of motor vehicle accidents. It is hard to get public education messages across to visitors that are passing through Southgate directly and not staying. Due to this the Fire Department will accept the risk. Staff will monitor any high call volume areas and engage with community partners including OPP to address these situations.

Hazard Profile

The hazard profile looks at potential hazards in a community including natural and man-made hazards. This is a reflection of the Township of Southgate's Emergency plans hazard identification and risk assessment (HIRA).

Fire/Explosion

Fires and explosions are a risk that every municipality has. The Fire Department will avoid and mitigate the risk by utilizing the three lines of defense, public education, prevention and then suppression. Staff will continue to look for public education opportunities through schools, events, social media. Staff will continue with the adopt a classroom program which has been well received and look to utilize the Saugeen Valley Safety Village more throughout the year. Through fire inspections the department will educate and enforce the Ontario Fire Code which brings buildings into compliance. The Fire Code may make the building safe but human behavior can not be accounted for. Finally, after suppression the department investigates every fire. Fire investigations help to plan public education when trends are seen of a certain type of fire.

Weather Events

These events include tornados, flooding, winter weather, ice storms or similar events. The department will accept the risk as these events can not be avoided. The department will work with the emergency management control group to establish pre plans for events that the department may have to respond to.

Infectious Disease

In 2019 the Township experienced the Covid-19 pandemic which was an infectious disease. As much as diseases can be slowed down, they can never be eliminated

especially by the Fire Department or Township. For these reasons, this risk is accepted. Staff will ensure that the Township Health and Safety policies and procedures are updated, and a contingency plan is in place in the event that staff's ability to report to work is affected.

Oil and Natural Gas

The Fire Department has not experienced many oil and natural gas events in the past. The department plans on avoiding risk of these events by ensuring safe storage and usage practices are in place when completed fire inspections. The department will develop and review pre-plans for each high-risk location. Staff will engage with the transportation Canada and shipping companies to request communication when large quantities of oil and natural gas are being transported through the Township.

Public Safety Response Profile

The public safety response profile examines at other public response agencies that might be tasked with or able to assist in the response to emergencies or in mitigating the impact of emergencies. It considers the types of incidents each agency is able to respond to and any issue or concerns that may impact fire department response.

Outside Fire Services

Due to the Dundalk Fire Department being located on the eastern part of the Township, the Township of Southgate has entered into fire protection agreements with both Wellington North Fire Services and West Grey Fire Services. The Dundalk Fire Department transfers the risk to these other departments when looking at risk. The Township will need to ensure that when mandatory certification is enacted on July 1st, 2026, that the level of certification of these departments match the level of service agreed upon and purchased. Staff will continue to review data of responses on an annual basis to ensure the best service is being provided to the ratepayers of Southgate.

Technical Rescue

Dundalk Fire Department currently offers technical rescue services to the following levels:

Water rescue – Shore based only

Motor vehicle collisions – Operations level

Hazardous material – Awareness level

Other – Drone operations.

The department plans on avoiding and mitigating the risk of technical rescues by providing public education to reduce any calls related to high angle, confine space and water rescues. It should be noted that in 2028 new standards apply to technical rescue requiring mandatory certification of each technical rescue offered. The department plans on engaging and entering into agreements with fire services who cover technical rescue disciplines at the technician level.

Dundalk Fire Department

The Dundalk Fire Department relies on volunteers to be available for responses. Typically, there is limited availability of personnel to respond Monday – Friday from 8am – 5pm. Due to lack of industry with Dundalk many firefighters work outside of town. In addition, personal lives are busier, and firefighters are not always available when not at work, therefore, availability of firefighters has diminished. The department should attempt to focus recruitment on staff who are available during the day. Even though this does not guarantee the firefighter will respond. Staff should investigate an employer recognition program for employing volunteer firefighters and allowing them to respond.

