**Vision:** The City of Greater Sudbury is a growing, world-class community bringing talent, technology and a great northern lifestyle together.



# **Agenda**

# **Operations Committee**

meeting to be held

Monday, February 13<sup>rd</sup>, 2012

at 6:00 pm

Committee Room C-11





# OPERATIONS COMMITTEE AGENDA

For the 2<sup>nd</sup> Operations Committee Meeting to be held on **Monday**, **February 13**, **2012 Committee Room C-11** at **6:00** pm

# **COUNCILLOR JACQUES BARBEAU, CHAIR**

Claude Berthiaume, Vice-Chair

(Please ensure that cell phones and pagers are turned off)

Copies of Agendas can be viewed on the City's website at www.greatersudbury.ca/agendas/.

DECLARATIONS OF PECUNIARY INTEREST AND THE GENERAL NATURE THEREOF

## **COMMUNITY DELEGATIONS**

1. Highway 17 Route Planning Study from Sudbury to Markstay (ELECTRONIC PRESENTATION) (FOR INFORMATION ONLY)

5 - 7

- Gregg Cooke, Stantec Project Manager
- Dheera Kantiya, MTO Project Manager

(This presentation will provide Stantec Consulting Ltd. and the Ontario Ministry of Transporation (MTO) the opportunity to share information regarding the Highway 17 Route Planning Study from Sudbury to Markstay.)

## **PRESENTATIONS**

2. Traffic Warrants

# (ELECTRONIC PRESENTATION) (FOR INFORMATION ONLY)

 Dave Kivi, Co-ordinator of Transportation and Traffic Engineering Services

(This presentation was requested and will educate Members of the Operations Committee regarding the issuance of Traffic Warrants.)

# **CONSENT AGENDA**

(For the purpose of convenience and for expediting meetings, matters of business of repetitive or routine nature are included in the Consent Agenda, and all such matters of business contained in the Consent Agenda are voted on collectively.

A particular matter of business may be singled out from the Consent Agenda for debate or for a separate vote upon the request of any Councillor. In the case of a separate vote, the excluded matter of business is severed from the Consent Agenda, and only the remaining matters of business contained in the Consent Agenda are voted on collectively.

Each and every matter of business contained in the Consent Agenda is recorded separately in the minutes of the meeting.)

## CORRESPONDENCE FOR INFORMATION ONLY

C-1. Report dated February 8, 2012 from the General Manager of Infrastructure Services regarding Birch Lane/Champlain Street - Emergency Watermain Replacement.

## 8 - 13

## (FOR INFORMATION ONLY)

(This report is to inform the Committee of the completed emergency watermain replacement work and associated funding sources.)

# **REGULAR AGENDA**

# REFERRED & DEFERRED MATTERS

R-1. Report dated January 31, 2012 from the General Manager of Growth and Development regarding Idling Control in Greater Sudbury.

(RECOMMENDATION PREPARED)

14 - 20

(At its January 24th meeting, Council referred the Idling Control report back to the Operations Committee for further discussion. This report presents two options to control unnecessary vehicle idling in Greater Sudbury. The recommended option includes both education and a by-law that allows a one-minute idling period enforceable in private and public areas. The proposed by-law includes a number of exemptions, however, that reflect specific operational and health and safety situations when idling may be required.)

# **ADDENDUM**

# **CIVIC PETITIONS**

# **NOTICES OF MOTION**

# **Adjournment (Resolution Prepared)**

(Two-thirds majority required to proceed past 9:00 P.M.)

BRIGITTE SOBUSH, DEPUTY CITY CLERK
FRANCA BORTOLUSSI, COMMITTEE SECRETARY



# **For Information Only**

**Highway 17 Route Planning Study from Sudbury to Markstay** 

Presented To:	Operations Committee
Presented:	Monday, Feb 13, 2012
Report Date	Thursday, Jan 19, 2012
Type:	Community Delegations

# **Recommendation**

For Information Only

# Signed By

No signatures or approvals were recorded for this report.



