

Subject: Idling Control By-law Review

File Number: ACS2024-EPS-PPD-0003

**Report to Joint Emergency Preparedness and Protective Services Committee and
Environment and Climate Change Committee on 19 September 2024
and Council 2 October 2024**

**Submitted on September 10, 2024 by Valérie Bietlot, Manager, Business and
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Ward: City wide

Objet : Examen du Règlement sur la marche au ralenti

Numéro de dossier : ACS2024-EPS-PPD-0003

**Rapport présenté au Comité des services de protection et de préparation aux
situations d'urgence et au Comité de l'environnement et du changement
climatique à leur réunion conjointe du 19 septembre 2024**

et au Conseil le 2 octobre 2024

**Déposé le 10 septembre 2024 par Valérie Bietlot, gestionnaire, Services de
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Quartier : À l'échelle de la ville

REPORT RECOMMENDATIONS

**That the Joint Emergency Preparedness and Protective Services Committee and
Environment and Climate Change Committee recommend Council:**

- 1. Approve the proposed Idling Control By-law as described in this report and in the general form set out in Document 1 and repeal the Idling Control By-law (By-law 2007-266); and,**
- 2. Repeal Section 16 of the Noise By-law (By-law 2017-255, as amended) pertaining to the regulation of noise for idling vehicles as described in this report.**

RECOMMANDATIONS DU RAPPORT

Que le Comité des services de protection et de préparation aux situations d'urgence et le Comité de l'environnement et du changement climatique recommandent au Conseil :

- 1. d'approuver le *Règlement sur la marche au ralenti* proposé décrit dans le présent rapport, tel qu'il figure dans le document 1 et d'abroger le *Règlement sur la marche au ralenti* (n° 2007-266); et**
- 2. d'abroger l'article 16 du *Règlement sur le bruit* (n° 2017-255, dans sa version modifiée) encadrant le bruit produit par les véhicules marchant au ralenti comme le décrit le présent rapport.**

EXECUTIVE SUMMARY

This report presents the results of the Idling Control By-law review and recommends a new and updated by-law to regulate unnecessary vehicle idling to reduce greenhouse gases and improve local air quality in Ottawa. The recommended by-law, attached as Document 1 and described in this report, will repeal and replace the current idling regulations found in By-law 2007-266. This by-law review forms part of the Council-approved 2023-2026 By-law Review Work Plan.

The staff recommendations include two key changes in policy to reduce vehicle idling overall. The first is a reduction in the maximum idling duration from three minutes to one minute in accordance with best practice from Natural Resources Canada and many Ontario municipalities. The second is the introduction of a five minute idling limit when it is colder than zero degrees Celsius or warmer than 27 degrees Celsius including Humidex. These recommendations will result in a decrease in the amount of unnecessary idling which reduces harmful emissions like carbon dioxide, a principal greenhouse gas, and criteria air contaminants harmful to the environment. Decreasing unnecessary idling aligns with the Climate Change Master Plan and the City of Ottawa's Term of Council Priority of a greener, more resilient City.

The recommended by-law includes limited and specific exemptions to the maximum idling time to recognize situations or vehicles for which idling is necessary beyond the maximum duration. For example, exemptions are included for mobile workshops where the vehicle requires power to operate work equipment; for persons with medical conditions for whom the vehicle temperature or humidity level must be maintained; and for first responders who are in an emergency or participating in required training but not where idling is solely for the convenience of the operator, among other exceptions. All the recommended exemptions have been reviewed to ensure they are operationally needed and justified, and where possible, the language in the regulation has been updated or modernized to ensure clarity. Specific exemptions are listed in Section 5 of Document 1 and described in the Discussion section of the report.

This report further recommends that the existing idling regulations in the Noise By-law (2017-255) be repealed so that all idling regulations are under the proposed new by-law to simplify enforcement and public understanding.

Assumption and Analysis

The current Idling Control By-law (2007-266) was reviewed in accordance with the direction from City Council ([ACS2022-OCC-ENV-0009](#)) to consider the maximum idling time limit, existing exemptions, clarity of definitions, and enforcement tools and practices, including fine amounts. The recommendations were developed in consideration of input from internal and public consultations alongside best practices as recommended by Natural Resources Canada and as adopted by other municipalities with similar climates to Ottawa.

Staff estimate that if every Ottawa driver of a light or medium duty internal combustion vehicle reduced daily idling by two minutes, it would result in approximately 31.2 million kilograms less carbon dioxide emitted over the course of a year, equivalent to removing 6,780 internal combustion vehicles from Ottawa roadways, as further described in the Discussion section of this report. Accompanying public education and awareness campaigns would further support these emission reductions.

Financial Implications

There are no financial implications associated with this report.

Public Consultation/Input

Staff consulted with the public between late January and mid-March 2024, where 1,045

respondents participated in a survey posted to Engage Ottawa that was promoted through various social media channels, with public service announcements, and with a media interview and distributed to community associations and environmental groups. Results demonstrated that the public views idling as an issue on both public and private property and that idling predominantly occurs to regulate the temperature of the engine or of the inside of the vehicle. Over half (51.6 per cent) of respondents agreed with a reduction in the maximum idling limit from three minutes to one minute. Most respondents agreed with most of the existing vehicle types and situations exempted from that limit. For the temperature exemption upper threshold, the highest percentage of respondents (42 per cent) agreed that idling should only be permitted for a brief period. For the lower threshold, the highest percentage of respondents (31 per cent) agreed with maintaining no maximum idling time limit, and a quarter of respondents agreed that idling should only be permitted for a brief period.

Various industries currently exempted from maximum idling limits were consulted to determine if these exemptions were still necessary, as further detailed in the Consultation section of the report.

RÉSUMÉ

Le présent rapport rend compte des résultats de l'examen du *Règlement sur la marche au ralenti* et recommande l'adoption d'un nouveau règlement pour encadrer la marche au ralenti inutile des véhicules en vue de réduire les gaz à effet de serre et d'améliorer la qualité de l'air à Ottawa. Le règlement recommandé, ci-joint en tant que document 1 et décrit dans le présent rapport, abrogera et remplacera les règles actuelles sur la marche au ralenti prévues dans le Règlement municipal 2007-266. Cet examen s'inscrit dans le cadre du Plan de travail de l'examen des règlements municipaux de 2023 à 2026 approuvé par le Conseil.

Les recommandations du personnel prévoient deux grands changements stratégiques pour réduire globalement la marche au ralenti des véhicules. Il recommande tout d'abord de réduire la période maximale de marche au ralenti de trois à une minute, conformément à la pratique exemplaire recommandée par Ressources naturelles Canada et adoptée par de nombreuses municipalités ontariennes. Il recommande ensuite d'instaurer une limite de cinq minutes quand il fait moins de 0 °C ou plus de 27 °C (indice humidex inclus). Ces recommandations raccourciront le temps passé inutilement en marche au ralenti, ce qui réduira les émissions nocives comme le dioxyde de carbone, un gaz à effet de serre important, et les principaux polluants atmosphériques dommageables pour l'environnement. La réduction de la marche au

ralenti inutile cadre avec le Plan directeur sur les changements climatiques et la priorité pour le mandat du Conseil de faire d'Ottawa une ville verte et résiliente.