The department should continue with certification of NFPA 1001 Firefighter level I and II as well as NFPA 1072 Hazardous Materials Awareness and Operations. Staff will look for opportunities to increase the certification process for other roles within the Fire Department.

Staff will continue to monitor response timelines and staffing on an ongoing basis and will strive to meet NFPA requirements. Service agreements will be checked to ensure they are up to date, accurate and effecting for the municipality. The risk level assigned to the Dundalk Fire Department is avoid and mitigate risk.

Ontario Provincial Police

The Ontario Provincial Police are contracted by the municipality as its police force. OPP respond to several of the same incidents as the Fire Department such as Motor vehicle accidents. The OPP in our region is a joint force of Grey and Bruce County. Due to the large area that OPP is responsible for covering and staffing shortages an issue Fire Departments face is the need to stay on scene for several hours to perform traffic control. While firefighters are tied up performing this service it removes them from service to respond to another call. The Fire Department will be transferring this risk. Staff will engage in conversations with the OPP to close roads due to motor vehicle accidents earlier or work together to perform traffic control and free up some fire apparatuses. Currently roads are not closed until a patient in a vehicle collision is transported to the hospital and is assessed in the hospital by doctors for life threatening or altering issues. Due to our location from hospitals and availability of doctors can sometimes take 30 mins – 2 hours. Staff will also engage with transportation departments regarding closing roads and timelines.

Grey County Paramedic Services

All of Grey County is serviced by its regional paramedic service. Each municipalities Fire Department has its own tiered response agreement with Grey County EMS which indicates the types of calls the Fire Department will respond to and including emergency calls where EMS is delayed longer than a specific amount of time. Staff will continue to monitor response/arrival times of paramedic services and communicate any concerns with the Grey County Paramedic Chief. The tiered response agreement should be reviewed periodically and changed accordingly to better serve the ratepayers. The department should promote and take advantage of

any joint training opportunities. Risk treatment assigned to Grey County Paramedic Services is avoid and mitigate.

Owen Sound Dispatch Services

The Dundalk Fire Department utilizes Owen Sound Police Services Dispatch as the their dispatch service as does majority of Grey and Bruce County. The department has transferred the dispatching risk to Owen Sound Police Services. The department should continue to ensure that dispatch meets NFPA 1061 (*Standard for Public Safety Telecommunications Personnel Professional Qualifications*) and NFPA 1221 (*Standard for the Installation, Maintenance, and Use of Emergency Services Communication Systems*)

OFMEM

The Fire Department transfers but also accepts the risk in relation to the OFMEM (Ontario Fire Marshal and Emergency Management). Currently under the Ontario Fire Protection and Prevention Act 1997. The assistants to the Fire Marshall shall report to the Fire Marshal all fires and other matters related to fire protection services as may be specified by the Fire Marshall. Communique 2023-1 Notification and fires and explosions released on February 17th 2023 states that only notifications involving a fatality, life threatening injury or explosion will be evaluated 24/7 all incidents will be evaluated from 7:30am – 9pm.

This new Communique has created more required time on scene for Fire Departments for scene security until it can be evaluated on if the OFMEM would like to send one of their own investigators out to investigate the fire. The department should look to transferring scene security to private companies to free up fire apparatus and personnel while waiting for return calls from the OFMEM.

Another option the Fire Department has done is investigate all its own fires with its own qualified investigator. This has reduced time on scenes and then only requires the OFMEM to have an investigator attend for fatality fires, life threatening injuries, explosions, or criminal cases. The department will continue to provide this service and investigate certifying more members and working with neighboring departments to create a pool of fire investigators.

Community Services Profile

This profile looks at community service agencies, organizations or associations that provide services that support the Fire Department in the delivery of public fire education, Fire Code inspection and enforcement and emergency response. This also looks at services in-kind, financial support, increased access to high-risk groups in the community, and temporary shelter for displaced residents following an incident.