Stantec Consulting Ltd. 100 - 401 Wellington Street West TorontoONM5V 1E7 Tel: (416) 596-6686

Fax: (416) 596-6680

January 17, 2012 File: 165000757

Clerk's Services City of Greater Sudbury Tom Davies Square 200 Brady Street, Box 500, Stn A Sudbury ON P3A 5P3

Attention: Ms. Caroline Hallsworth, Executive Director, Administrative Services / City Clerk

Dear Ms. Hallsworth:

Reference: Highway 17 Route Planning Study from Sudbury to Markstay, GWP 5031-09-00

Request for Delegation at the Operations Committee Meeting on February 13, 2012

I am writing to request to include the Stantec/MTO project team as a delegation at the City of Greater Sudbury Operations Committee meeting scheduled for Monday, February 13, 2012 at 6:00 PM.

The purpose of the presentation will be to provide the Committee with a study update regarding the above noted project in advance of an upcoming Public Information Centre (PIC) scheduled for Tuesday, February 28, 2012; Wednesday, February 29, 2012; and Thursday, March 1, 2012. A copy of the PIC notice will be provided for inclusion in the Committee's Agenda Package.

The purpose of the study is to identify a four-lane Controlled Access Highway, with access restricted to interchange locations only, for Highway 17 from Sudbury to Markstay, and Highway 69 from Estaire Road to Highway 17. A Screening Evaluation has been carried out for the Preliminary Corridor Alternatives displayed at the first PIC. A short list of Corridor Alternatives was confirmed, and Route Alternatives have been developed within the Corridors that were carried forward. The Route Alternatives will be available for review at the PIC.

The project team has met with City of Greater Sudbury staff, and provided Council with a presentation in advance of the first PIC in February 2011. This presentation will be provided by Stantec's Project Manager, Mr. Gregg Cooke, and should take approximately 10 minutes. The MTO Project Manager, Dheera Kantiya, will also be in attendance.

Please confirm that we have been included in the upcoming Operations Committee Meeting agenda and contact me if you have any questions.

Sincerely,

STANTEC CONSULTING LTD.

M. Cavon

Maya Caron, B. Sc., MCIP, RPP

Environmental Planner Tel: (416) 598-7162 Fax: (416) 596-6680

comments@highway17sudburytomarkstay.ca



# NOTICE OF PUBLIC INFORMATION CENTRE 2 Highway 17 Route Planning Study from Sudbury to Markstay and Highway 69 from Estaire Road to Highway 17 (GWP 5031-09-00)

Stantec Consulting Ltd. has been retained by the Ministry of Transportation (MTO) to undertake a route planning, preliminary design, and environmental assessment study for Highway 17 from the existing Highway 69 interchange, easterly to Markstay, a distance of approximately 42.5 km; and for Highway 69 from Estaire Road to Highway 17, a distance of approximately 5.5 km. At the completion of the study, a preferred route will be selected and designated (protected).

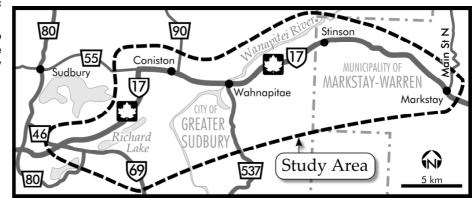
The first series of Public Information Centres (PICs) was held in February 2011 to provide the public with an opportunity to review the Preliminary Corridor Alternatives, and provide input to the project team. A short-list of Corridor Alternatives was subsequently confirmed, and Route Alternatives have been developed within the Corridors that were carried forward. This notice

is to announce the second Public Information Centre (PIC).

The purpose of the second PIC is to present and seek input on the Route

**Alternatives.** The following sinformation will also be presented:

- Access alternatives;
- Existing conditions in the study area (i.e. natural, social, economic, and cultural);
- Evaluation process; and
- Screening of Corridor Alternatives (short-list).



The Public Information Centre will be a drop-in format. However, a presentation providing a brief overview of the study and PIC displays will be provided approximately every hour. Members of the project team will be available to answer questions about the study. The PIC is scheduled for:

Tuesday, February 28, 2012 Colonial Inn 28 Cedar Street, Coniston

4:00 PM to 7:00 PM

Wednesday, February 29, 2012
Mine Mill Local 598 Hall
2550 Richard Lake Drive, Sudbury
4:00 PM to 7:00 PM

Thursday, March 1, 2012
Markstay Pentecostal Church Hall
12 Millechamp Street, Markstay
4:00 PM to 7:00 PM

### **THE PROCESS**

This study is a "Group A" project under the *Class Environmental Assessment (EA) for Provincial Transportation Facilities* (2000). The third PIC is planned for the fall of 2012 and will provide the public with an opportunity to review and comment on the Preferred Plan.