Le règlement recommandé prévoit des exceptions restreintes et précises pour tenir compte des situations ou des véhicules nécessitant de faire marcher le moteur au ralenti au-delà de la limite établie. Par exemple, des exceptions sont prévues pour les véhicules-ateliers alimentant de l'équipement de travail, les personnes ayant des problèmes de santé nécessitant le maintien de la température ou du taux d'humidité du véhicule à un certain niveau et les premiers répondants engagés dans des opérations de secours ou suivant une formation obligatoire, sauf si on laisse tourner le moteur du véhicule uniquement pour des raisons de commodité. Toutes les exceptions recommandées ont été examinées pour vérifier qu'elles sont nécessaires et justifiées sur le plan opérationnel, et lorsque possible, le libellé du règlement a été mis à jour ou modernisé à des fins de clarification. Les exceptions sont données à l'article 5 du document 1 et décrites dans la section *Analyse* du rapport.

En outre, le présent rapport recommande d'abroger les règles sur la marche au ralenti dans le *Règlement sur le bruit* (n° 2017-255) pour regrouper toutes les règles à cet effet dans le nouveau règlement municipal proposé et ainsi simplifier l'application de celui-ci et faciliter la compréhension de la population.

Hypothèses et analyse

L'examen du *Règlement sur la marche au ralenti* (n° 2007-266) a été réalisé conformément à la directive du Conseil municipal ([ACS2022-OCC-ENV-0009](#)) demandant qu'on examine la période maximale de marche au ralenti, les exceptions, la clarté des définitions et les outils et pratiques d'application, y compris le montant des amendes. Les recommandations ont été formulées à la lumière des consultations internes et publiques et des pratiques exemplaires recommandées par Ressources naturelles Canada et adoptées par des municipalités ayant un climat semblable à celui d'Ottawa.

Le personnel estime que si chaque conducteur d'un véhicule à combustion interne léger ou moyen d'Ottawa réduisait son temps en marche au ralenti de deux minutes par jour, on produirait environ 31,2 millions de kilogrammes de dioxyde de carbone de moins par année, ce qui équivaldrait à retirer 6 780 véhicules à combustion interne des routes de la ville, comme il est décrit dans la section *Analyse* du présent rapport. L'instauration d'un programme et d'une campagne de sensibilisation engendrerait encore davantage de réductions.

Répercussions financières

Le présent rapport n'a aucune incidence financière.

Consultations et commentaires du public

Le personnel a consulté la population de la fin janvier à la mi-mars 2024. Au total, 1 045 personnes ont répondu à un sondage publié sur Participons Ottawa qui a été promu sur différents médias sociaux, par des messages d'intérêt public et lors d'une entrevue avec les médias et distribué à des associations communautaires et à des groupes environnementalistes. Les résultats montrent que la marche au ralenti est perçue par la population comme un problème sur les propriétés publiques et privées et sert surtout à réguler la température du moteur ou de l'habitacle du véhicule. Plus de la moitié (51,6 pour cent) des répondants étaient pour la réduction de la durée maximale de trois à une minute. La plupart étaient d'accord avec la majorité des exceptions actuelles pour certains types de véhicules et certaines situations. En ce qui concerne le seuil maximal de l'exception sur la température, 42 pour cent des participants (la proportion la plus élevée) convenaient que la marche au ralenti ne devrait être autorisée que pour une courte période. Quant au seuil inférieur, 31 pour cent (le pourcentage le plus élevé) souhaitaient qu'on ne crée pas de limite, et un quart estimait que la marche au ralenti ne devrait être autorisée que pour une courte période.

On a consulté différents secteurs actuellement exemptés des limites de marche au ralenti afin de déterminer si ces exceptions sont toujours pertinentes, comme il est expliqué plus en détail dans la section *Consultation* du rapport.

BACKGROUND

Legislative history

The *Municipal Act, 2001*, authorizes municipalities to create by-laws respecting environmental well-being and climate change. Prior to 2007, the City of Ottawa's vehicle idling regulations were addressed from a noise perspective and contained in the previous Noise By-law (2004-253). In May 2007, Council approved ([ACS2007-PTE-POL-0021](#)) the Idling Control By-law (2007-266) as a stand-alone by-law together with accompanying amendments to the Noise By-law (2004-253) to reduce the environmental impact of unnecessary vehicle idling.

In April 2019, Council declared a climate emergency ([ACS2019-CCS-ENV-0005](#)). Following that declaration, Council approved the Climate Change Master Plan

([ACS2019-PIE-EDP-0053](#)) in January 2020 which outlines emissions reduction targets for various sectors, including the transportation sector.

In May 2021, an inquiry ([EPWWM 02-21](#)) of the Environmental Protection, Water and Waste Management Committee regarding the effectiveness and enforceability of the Idling Control By-law (2007-266) resulted in a recommendation that this by-law be considered in the 2023-2026 Term of Council By-law Review Work Plan.

In February 2022, Council carried a motion ([Motion No. 69/8](#)) to amend the Idling Control By-law (2007-266) on a two-month basis to lower the minimum temperature threshold at which the by-law was in effect, in certain areas of the City, to address impacts from the 2022 convoy protest.

In July 2022, Council directed ([ACS2022-OCC-ENV-0009](#)) Public Policy Development Services to review the Idling Control By-law (2007-266) as part of the 2023-2026 By-law Review Work Plan, including consideration of the maximum idling time limit, exemptions, fine amounts, enforcement tools and practices, and applicable definitions.

Current regulatory landscape

Idling occurs when a vehicle's engine is running while the vehicle is stationary. The current Idling Control By-law (2007-266) restricts vehicle idling on all property within city limits to three consecutive minutes in a 60-minute period and exempts 12 vehicle types and situations where idling is considered necessary for the proper operation of a vehicle or for health and safety.

The City of Ottawa's idling regulations were first enacted to reduce harmful emissions that contribute to climate change and air pollution, including carbon dioxide, volatile organic compounds, nitrogen oxides, particulate matter, carbon monoxide and sulphur oxides. The public survey conducted during this by-law review indicates that approximately one quarter of respondents had previously or are currently experiencing health impacts due to poor air quality.

Respondents in the public survey conducted as part of this review indicated that they witness idling most often occurring at drive-throughs, near schools and daycares, and in driveways and on private property. Respondents also indicated that they idle most frequently to warm or cool their vehicle, or to warm their engine before driving.

Enforcement history

Enforcement of this by-law has been predominantly on a complaint basis. Between 2007 and the end of May 2024, there have been 4,617 service requests related to idling, averaging to approximately 270 requests per year. For the last five-and-a-half years (2019 to the end of May 2024), enforcement has resulted in a yearly average of 10 verbal warnings, seven by-law infraction notices, and 57 instances where there was no evidence of an offence when staff attended.