Victim Housing

The Dundalk Fire Department will transfer the risk of shelter from a displaced individual due to a fire or emergency to Victim Services Grey Bruce. Staff will

engage will Victim Services to be able to gather all information required ahead of time that may be required to have a seamless response when needed.

Food

Locating food during emergencies can pose to be a problem in Rural Ontario. Depending on the time of day when the emergency happens especially in the late evening to over night hours everything may be closed. The Dundalk Fire Department will look to transfer this risk by entering into an agreement with Salvation Army Dufferin to supply food trucks for long duration emergencies. This food will be both for Dundalk Fire staff as well as other municipal staff and residents should the emergency last several days. The department will also look into local food truck style vendors as an option.

Economic Profile

When looking at the economic profile of the Township things to consider are the industrial or commercial sectors that provide significant economic production and jobs to the local economy and the impact to the community's economy if a fire or other emergency in occupancies housing those sectors.

Feed Mills

The Fire Department has assigned avoid and mitigate risk as the treatment option to feed mills. This will be achieved through inspections and public education. The department will engage with businesses to create thorough pre-plans including dispatching required resources earlier if an incident was to arise. The department has a verbal agreement in place with First Student Bus Line for evacuation buses if required which staff will look to formalize in a written agreement.

Warehousing

The risk treatment assigned to warehousing is accept the risk. The department will implement appropriate response protocols, SOG's, purchase required equipment and continue to train firefighters in industrial firefighting techniques. The Dundalk Fire Department will look into entering into an agreement for an aerial device to be available for these calls which has been completed by staff.

Non-Classified OBC Structures

This Fire Department will mitigate the risk through inspections and public education. Staff will implement appropriate response protocols, SOG's and purchase the required equipment for these structures. Staff will look into entering into agreements or evaluate the option to offer confined space rescues.

Past Loss and Event History

This profile looks at the Township of Southgate's past loss history over a three-year term due to fires and the building occupancies in which they occurred or other for vehicles and no loss outdoor fires. This profile also investigates the number of fire

calls received between all three departments over three years (2020-2022) and the types of responses associated with those calls.

Fires

The Dundalk Fire Department will avoid and mitigate risks of fires within the Township of Southgate. This will be achieved through public education. The department will focus on the lead contributors of the fires in the last three years which are, unattended cooking, heating equipment, older electrical, mechanical equipment and open flame tools/smoker's articles. In 2020 the Township of Southgate had 19 total reported fires. 2021 there was a total of 20 reported fires and in 2022 a total of 22 reported fires reported in the Township of Southgate.

Undetermined Causes for Fires

Fires are classified as undetermined when the investigator cannot determine a guaranteed source of ignition in the area of origin which can not be disputed. If there is even a small chance there may be another possible ignition source the fire investigator will need to re-examine to rule out all other possibilities or declare the scene undetermined. Undetermined has also been used in the past within fire services as a scape goat to not properly investigate fires due to lack of resources, skills, certified investigator, lack of time or just the unwillingness to investigate fires. The Dundalk Fire Department will look to avoid and mitigate this risk of simply labeling causes of fires as undetermined by ensuring the department continues to have trained fire investigators trained to the National Fire Protection Association Standard on Fire Cause Determination (NFPA 1033). The department will also implement agreements to ensure that all fires within Southgate including in areas covered by another Fire Department are investigated by a qualified individual to limit the amount of undetermined fire causes reported.

Conclusion

The Community Risk Assessment was a large project which staff undertook which took several months to complete. By completing this assessment in house, it has allowed staff to get a first-hand look at the building stock within the Township but also save thousands of dollars of expenses by not contracting the assessment out to a third party to complete.

The Township of Southgate's is in compliance with Ontario Regulation 378/18 as the Township's Community Risk Assessment was completed by July 1st 2024 and the Office of the Fire Marshall was notified that it was completed. Staff will continue to review this document annual and update as needed. When a new Community Risk Assessment is completed in the future due to the five-year time requirement or major changes in any one of the nine profiles are made staff will report back to Council.