A Transportation Environmental Study Report (TESR) will be prepared and made available for public review at the end of the study. Notices will be placed in this newspaper and on the project website (www.highway17sudburytomarkstay.ca) to advise the public of the future PIC and the TESR public review.

#### COMMENTS

You are encouraged to participate in the study and to provide comments in writing to the project team. If you wish to have your name added to the project mailing list or have questions about the study please contact:

Mr. Gregg Cooke, P.Eng. Consultant Project Manager Stantec Consulting Ltd. 1400 Rymal Road East Hamilton ON L8W 3N9 Tel: (905) 381-3227

Tel: (905) 381-3227 Call Collect: (905) 385-3234 Fax: (905) 385-3534

comments@highway17sudburytomarkstay.ca

Mr. Dheera Kantiya, P.Eng.

MTO Senior Project Engineer Ministry of Transportation, Northeastern Region

Ministry of Transportation, Northeastern Region 447 McKeown Avenue

North Bay ON P1B 9S9 Tel: (705) 497-5260 Toll free: 1-800-461-9547

Fax: (705) 497-5208

comments@highway17sudburytomarkstay.ca

You are encouraged to visit the project website, www.highway17sudburytomarkstay.ca, to obtain current project information and to submit comments to the project team.

If you have any accessibility requirements in order to participate in this project, please contact one of the Project Team members listed above.

Comments and information are being collected to assist the MTO in meeting the requirements of the Environmental Assessment Act. Information will be collected in accordance with the Freedom of Information and Protection of Privacy Act. All comments will be maintained on file for use during the study and, with the exception of personal information, may be included in study documentation and become part of the public record.

Version française disponible en composant le (416) 598-7162, (Maya).



# **For Information Only**

Birch Lane/Champlain Street - Emergency Watermain Replacement

Presented To:	Operations Committee		
Presented:	Monday, Feb 13, 2012		
Report Date	Wednesday, Feb 08, 2012		
Type:	Correspondence for Information		

# **Recommendation**

For Information Only

# **Finance Implications**

This report provides Council with notification of non-budgeted expenditures, in compliance with Section 22 of the CGS Purchasing By-Law 2006-270.

The 2011 Water Capital Contingency account was used to fund both the Birch Lane and Champlain Street watermain replacement projects. This account is appropriate to use for this purpose, in accordance with the Finance Committee report dated November 26, 2009, copy attached.

Both projects were tendered in 2011 as Engineering Contracts in accordance with the CGS Purchasing By-Law.

# **Background:**

Each year, the Capital Water Budget includes watermain replacement projects based on several criteria, including: sections of watermain with a high ranking of frequency and number of breaks (poor condition); looping / upsizing (security of supply); and removal / replacement of undersized or poor material mains, all in conjunction with the proposed roads capital projects.

# **Birch Lane Watermain Improvements:**

As of the end of 2010, the 50mm diameter polyethylene watermain on Birch Lane had five (5) breaks over its entire length of 130m, equating to a break frequency of 38 breaks per km, which is considered moderate. Based on the break statistics and other factors considered, the replacement of this watermain was not included in the 2011 Capital Budget. In 2011, there were five (5) more breaks, increasing the frequency of breaks to 76 per km, which is considered high. The Water / Wastewater Services Division spent over \$18,000 in repair costs for the five (5) breaks. In mid-September (after the fifth break of the

# Signed By

Only

## Report Prepared By

Wendi Mannerow, P.Eng Water & Wastewater Engineer Digitally Signed Feb 8, 12

#### **Division Review**

Nick Benkovich

Director of Water/Wastewater Services

Digitally Signed Feb 8, 12

## **Recommended by the Department**

Greg Clausen, P.Eng.