When the by-law was introduced, its intention was primarily as a public awareness tool around the harms associated with excessive, unnecessary idling, and enforcement outcomes have focused on education and warnings as opposed to the issuance of infractions.

Jurisdictional scan

This regulatory review included an analysis of how other municipalities regulate unnecessary vehicle idling. Idling by-laws, including Ottawa's, are typically established with a maximum idling duration that applies to all vehicles on all property within city limits, followed by exemptions for either vehicle types or situations where idling is deemed to be necessary beyond the maximum duration.

Most municipalities in Canada restrict vehicle idling to a maximum of one to several minutes in a 60-minute period. Like Ottawa's current regulations, Kitchener, Windsor, Hamilton, and Guelph permit idling to a maximum of three minutes. Many cities have adopted shorter idling time limits, with Toronto, Burlington, Kelowna, and Vancouver permitting idling for a maximum of one minute as recommended in this report. In May 2024, Kingston also adopted a maximum idling time limit of one minute. The borough of Outremont, Montreal, recently adopted a maximum idling time limit of 10 seconds in February 2024.

Idling by-laws typically contain exemptions to the maximum idling duration. In Ontario, most contain between eight and 14 exemptions. Although they vary across jurisdictions, the most common exemptions exist for emergency situations, for mobile workshops, armoured vehicles, motionless vehicles due to traffic, weather, or mechanical difficulties, and where applicable, for agricultural operations. Jurisdictional comparisons for various exemptions are further detailed in Table 1 below and in the Discussion section of this report.

Table 1: Current Idling Control By-law (2007-266) compared to other Ontario idling by-laws.

Regulation	Ottawa (current)	Toronto	Burlington	Kingston	Hamilton	London
Maximum idling duration	3 minutes	1 minute	1 minute	1 minute	3 minutes	2 minutes
Temperature thresholds	Yes	No	No	Yes	Yes	Yes
Exemptions	Ottawa (current)	Toronto	Burlington	Kingston	Hamilton	London
Medical letter	Yes	Yes	Yes	No	Yes	Yes
Assisting emergencies, emergency services	Yes	Yes	Yes	Yes	No	Yes
Public transit	Yes	Yes	No	Yes	Yes	Yes
Mobile workshop	Yes	Yes	Yes	Yes	Yes	Yes
Motionless vehicles	Yes	Yes	Yes	Yes	Yes	Yes
Council-authorized events	Yes	Yes	Yes	Yes	Yes	Yes
Private transit	Yes	Yes	No	Yes	Yes	Yes
Armoured vehicles	Yes	Yes	No	Yes	Yes	Yes
Normal farm practices	Yes	No	No	Yes	Yes	No
Service or repair	Yes	Yes	Yes	Yes	Yes	Yes
Vehicles that eliminate greenhouse gases	Yes	No	No	No	No	No

DISCUSSION

This report recommends a new, updated by-law to regulate unnecessary idling and to help reduce harmful emissions that contribute to climate change and air pollution. The new by-law will repeal and replace the City's current Idling Control By-law (2007-266).

Two key changes are proposed:

- a reduction in the maximum idling time limit from three minutes to one minute in a 60-minute period, and
- the introduction of a maximum idling time limit of one period of five consecutive minutes in a 60-minute period when the exterior temperature is colder than zero degrees Celsius or warmer than 27 degrees Celsius including Humidex.

Additional recommendations for adjustments to exemptions to the maximum idling times provide necessary updates but recognize that these exemptions are still valid and should be maintained.

Maximum idling time limit

The recommended new by-law, set out in Document 1, reduces the period of allowable idling from three minutes to one minute in a 60-minute period. By reducing the amount of time that idling is allowed, there is a proportional reduction in harmful emissions. For every minute that an average three-litre gasoline engine idles, Natural Resources Canada estimates that 69 grams of carbon dioxide are released into the atmosphere¹. Carbon dioxide is one of the principal greenhouse gas emissions contributing to climate change impacts.

Staff estimate that approximately 31.2 million kilograms of carbon dioxide would be removed from the atmosphere over the course of one year if every light and medium-duty internal combustion engine vehicle in Ottawa reduced its daily idling by two minutes, which is equivalent to removing approximately 6,780 vehicles from Ottawa roads. These calculations, further detailed in the Climate Implications section of this report, were estimated by proportionally adjusting the number of internal combustion engine vehicles registered in Ontario by the population of Ottawa and assuming that each internal combustion engine vehicle emits 4,600 kilograms of carbon dioxide a year².

¹ Natural Resources Canada. (2009, April). *Idling – Frequently Asked Questions*. Retrieved from <https://oee.mcan.gc.ca/transportation/idling/faqs.cfm>

² United States Environmental Protection Agency. (2023, August). *Greenhouse Gas Emissions from a Typical Passenger Vehicle*. Retrieved from <https://www.epa.gov/greenvehicles/greenhouse-gas-emissions-typical-passenger-vehicle>

When the Idling Control By-law (2007-266) was enacted in 2007, a maximum idling time of three minutes was consistent with most existing idling by-laws in Canada. However, in the intervening years, many municipalities have decreased their maximum idling duration to one minute, including Toronto, Burlington, and Kingston. At the time, three minutes was also thought to be required as a warm-up period to ensure proper engine function. However, modern vehicles do not require such a long idling duration at start-up, and it is suggested by Natural Resources Canada that the most efficient way to warm the engine is by driving it³.

Natural Resources Canada also recommends that a one-minute maximum idling duration is a break-even point between emissions reductions and an appropriate amount of time to warm-up your vehicle engine, and to offset costs associated with restarting the vehicle⁴. Reducing unnecessary idling is also a fuel-saving measure. When the public was consulted regarding an appropriate maximum idling duration with this rationale presented, a little over half of respondents (51.6 per cent) supported one minute. Approximately 44 per cent of respondents either supported maintaining a three-minute idling duration or selected that one minute was insufficient. The remaining approximately four per cent of respondents indicated they were unsure.

Recommendations for temperature limits and thresholds

The current Idling Control By-law (2007-266) includes an exemption from the maximum idling time limit for occupied vehicles in very hot or cold weather, specifically when the exterior temperature is lower than five degrees Celsius, including windchill, or warmer than 27 degrees Celsius, including Humidex. The rationale for this temperature-based exemption is based on the extreme weather variance that Ottawa experiences and the need for idling to de-ice the windshield and to heat or cool the interior of the vehicle.

Staff recommend that temperature thresholds be kept for **occupied vehicles** but that the maximum and minimum temperatures be amended, as follows:

- Cold weather – Lower the lower temperature threshold from five degrees Celsius to zero degrees Celsius and eliminate the windchill factor, which cannot be felt inside the vehicle. These changes represent a minimal health risk.

³ Natural Resources Canada. (2016, January). *A Model Idling Control By-law*. Retrieved from <https://natural-resources.canada.ca/energy-efficiency/communities-and-infrastructure/transportation-initiatives/3-model-idling-control-law/4405>

⁴ Natural Resources Canada. (2009, April). *Idling – Frequently Asked Questions*. Retrieved from <https://oee.mcan.gc.ca/transportation/idling/faqs.cfm>

- Warm weather – No change to the upper temperature threshold at 27 degrees Celsius with Humidex factor, primarily due to health concerns that arise in warmer weather. Factors like positioning of the vehicle in direct sun or shade, clothing, air movement and vehicle occupancy can increase interior temperature and pose heat-related health risks.
- A maximum idling time limit of five consecutive minutes in a 60-minute period would apply when it is colder or warmer than these above limits.

Staff recommend maintaining the status quo for **unoccupied vehicles**, which is that no temperature thresholds apply. The maximum idling duration for unoccupied vehicles would therefore be one minute regardless of outdoor temperature.

According to ClimateData.ca (created through a collaboration with Environment and Climate Change Canada), Ottawa experienced an average of 42 days a year where the temperature reached or remained above 27 degrees Celsius and an average of 203 days a year where the temperature reached or remained below five degrees Celsius, between 2007 and 2022. Changing the lower temperature threshold, as recommended, is anticipated to result in 55 additional days each year during which stricter idling restrictions would apply.

Most municipalities with a similar climate to Ottawa include a similar exemption in their by-laws in recognition of the impact that hot and cold weather may have on vehicles and people. Among mid-to-large Ontario jurisdictions, 10 municipalities provide the same exemption that Ottawa's by-law currently includes. However, some cities, including Toronto, Guelph, Burlington, and Markham, do not include a temperature exemption. For these jurisdictions, the maximum idling time limit applies at all temperatures.

Staff invited the public to consider these temperature limits and provide input on potential changes.

For the current lower temperature threshold of five degrees Celsius including windchill:

- One-third of respondents supported no changes to the limit,
- One-quarter suggested imposing a maximum idling time limit at all temperatures,
- Eleven per cent suggested decreasing the minimum temperature and permitting unlimited idling below that new limit, and

- One-fifth suggested permitting idling long enough to ensure a clear view.

For the current upper temperature threshold of 27 degrees Celsius including Humidex:

- Forty-two per cent suggested imposing a maximum idling time limit at all temperatures,
- One-third suggested the exemption remain unchanged, and
- Nine per cent suggested increasing the maximum temperature and permitting unlimited idling above that new limit.

Consideration for pets

Vehicles with pets were considered as part of this by-law review, both during the development of the temperature recommendations and as a potential new exemption. However, it was determined that the regulations should not encourage leaving pets in vehicles while they are stationary due to the risk and possible harm from overheating and due to provisions under the *Provincial Animal Welfare Services Act, 2019* regulating animal distress inside motor vehicles. If residents see pets in distress inside a vehicle and the owner cannot be quickly located, it is recommended to contact 911.

A maximum idling time limit of five minutes in hot or cold weather

Staff recommend that a maximum idling limit of five consecutive minutes in a 60-minute period be imposed when the temperature meets or warms above 27 degrees Celsius or cools to zero degrees Celsius or below. This five-minute duration is considered adequate to de-ice the windows for clear view or to cool the interior of the vehicle in very hot temperatures, noting modern vehicle manufacturers highlight that air conditioning functions more effectively when the car is in motion.

The recommendation to introduce a maximum idling time limit at all temperatures (either one minute or five minutes, depending on the temperature and occupancy) is anticipated to reduce emissions and improve air quality, particularly during hot days or smog events. According to the report on climate projections for the National Capital Region, Ottawa can expect two-and-a-half times the number of days exceeding 30 degrees Celsius in the next decades⁵, and so a maximum idling time limit at all temperatures balances restricting idling at warm temperatures with the impact that

⁵ Climate Projections for the National Capital Region: Executive Summary, page iii. (2020). *National Capital Commission*. Retrieved from https://publications.gc.ca/collections/collection_2024/ccn-ncc/W93-91-2020-3-eng.pdf

higher average temperatures will have. Any individual who may require a longer idling duration for health-related reasons may still obtain a medical letter and be exempted from the maximum idling duration as further detailed in the medical letter exemption below.

Consideration was given to applying a maximum idling limit of one minute at all temperatures, aligning with idling by-laws in Burlington, Kingston (until the most recent update to its idling regulations in May 2024), and Toronto. However, consultation with their enforcement staff indicated that officer discretion to not enforce the one minute limit was often applied during cold and hot days, particularly when one minute did not provide enough time to create a clear view from all windshields and windows in accordance with the *Highway Traffic Act, 1990*, or enough time for diesel engines to warm up to reduce additional emissions while driving. The recommendation of five minutes in a 60-minute period balances the creation of an idling cap with a duration that can be reasonably enforced.

The application of an idling limit below or above a certain temperature threshold is more common in jurisdictions outside of Canada, in cities with similar climates to Ottawa, as shown in Table 2.

Table 2: Idling temperature and time limits in jurisdictions outside Canada.

Jurisdiction	Lower temperature and time limits	Upper temperature and time limits
Finland	Below -15°C 4 minutes	N/A
Washington, D.C.	Below 32°F (0°C) 5 minutes	N/A
Cleveland	Below 32°F (0°C) 10 minutes	Above 85°F (29°C) 10 minutes
Seoul	N/A	Above 25°C 5 minutes

Review of exemptions to the maximum idling time limit

Staff conducted a thorough review of the exemptions in the current Idling Control By-law (2007-266) to validate the continuing need for the exempted vehicle or situation in question and identify any required updates or changes. This section of the report will

discuss recommended changes to six of the existing exemptions to the maximum idling time limit.

Medical letter

The current by-law includes an exemption for vehicles transporting individuals with a letter from a medical doctor certifying that the vehicle must idle to maintain interior temperature or humidity within a certain range. Staff recommend that this exemption remain, and that issuance of the letter be expanded to include other medical professionals.

Most Ontario idling by-laws contain an identical medical exemption. From the Ontario jurisdictions reviewed, 11 included this exemption in recognition that valid medical reasons may require the temperature inside a vehicle be maintained within a certain range for individuals vulnerable to the cold or heat. This exemption also received the highest support in the public survey, at nearly 90 per cent.

Consultation with disability advocates and with the Accessibility Advisory Committee indicated that this exemption was important for temperature-sensitive individuals, but that staff should consider expanding who can issue this letter, as not all individuals have ready access to medical doctors.

Staff recommend that the existing medical exemption be expanded to include nurse practitioners, occupational therapists, physical therapists, and respiratory therapists as the accepted medical professionals who can issue a medical letter to permit idling. These professions were generated from the list of medical professionals under the *Regulated Health Professions Act, 1991*, and referenced against those medical professionals who can issue an accessible parking permit from the Province of Ontario. Consideration was given to replacing the medical letter exemption with an exemption for individuals with this accessible parking permit, however, it was determined that parking permits are issued for various reasons which do not always align with the medical reasons that idling may be required.