General Manager of Infrastructure Services

Digitally Signed Feb 8, 12

#### Recommended by the C.A.O.

Doug Nadorozny
Chief Administrative Officer
Digitally Signed Feb 8, 12

year), Water / Wastewater Services Staff ranked this section of main as a high priority for replacement based on field observations during repairs. Considering Staff's concerns and the high risk of additional breaks on that section of main especially during winter months, an emergency construction contract to replace this section of watermain was initiated. Funding for the contract in the amount of \$86,088 was drawn from the 2011 Water Capital Contingency account. This report provides Council with notification of the non-budgeted expenditures, in compliance with Section 22 of the CGS Purchasing By-Law 2006-270.

# Champlain Street Reconstruction – St. Agnes Street to Notre Dame Street (Azilda):

The Champlain Street Reconstruction Contract was included in the 2011 Roads Capital Budget. When reviewed during the Water / Wastewater Capital Budget planning process, the records indicated that the watermain was made of cast iron with no break history. Therefore, this project was not included in the 2011 Water Capital budget. During the detailed road design however, it was discovered that the watermain was in fact made of the old PVC "series" pipe material, which is no longer allowed as it does not meet design standards. This type of pipe material has exhibited significant poor performance problems when disturbed by adjacent construction activities. An example is on MR80 in McRae Heights, where the watermain crossings were not replaced and began breaking shortly after the reconstruction of the road. Due to the risk of the failures of this section of watermain, based on the history of this poor strength material after disturbances during construction, its replacement was included in the road reconstruction contract.

Funding for the replacement of the watermain in the amount of \$152,920 was drawn from the 2011 Water Capital Contingency account. This report provides Council with notification of the non-budgeted expenditures, in compliance with Section 22 of the CGS Purchasing By-Law 2006-270.

# Request for Recommendation Finance Committee



Type of Decision							
Meeting Date	November 30, 2009		Report Date		November 26, 2009		
Decision Requested	Yes	х	No	Priority	х	High	Low
	Direction Or	nly		Type of Meeting	х	Open	Closed

Report Title			
Water / Wastewater Capital Contingency Allocations			

Budget Impact/Policy Implication	
This report has been reviewed by the Finance Division and the funding source has been identified.	
	For Information.
X Background Attached	Recommendation Continued

Recommended by the Department

Greg Clausen, P.Eng.

General Manager of Infrastructure Services

Recommended by the C.A.O.

Doug Nadorozny
Chief Administrative Officer

Date: November 26, 2009

Report Prepared By

Windi Mannevaw.

Wendi Mannerow, P.Eng. Water/Wastewater Engineer Division Review

Nick Benkovich

Director of Water/Wastewater Services

# **Background**

During the November 23rd, 2009 Finance Committee meeting, Council requested a report on contingency accounts as well as several other envelopes in the Water / Wastewater Capital submission. In response to the Committee's request, the following information is provided:

# Contingency for Construction of Watermain Priority and Watermain with Roads Priority Projects

This contingency account provides additional funding for a variety of purposes in relation to the 'Watermain Priority' and 'Watermain with Roads Priority' capital projects, as required throughout all phases of the project, from design to construction.

Capital projects are subject to high variability in construction costs and although the detailed design cost estimates are based on historical pricing, the construction costs will normally vary due to economic environment and time of year.

As per our current standard of practice, CGS capital budget cost estimates are based on conceptual designs. As a project progresses, a detailed design is completed, enabling a more accurate estimate to be produced that includes costs such as those based on geotechnical information and a more refined scope of work. Once the detailed project budget estimate is complete, additional funding may be required to cover the refined estimate and typically funds from this contingency account are used to supplement the original capital account to permit the tendering process to proceed.

Contingency accounts are also utilized to fund engineering consultants' fees in circumstances when it is determined part way through the year that there is not enough appropriate / specifically qualified design or contract administration staff to complete the project.

As well, during construction, contingency accounts typically provide funds for unanticipated field conditions (ie. soils / rock / groundwater elevations or new condition assessment information of infrastructure) which may result in a change of scope of the work to cover the additional costs, above the tendered price.

This contingency account also provides funding for watermain work that is determined to be required during the construction of a Roads Priority project, based on actual field conditions. This work would not have been anticipated during the capital budget planning process, based on information available at that time.