Feedback from the Accessibility Advisory Committee also asked staff to consider an exemption for vehicles transporting groups of individuals requiring idling to maintain a certain temperature. Staff considered this request, however, note that the existing medical letter exemption would adequately cover group scenarios given that any vehicle with a passenger having a medical letter would be considered exempt while transporting that passenger.

Vehicles assisting in an emergency

The recommendation is to maintain the exemption for vehicles assisting in emergencies, and to include an additional exemption for police, fire, ambulance, or by-law officer vehicles when engaged in operational or training activity, except where vehicle idling is occurring substantially for the convenience of the operator. This recommendation has been developed in consultation with By-law and Regulatory Services, Ottawa Paramedic Service, Ottawa Fire Services, and Ottawa Police Service.

Ottawa Paramedic Service vehicles may idle to maintain the patient treatment compartment, equipment, and medicine within a certain temperature range. The equipment and medications are mandated by the Ministry of Health's Provincial Equipment Standards for Ontario and the Service follows the manufactures guidelines for maintaining equipment and medication within temperature range tolerances. To mitigate idling, the Ottawa Paramedic Service deploys hybrid vehicles and anti-idling eco-run technology, which limits vehicle idling to when the heating or cooling systems must activate to keep patient compartment, equipment and medicine within the acceptable temperature range. The Service also uses strategically located paramedic posts (garages) throughout the city to park emergency vehicles to decrease vehicle idling.

Similarly, Ottawa Fire Services vehicles idle to ensure that medicine and equipment are maintained for emergency response. Idling may also be required to ensure critical settings related to airbrake pressure and to operate sirens for longer periods. Ottawa Fire Services has a policy to limit idling for all non-emergency response vehicles to minimize air pollution and unnecessary wear on engines and related equipment.

Police vehicles idle to operate mobile dispatch terminals, medical equipment, speed detectors, and roadside screening devices which are required to be within a certain temperature range for proper function. To ensure that batteries do not become depleted within a few hours, idling is also required to operate lights for longer durations.

Every idling control by-law reviewed for this report included an exemption for emergency vehicles and/or for vehicles engaged in emergency activity. From the public survey, over 80 per cent of respondents agreed with this exemption.

Staff recommend that this exemption for emergency service idling not apply when idling is substantially for the convenience of the operator. This limiting factor has been added to the language of the exemption in the proposed by-law and aligns with best practice

recommendations from Natural Resources Canada⁶ and from other municipalities, including Kingston, Toronto, London, Oakville and Markham.

Vehicle and Equipment Idling Policy and public transit vehicles

The City's internal Vehicle and Equipment Idling Policy is currently included as an exemption in the existing by-law, with the effect that any City vehicle that is covered under the policy is automatically exempt from the current idling regulations. This is because when the current Idling Control By-law (2007-266) was enacted in 2007, the Vehicle and Equipment Idling Policy's maximum idling duration of one minute was more restrictive than the by-law. Given staff's recommendation that the by-law be amended to a one-minute maximum idling duration, the exemption for the City's internal policy is no longer required.

To achieve full alignment between the recommended by-law and the City's internal Vehicle and Equipment Idling Policy, it is recommended that the by-law specifically exempt public transit vehicles, defined as buses or vans intended for passenger transport and operated by a municipal transit authority. Public transit vehicles are required to idle for the proper function and maintenance of the engine and therefore to ensure that the buses are ready to provide service to passengers. These vehicles operate at a fast and low idling settings. Fast idling is when a bus is in normal operation, and low idling is used at start-up or at shutdown to ensure the engine can properly warm-up or cool-down, maintaining the proper temperature for after treatment systems and the proper function of equipment that reduces emissions. Public transit vehicles do not idle unnecessarily, and Transit Services has policies in place that limit idling to when it is necessary for the proper mechanical function of these vehicles. Exemption for public transit vehicles exist in other municipalities: Toronto, Hamilton, and Peterborough exempt these vehicles while passengers are embarking or disembarking, London exempts these vehicles for up to five minutes and Kingston exempts these vehicles at all times.

Other than the required exemption for public transit vehicles described above, there is full alignment between the recommended new idling by-law and the City's Vehicle and Equipment Idling Policy with respect to restricting idling by City vehicles. By removing the Policy as an exemption in the recommended new by-law, City of Ottawa vehicles will be subject to the requirements of both the by-law and the Policy. To enforce the Policy, the City monitors the idling of its own vehicles by a variety of means, including

⁶ Natural Resources Canada. (2016, January). *A Model Idling Control By-law*. Retrieved from <https://natural-resources.canada.ca/energy-efficiency/communities-and-infrastructure/transportation-initiatives/3-model-idling-control-law/4405>

the use of a dashboard that provides real-time feedback on where and for how long idling is occurring. This information is shared with managers and supervisors within each Department to action as appropriate.

It is noted that the City of Ottawa is already acting to reduce emissions in the municipal fleet. Under the impending Green Fleet Strategy and the ongoing Zero-Emissions Bus Strategy, municipal vehicles and buses will be transitioning to become hybrid, electric or alternative fuel vehicles, reducing or altogether eliminating the emission of greenhouse gases and criteria air contaminants, where possible. These vehicles are exempt under the current by-law and will continue to be exempt under the recommended by-law. Over time, the exemption for public transit will become less required as this transition continues.

Mobile workshops

Under the current regulations, a mobile workshop is considered a vehicle with equipment that must be operated in association with it, or a vehicle taking measurements on behalf of a utility or emergency service. When this exemption was first included in the 2007 by-law, it was meant to include vehicles like refuse collectors, where the engine powers equipment. Staff recommend that this exemption be amended to clarify when it applies, as follows:

“mobile workshop” means a vehicle containing work equipment that must be powered by the vehicle engine.

This amended exemption will limit vehicle idling in mobile workshops to instances when it is necessary to power work equipment such as concrete mixers, accessible ramps, and garbage compaction equipment, and does not permit idling solely for operator convenience. Industries that currently utilize this idling exemption confirmed that idling was required to use equipment that must take its power from the engine, in addition to warming up certain vehicles before their operation and to keep goods and materials within a certain temperature range.

Staff anticipate that the clarification in the exemption language for mobile workshops will help address uncertainty among the public and the industry. Results from the public survey revealed that over 18 per cent of respondents identified that they were unsure about this exemption, representing the highest percentage of uncertainty with any of the exemptions.

Motionless vehicles

The current by-law permits idling when vehicles are required to remain motionless due to traffic, weather, emergencies or when experiencing mechanical difficulties over which the person driving has no control. Most idling by-laws in Ontario include this exemption.

Staff recommend maintaining this exemption, with minor modifications to remove weather and add an exemption for drive-throughs. Weather-based regulations are already included in the proposed by-law. In addition to the temperature regulations, the exemption for emergencies would apply to any situation where weather creates a situation where vehicles must remain motionless.