Date: November 26, 2009

Historically, this contingency item was allocated in the capital budget at approximately 30% of the total 'Watermain Priority' and 'Watermain with Roads Priority' projects and a significant portion of, if not all of this account has been utilized. During these tough economic times, it is important that a contingency be maintained therefore it is strongly suggested that any value lower than 15% may impact the appropriate completion of capital projects in the 'Watermain Priority' and 'Watermain with Roads Priority' projects. Without this contingency funding, recommended replacements/repairs/upgrades may not be completed.

# Contingency for Construction of Sewer with Watermain Priority Projects

Similar to the Watermain contingency account noted above, this Sewer with Watermain priority projects contingency account provides funding for a variety of purposes required at all phases of the project, from design to construction.

Specifically to sanitary sewer construction however, is the challenge of physical conflicts of the infrastructure during construction. Often, the design intends for minor work on the sanitary sewers during a 'Watermain or Roads Priority' project, based on available information (ie. camera reports, historical files). During the actual construction however, previously unanticipated replacement / repairs are found to be required. Funds are provided from this contingency account for the resulting additional work.

Historically this contingency item was allocated in the capital budget at approximately one-third of the watermain contingency item and a significant portion of this account has been routinely utilized. It is important that a 'Sewer with Watermain' contingency be maintained at that ratio as any value lower may inhibit the appropriate completion of capital projects in the 'Sewer with Watermain' envelopes. Without this contingency funding, recommended replacements/repairs/upgrades may not be completed.

# Contingencies (Distribution and Collection)

The Distribution and Collection Contingency accounts provide funding for emergency operational requirements, resulting in large scale capital expenditures provide funding operational requirements such as equipment purchase or emergency system components such as piping and valves, that exceed the operational budgetary capabilities.

Engineering recommendations are frequently required to support operational efforts particularly during emergency situations involving infrastructure repairs. During emergency situations, detailed engineering design is not possible due to the time constraints associated with the urgent nature of the work. Engineering assessments and recommendations improves decision making resulting in a better quality of finished product. For example, geotechnical investigations are required in support of major repairs of underground infrastructure such as emergency watermain repairs under creek crossings or other sensitive locations.

The original proposed budget envelope for 2010 is based on the historical average actual requirement from past years.

Date: November 26, 2009

Council also requested additional information on the following envelopes:

## **System Improvement**

The System Improvement allocation relates to strategic development related initiatives such as industrial parks as well as commercial and institutional sites which provide economic benefits to the community. The budget envelope for 2010 is based on the average allocation the City spends annually to cover the City's share of improving sewer and water main capacity to facilitate these important initiatives.

Without appropriate funding to share the burden of the infrastructure improvement costs, strategic development may be hindered.

Based on the critical nature of this envelope, we recommend that the funding remain at the level proposed.

# Water Efficiency Plan

A Water Efficiency Plan is a valuable tool within a municipality. Most of the other OMBI municipalities have Water Efficiency plans in place to define programs that allow for the most cost effective use of existing water supply facilities to defer construction of additional supply facilities where possible.

A Water Efficiency Plan would define a 3 to 5 year strategy for both water efficiency and conservation programs that best suit the needs of our community based on in-depth study of the influences specific to each system. Typically, such plans define a 5 year program that includes items such as (but not limited to); General Public Education, Outdoor Water Use Reduction, Efficient Fixture Replacements, Industrial, Commercial and Institutional Efficiencies, and Municipal Leak Reduction.

The aim of such a Plan is to optimize the use of current infrastructure to defer facility expansion projects and contain production costs.

The proposed budget envelope for 2010 provides for the development of such a Water Efficiency Plan for the CGS. The Request For Proposal for this project is currently in draft with an expected award date late in the first quarter of 2010 with work on the plan commencing soon after the award.

As this project represents an important priority, we recommend that funding be maintained at the level proposed.

The information presented in this Report has been considered and incorporated into the Budget Reduction Options Report to the Finance Committee dated November 30, 2009.



# **Request for Decision**

# **Idling Control in Greater Sudbury**

Presented To: Operations Committee

Presented: Monday, Feb 13, 2012

Report Date Tuesday, Jan 31, 2012

Type: Referred & Deferred

Matters

# **Recommendation**

WHEREAS Council has expressed concern about public nuisances and concern for the economic, social and environmental well-being of the municipality and the health, safety and well-being of its citizens,

WHEREAS motor vehicle idling results in the release of atmospheric pollutants and greenhouse gases that are harmful to the environment and to people's health,

BE IT RESOLVED THAT Council selects Option 2 – preparation of a by-law to control motor vehicle idling, whose coming into force will be preceded by an education campaign on the topic.

# **Update**

At its January 24th meeting, Council referred the Idling Control report back to the Operations Committee for further discussion.

The original report presented on January 9, 2012, is attached.

Under 'Option 2 - Education with Idling Control By-law', the following exemption should be added:

# Signed By

## **Report Prepared By**

Stephen Monet Manager of Environmental Planning Initiatives Digitally Signed Jan 31, 12

#### **Division Review**

Paul Baskcomb Director of Planning Services Digitally Signed Jan 31, 12

## **Recommended by the Department**

Bill Lautenbach General Manager of Growth and Development Digitally Signed Jan 31, 12

## Recommended by the C.A.O.

Doug Nadorozny Chief Administrative Officer Digitally Signed Jan 31, 12

<sup>&</sup>quot;Vehicles using heating or refrigeration systems powered by the motor or engine for the preservation of perishable cargo".



# **Request for Decision**

**Idling Control in Greater Sudbury** 

Presented To: Operations Committee

Presented: Monday, Jan 09, 2012

Report Date Wednesday, Dec 21, 2011

Type: Presentations

## Recommendation

WHEREAS Council has expressed concern about public nuisances and concern for the economic, social and environmental well-being of the municipality and the health, safety and well-being of its citizens,

WHEREAS motor vehicle idling results in the release of atmospheric pollutants and greenhouse gases that are harmful to the environment and to people's health,

BE IT RESOLVED THAT Council selects Option 2 – preparation of a by-law to control motor vehicle idling, whose coming into force will be preceded by an education campaign on the topic.

# **Background**

At the August 11, 2010, Policy Committee meeting, representatives of the Coalition for a Liveable Sudbury presented the benefits of an idling control by-law for the Greater Sudbury community. Policy Committee agreed that a report in cooperation with the Sudbury & District Health Unit, Coalition for a Liveable

Sudbury and EarthCare Sudbury be brought back to Council so that this matter can move ahead.

City staff met on several occasions to discuss idling control strategies and issues. City staff also researched what other Ontario municipalities had undertaken in terms of idling control, including approaches to and experiences with enacting a by-law.

City staff held a meeting with representatives of the Coalition for a Liveable Sudbury and the Sudbury & District Health Unit on November 9, 2011, to discuss the proposed options for idling control.

# **Negative Effects of Vehicle Idling**

Vehicle engines produce a number of undesirable air emissions when in operation. Tailpipes emit criteria air contaminants, such as volatile organic compounds (VOCs), carbon monoxide (CO), and oxides of nitrogen (NOx) that contribute to air pollution and have detrimental health effects on people and the environment. A recent report by Toronto's Medical Officer of Health states that there is clear evidence that air pollution from

# Signed By

## **Report Prepared By**

Stephen Monet Manager of Environmental Planning Initiatives Digitally Signed Dec 21, 11

## **Division Review**

Paul Baskcomb Director of Planning Services Digitally Signed Dec 21, 11

## **Recommended by the Department**

Bill Lautenbach General Manager of Growth and Development Digitally Signed Dec 22, 11

## Recommended by the C.A.O.

Doug Nadorozny Chief Administrative Officer Digitally Signed Dec 22, 11 vehicles adversely affects human health. Air pollution from vehicles is associated with a broad range of respiratory and cardiovascular effects, cancer, and hormonal and reproductive effects. Groups that are especially at risk from vehicle-related air pollution include children, fetuses, pregnant women, and the elderly. Vehicle operation also releases carbon dioxide (CO2) – the principal greenhouse gas that contributes to climate change.

Research indicates that Canadian motorists idle their vehicles an average of 6 to 8 minutes a day. Idling a vehicle's engine not only contributes to smog and climate change, but also wastes fossil fuels, which, of course, are non-renewable. Natural Resources Canada (NRCAN) estimates that if Canadian motorists avoided idling for just three minutes a day, over the year they would collectively save 630 million litres of fuel, and \$756 million in fuel costs (assuming a fuel cost of \$1.20/L). These savings translate into a reduction of 1.4 million tonnes of CO2, equivalent to taking 320,000 cars off the road for the entire year.