Including drive-throughs in this exemption recognizes that vehicles in drive-throughs are in a similar situation to vehicles stopped in traffic, where they are motionless due to a queue of vehicles in front of them. Some respondents to the survey encouraged either the reduction or ban in the use of drive-throughs, but this falls outside the scope of this regulatory review. Drive-through facilities are regulated by the Zoning By-law in accordance with policies in the Official Plan concerning where these facilities may be permitted in the City.

Parades, races, and Council-authorized events

The current by-law contains an exemption for parades, races and any other events authorized by Council. Staff recommend that this exemption be removed. When vehicles are engaged in parades and races or other Council-authorized events and they are in motion, the by-law does not apply since the vehicles are not idling. When vehicles are idling at these or other Council authorized events, it is typically to operate work equipment that requires power from the engine, and the mobile workshop exemption captures these situations. Consultation with the public indicated that this exemption had the least support, with nearly 40 per cent in disagreement.

Exemptions with no changes

Staff recommend that the following existing exemptions to idling limits in the current by-law be maintained without any amendments, as set out below.

Private transit vehicles

Private transit vehicles are defined as motor coaches, tour buses, and school buses, and they are currently exempt from the idling regulation when passengers are being loaded or unloaded. Consultations with motor coaches and tour bus companies was

undertaken with the assistance of Ottawa Tourism and the Ontario Motor Coach Association. Feedback received from this engagement indicated that idling is required to maintain air brake pressure at an appropriate level to resume travel and to operate lifts and their digital and lighting systems.

Staff also consulted with the Ottawa School Transportation Authority. Feedback received indicated that idling is required during student pick-up and drop-off for mechanical and operational purposes. School buses may be required to build air pressure prior to departure if air brakes are in use, and to correctly stage the buses bumper to bumper at schools to prevent students from passing between them and onto the roadway. The Ottawa School Transportation Authority advises that when buses are required to stage this closely together, any mechanical difficulties arising from a requirement to restart the engine can result in impeding any subsequent buses or traffic and delaying the route.

Staff also consulted with school boards and public and private schools. Responses from the public survey indicated that the public sees idling at or near schools more frequently than any other location except drive-throughs. Schools and school boards were asked whether idling was a concern and why it may be required. From the 63 respondents, one-third indicated that idling was a concern, primarily due to vehicles parking in contravention of existing curbside regulations. Approximately one-fifth of respondents indicated that idling was required for special transportation vehicles and for Kiss n' Ride programs.

Staff considered the implementation of idle free zones around schools and determined that this approach was not feasible. The creation of these zones around schools would conflict with the need for school bus idling during student pick-up and drop-off. Defining these zones with the installation of signs would also come with significant costs and with the risk of over-signing rights-of-way that are already heavily signed and regulated. This can make it hard for motorists to comply with these rules. Instead, the recommendation for a one minute idling limit and the introduction of a maximum idling time in all temperatures would apply to most vehicles at schools, including school buses when they are not loading or unloading passengers, and thereby reducing unnecessary idling.

Armoured vehicles

The current exemption applies to armoured vehicles when a person remains inside while guarding its contents or while the vehicle is being loaded or unloaded. This is a common exemption that exists in most Ontario municipalities, and staff recommend that

it be maintained without any amendments. Representatives of the armoured vehicle industry indicated that idling is required in these situations for the health and safety of employees as these vehicles are fully sealed with no opportunity to regulate the vehicle's temperature by opening windows. Idling is also required for security reasons as these vehicles are required to power equipment that keeps them in constant communication while transporting their goods.

Vehicles engaged in normal farm practices

Vehicles engaged in normal farm practices are exempt from idling regulations. No changes are recommended to this exemption or to the definition as they reflect what is required under the *Farming and Food Production Protection Act, 1998*. Municipal by-laws cannot restrict normal farm practices carried out as part of an agricultural operation. The Normal Farm Practices Protection Board, which has the authority to determine what constitutes a normal farm practice, has ruled in *Belwood Poultry v Corporation of the Town of Amherstburg* that the local by-laws did not apply to restrict idling as part of the farm's poultry operation.

Staff solicited feedback on the current by-law and this exemption from representatives of agricultural societies and landowner associations in the City's rural wards. Respondents highlighted that vehicle idling is required for purposes related to maintenance and use of their farm equipment, like mixing feed, engine regenerations and making deliveries and drop-offs.

Vehicle service or repair

This exemption applies when idling is required to repair a vehicle or to prepare it for service. Most idling by-laws maintain this exemption, and staff do not recommend any changes to it. Idling may be required for diagnosis and troubleshooting related to emissions, for engine performance, for flushing and bleeding certain systems like power steering or cooling, for checking leaks or for testing repairs. This exemption is limited to situations where idling is required.

Vehicles that eliminate emissions in the idling phase of operation

The current exemption applies to vehicles, including hybrid vehicles, that eliminate greenhouse gas emissions and criteria air contaminants during the idling phase of operation. The by-law's intent is to restrict unnecessary vehicle idling where it creates these harmful emissions and contaminants. When this exemption was first included in 2007, staff noted that the technology for vehicles that eliminate these emissions at the

tailpipe was a developing industry. Hybrid vehicles were included in the by-law language based on a Council motion ([Motion No. 13/10](#)).

The recommendation to keep this exemption is due to the increasing prevalence of these vehicles and the exemption's alignment with the by-law's intent to reduce emissions. Electric and hybrid vehicles are more commonplace today. In June 2024, it is estimated that the total number of electric vehicles in Ottawa's geographic region is over 13 800⁷. New policies are making such vehicles more accessible and affordable, and emerging technologies like improved batteries and hydrogen power cells are making them more efficient. Hybrid vehicles are also becoming more commonplace, with most major vehicle manufacturers offering hybrid options. Most modern vehicles also contain start-stop technology, designed to limit idling when the vehicle is not in motion.

Idling regulations in the Noise By-law (2017-255)

The Noise By-law (2017-255, as amended) regulates motor vehicle idling from a noise perspective, as opposed to an environmental one. Section 16 of the Noise By-law limits the operation of an engine to five minutes while the vehicle is stationary and exempts transit vehicles while carrying passengers, when certain vehicles are operating equipment basic to the function of the vehicle like ready-mix concrete trucks, lift platforms or refuse compactors, and when heating or refrigeration systems are powered by the motor. Staff recommend repealing Section 16 of the Noise By-law so that all regulations for vehicle idling are contained under the Idling Control By-law. This will simplify enforcement and public understanding of the regulations and promote ease of reference.

Enforcement approach

The enforcement of idling regulations has focused on education and warnings, using these as public awareness tools around the harms associated with unnecessary idling.

Should the by-law be approved, staff would implement a robust public education and awareness campaign on the new idling regulations leveraging ottawa.ca, social media channels, and direct communications with individuals and groups who participated in the by-law review. Compliance with the new regulations will be monitored to ensure the

⁷ *Electric Vehicles in Ontario by Forward Sortation Area: Q2 2024*. (2024, June). Retrieved from <https://data.ontario.ca/dataset/electric-vehicles-in-ontario-by-forward-sortation-area/resource/f08d1b7c-3833-4a2a-bc8d-7a948ead990f>

regulations are meeting their intended purpose. Results will be reported as part of the Service's annual report, and any challenges and issues will also be flagged.

The proposed new by-law includes additional enforcement tools. The change to the definition of idling and to the regulations in the proposed by-law includes language that will permit offences to be issued to the owner of a vehicle, including corporations, where applicable, in addition to existing language that permits the issuance of tickets to the operator of the vehicle, which is the current enforcement practice under the existing by-law and recommended to continue. Idling offences will continue to be enforced on a primarily complaint-basis and residents can contact 3-1-1 to initiate an idling investigation.

Staff have also reviewed the set fines that are currently in place for idling-related offences. The set fine amount for an offence under the by-law is currently \$500. In the Greater Toronto Area, fines are set in the range of \$100, with Toronto at \$105, Burlington at \$120, Mississauga at \$150 and Hamilton at \$100. In Vancouver, infractions are no less than \$250, and in the borough of Outremont, Montreal, they are no less than \$150. Upon approval of the proposed by-law, Emergency and Protective Services department staff will apply for set fines with the Province of Ontario. As is the case with other by-laws, By-law and Regulatory Services will employ a progressive system of enforcement ranging from warnings to fines and escalating fines where continued or egregious non-compliance is occurring.

Staff explored the possibility for residents to submit video by means of email to By-law and Regulatory Services as evidence of an idling offence. Video evidence submitted by email has been and will continue to be collected by enforcement staff as part of ongoing investigations. However, video submissions of idling offences via the City's complaints portal are not currently possible due to technological limitations with the application that processes online requests, that limits the size of attachments to 6 MB or less. This limitation prevents video attachments that would need to be at minimum one minute long to demonstrate an offence. Should this technological limit change in the future, video submissions can be considered again.

Implementation

Public education is a key element in the reduction of unnecessary vehicle idling. If the recommendations of this report are adopted, a robust communications plan will be implemented to ensure that the public is aware of the changes. Information will be

posted to Ottawa.ca, public service announcements and the city's social media channels.

It is recommended that these changes come into effect on January 1, 2025. This will provide an additional period where public education around the updated regulations will occur.

Conclusion

Reducing unnecessary vehicle idling reduces greenhouse gas emissions and air pollutants that are harmful to the climate and the environment in support of City of Ottawa policies and Term of Council priorities. The recommendation of a one minute maximum idling duration aligns with municipalities in Ontario and with Natural Resources Canada recommendations, and the introduction of a five minute maximum idling time limit in cold or hot weather reasonably limits idling where it was previously unrestricted. The recommended exemptions to these maximum idling limits represent vehicle types and situations where idling remains necessary for health and safety and proper vehicle function.

Staff assess that the recommended by-law is consistent with Council's strategic priorities and the Climate Change Master Plan.

FINANCIAL IMPLICATIONS

There are no financial implications associated with this report.

LEGAL IMPLICATIONS

There are no legal impediments to approving the recommendations in this report.

COMMENTS BY THE WARD COUNCILLOR(S)

This by-law applies City wide.

ADVISORY COMMITTEE COMMENTS

Staff presented at the April 2024 Accessibility Advisory Committee meeting, where feedback from previous consultation with the public and with representatives from the Ottawa Disability Coalition and other advocacy groups was presented along with questions for the Committee's consideration regarding their lived experience with vehicle idling.

Members agreed with previous feedback that a shorter maximum idling duration can benefit individuals with low vision, as the sound of the engine idling can mask the sound of other traffic and create uncertainty for when it is safe to cross private accesses. Feedback also included expanding who can issue a medical letter to permit idling due to widespread physician shortages, that changes to the temperature limits can have disproportionate impact to temperature-sensitive individuals, and that education is a key component of any recommended changes to the by-law.

The Accessibility Advisory Committee suggested that the medical letter exemption should be expanded to include vehicles transporting groups of individuals where temperature may have a disproportionate impact. The Committee also suggested staff consider the benefits that improved air quality can have.

CONSULTATION

In fall 2023, initial consultations occurred with City departments, where staff provided information about and their experience with vehicle idling. Consultations also occurred with municipal staff from other Ontario jurisdictions about how their idling by-laws are administered.

In winter 2024, a survey was posted to Engage Ottawa for the public to provide their feedback on the by-law. This survey was promoted through the City's social media channels, a public service announcement, local media outlets, and with a media interview. Staff also invited Community Associations and environmental groups to participate. A total of 1,045 responses were received throughout this public consultation period, and results have been included in the Discussion section of this report.

While the public survey was open, separate surveys were distributed to businesses and industries using vehicle types currently exempted from the maximum idling time limit, to gauge their potential or continued requirement to idle and their feedback on the by-law. Respondents to the business survey indicated that their primary reason for idling was to warm up a vehicle before driving or to keep the operator, passengers, or cargo (in particular, perishable cargo) warm or cool.

Staff received survey feedback from armoured vehicle companies operating in Ottawa, from mobile workshops including right-of-way contractors and utilities, normal farm practices including rural agricultural societies and landowner associations, and from motor coach, tour bus and school bus operators, including feedback from school boards and schools. Their comments are detailed in their respective portions of the Discussion section of this report.

The Ottawa Disability Coalition and the Accessibility Advisory Committee were consulted to understand their lived experience with vehicle idling for individuals living with disabilities. Results of these consultations are detailed in the Advisory Committee Comment(s) and Accessibility Impacts sections of this report.

Following the conclusion of these external consultations, a “What-We-Learned” report, attached as Document 2, was posted to Engage Ottawa and stakeholders were notified.

In the spring of 2024, final consultations occurred with internal City departments, summarizing the feedback from the external consultations, and discussing the potential impact of the recommendations informed by the feedback staff received throughout engagement.

ACCESSIBILITY IMPACTS

Staff consulted with the Ottawa Disability Coalition, representatives from the blind community, and with the Accessibility Advisory Committee to understand how vehicle idling can impact and support individuals living with disabilities, and to inform the maximum idling duration and several of the exemptions to this limit.

The recommendations to implement a longer idling period when it is warmer than 27 degrees Celsius including Humidex and to maintain the medical letter exemption were in part due to the feedback received regarding the impact that heat may have on individuals with certain medical conditions.

The mobile workshop exemption to the maximum idling time limit includes vehicles where the engine’s power is required to operate lifts or ramps. Under the *Integrated Accessibility Standards Regulation, O Reg 191/11*, conventional and specialized transportation service providers are required to operate these devices. More broadly, this exemption facilitates the use of any device requiring mechanical power from the engine for vehicle access.

In addition to what was outlined in the Discussion and Advisory Committee Comments sections, a lower permitted idling duration also reduces harmful pollutants, as detailed further in the Environmental Implications section of this report. These pollutants represent a disproportionate health risk to certain individuals, including older adults and persons with pre-existing health conditions.

ASSET MANAGEMENT IMPLICATIONS

The City of Ottawa Vehicle and Equipment Idling Policy has regulated the idling of city owned, leased, or rented vehicles for over two decades. The recommendation to align the proposed by-law with the Policy's maximum idling duration and exemptions simplifies public and staff understanding of idling regulations and reduces idling when it is unnecessary. Reducing unnecessary idling contributes to extending the lifecycle of City vehicles and aligns with the Comprehensive Asset Management Policy's guiding principle of sustainability.

CLIMATE IMPLICATIONS

Internal combustion engine (ICE) vehicles ignite fuel to power the engine and exhaust harmful emissions as a by-product of this process. These by-products include carbon dioxide, which is a principal greenhouse gas contributing to climate change, and criteria air contaminants that contribute to poor air quality. Reducing unnecessary idling therefore reduces the amount of greenhouse gases released into the atmosphere. It also reduces harmful pollutants, as discussed further in the Environmental Implications section of this report.

Through Ottawa's Climate Change Master Plan, the transportation sector is estimated to contribute 44 per cent of the city's total greenhouse gas emissions. This Plan also sets community and corporate emissions reduction targets to meet the goal of a clean, renewable, and resilient city by 2050. Although achieving this goal is primarily attributed to a reduction in the use of ICE vehicles, greater usage of active and public transit, and the adoption of battery electric vehicles that produce no emissions while driving, idling does contribute to emissions in the transportation sector and restricting unnecessary idling contributes to community reduction targets.

It is estimated that light and medium duty ICE vehicles emit 69 grams of carbon dioxide per minute⁸ and that Ottawa has approximately 619,200 such vehicles considering:

- the estimated population of Ottawa is 1.08 million people⁹,
- the estimated population of Ontario is 15.99 million people¹⁰,
- Ottawa's proportion of light and medium duty vehicles in Ontario (approximately

⁸ Natural Resources Canada. (2009, April). *Idling – Frequently Asked Questions*. Retrieved from <https://oee.nrcan.gc.ca/transportation/idling/faqs.cfm>

⁹ City of Ottawa. (2024, January). *Current population and household estimates*. Retrieved from <https://ottawa.ca/en/living-ottawa/statistics-and-demographics/current-population-and-household-estimates#section-29b9341b-b349-49d2-98dc-5e384fb00c53>

¹⁰ Province of Ontario. (2024, June). *Ontario Demographic Quarterly: Highlights of first quarter*. Retrieved from <https://www.ontario.ca/page/ontario-demographic-quarterly-highlights-first-quarter>

seven per cent of approximately 8.991 million vehicles¹¹) equals 633 000 vehicles, and

- Ottawa's number of light and medium duty ICE vehicles equals 619,200 (633 000 vehicles minus approximately 13,800¹² electric vehicles).

It is also estimated that an average passenger vehicle emits 4,600 kilograms of carbon dioxide in a year¹³. If all light and medium duty ICE vehicles in Ottawa reduced their daily idling by two minutes, over the course of a year, it is therefore estimated that it would remove 31.2 million kilograms of carbon dioxide from the atmosphere. This is equivalent to removing over 6,780 passenger vehicles from Ottawa roadways. A lower maximum idling duration and the introduction of a maximum idling duration at all temperatures therefore contributes to fewer greenhouse gas emissions and better overall air quality, mitigating further impacts of climate change.

ENVIRONMENTAL IMPLICATIONS

In addition to the benefits from a reduction in greenhouse gas emissions as detailed in the Climate Implications section of this report, reducing unnecessary vehicle idling also improves local air quality by reducing harmful pollutants.

According to Environment and Climate Change Canada, internal combustion engine vehicles emit various pollutants including volatile organic compounds, nitrogen oxides, particulate matter, carbon monoxide and sulphur oxides¹⁴. These pollutants contribute to the formation of ground-level ozone, which is a respiratory irritant and a major component in the formation of smog. These pollutants also pose a range of health risks including acute respiratory symptoms, asthma symptoms, and bronchitis, which in turn can increase hospital admissions and emergency room visits.

INDIGENOUS, GENDER AND EQUITY IMPLICATIONS

The recommendation to expand the list of health care professionals who can issue a medical letter exempting individuals from the maximum idling duration is in recognition that not every person has access to a medical doctor. Expanding the list of medical

¹¹ Statistics Canada. (2023, November). *Light and medium-duty vehicle registrations: Interactive dashboard*. Retrieved from <https://www150.statcan.gc.ca/n1/pub/71-607-x/71-607-x2022023-eng.htm>

¹² *Electric Vehicles in Ontario by Forward Sortation Area: Q2 2024*. (2024, June). Retrieved from <https://data.ontario.ca/dataset/electric-vehicles-in-ontario-by-forward-sortation-area/resource/f08d1b7c-3833-4a2a-bc8d-7a948ead990f>

¹³ United States Environmental Protection Agency. (2023, August). *Greenhouse Gas Emissions from a Typical Passenger Vehicle*. Retrieved from <https://www.epa.gov/greenvehicles/greenhouse-gas-emissions-typical-passenger-vehicle>

¹⁴ *Air pollution from cars, trucks, vans and SUVs*. (2017, February). Environment and Climate Change Canada. Retrieved from <https://www.canada.ca/en/environment-climate-change/services/air-pollution/sources/transportation/cars-trucks-vans-suvs.html>

professionals to include nurse practitioners, occupational therapists, physical therapists, and respiratory therapists to support individuals who must idle for medical reasons and creates a more equitable opportunity for residents and visitors to acquire a letter when necessary.

RURAL IMPLICATIONS

The maximum idling time limit applies City-wide. However, it is recognized that certain vehicles may need to idle to conduct agricultural operations as a part of normal farm practices. The recommendation is for this exemption to remain to continue facilitating these operations, and to remain in compliance with the *Farming and Food Production Protection Act, 1998*, which states that municipal by-laws cannot interfere with normal farm practices.

TERM OF COUNCIL PRIORITIES

This report supports the following strategic priorities identified in the 2023 to 2026 Term of Council Priorities:

- A city that's green and resilient, by reducing greenhouse gas emissions resulting from unnecessary vehicle idling.

SUPPORTING DOCUMENTATION

The following Documents support this report:

Document 1 – recommended Idling Control By-law

Document 2 – Idling Control By-Law What-We-Learned report

DISPOSITION

Following approval of this report's recommendations, Emergency and Protective Services together with Legal Services will prepare the required by-laws and amending by-laws for enactment by Council and will apply for set fines from the Province of Ontario in accordance with applicable processes. In addition, all related administrative requirements for implementation of the recommendations will be undertaken. Educational material about the new idling regulations will be posted on Ottawa.ca and through the City's social media channels.