As expected, increases in idling time results in increases in fuel use and CO2 emissions. In tests conducted by NRCAN using three vehicles driven over a simulated urban driving cycle in -18oC conditions, idling for 5 minutes resulted in a 7 to 14 percent increase in fuel use (and concurrent CO2 emissions), while idling for 10 minutes resulted in 12 to 19 percent increases in fuel use.

A report produced for NRCAN in 2003 found that idling for over 10 seconds uses more fuel and produces more CO2 compared to restarting a vehicle's engine. As more of a guideline that balances factors such as fuel savings, overall emissions and potential component wear on the starter and battery, NRCAN recommends 60 seconds as a reasonable idling period, after which you should turn the engine off. By limiting idling to 60 seconds when a vehicle is stopped, money saved on fuel should more than offset any potential increase in maintenance costs from wear and tear on a vehicle's starter and battery. The operator therefore not only saves money but there are also benefits to people's health and the environment.

# City of Greater Sudbury - Idling Control Initiatives

# **Operations**

In 2008, City of Greater Sudbury's Council approved an idling control policy for municipal employees and contractors. The policy requires drivers to limit vehicle idling to a maximum of three minutes, under most circumstances.

Over the past few years, the City's Fleet Services and Transit Services have also initiated a number of actions that will contribute to decreased idling time of the City fleet. Various driver training modules designed to reduce fuel use and cut emissions have been used to train City staff. The City has worked with the Fleet Challenge Ontario program as well as NRCAN's FleetSmart initiative.

Various other actions aimed at reducing fuel use and idling have also been undertaken by Fleet Services. Engine pre-heat systems and auxiliary cab heaters have been installed in about 50 vehicles so far allowing the inside of these vehicles to stay warm without the need for idling the vehicle. LED signal and traffic control lighting is now required on new vehicles purchased by the City. The low energy use of these lights allows the vehicle to be turned off for extended periods without the risk of discharging the battery.

Recently, Fleet Services initiated a pilot project to monitor a number of measures of vehicle use patterns, including idling. On-board information systems have been installed on a handful of vehicles and, based on the early results of this pilot project, a decision will likely be made to deploy this technology throughout the City fleet. Vehicle data are tracked wirelessly and made available directly to the Fleet Manager. Idling time is one of the measures that can be tracked and discussed with Supervisors.

# **Community Outreach**

The City of Greater Sudbury's EarthCare Sudbury Program has been involved in local idling research and campaigns since its inception in 2000. EarthCare Sudbury has prepared and published a number of articles in the local media on the topic of vehicle idling.

In 2001, EarthCare Sudbury, with funding from Natural Resources Canada, undertook a project aimed at understanding idling behavior among residents and the success of strategies to reduce idling. As part of a larger initiative to reduce engine idling in the City of Greater Sudbury, this project targeted 49 schools throughout the city as well as a large number of locations where residents are apt to idle. There were several project objectives:

- To reduce engine idling by parents, school bus drivers and the general public;
- To increase awareness of the importance of reducing greenhouse gas and smog-related emissions from individual actions, such as engine idling; and
- To develop knowledge and expertise in encouraging a whole community to change their behaviour regarding vehicle idling.

An intervention strategy was developed and applied in an attempt to modify idling behavior among school bus drivers and parents dropping kids off at the schools. Intervention components included posting metal 'Idle Free Zone' signs on the school property, engaging drivers on the topic of vehicle idling, and handing out idling information cards and vehicle stickers. The intervention strategy reduced both the frequency and duration of idling.

Through the EarthCare Sudbury Program, hundreds of 'Idle Free Zone' signs have been posted at various commercial, municipal and institutional sites, in addition to those posted at schools. In addition, a CTV EarthCare Minute ad dealing with idling control was prepared and aired in 2009, 2010, and 2011.

# **Existing Idling Control By-laws in Ontario**

The Ontario Municipal Act empowers municipalities to pass by-laws respecting the following matters:

- Economic, social and environmental well-being of the municipality.
- Health, safety and well-being of persons.

In addition, a municipality may prohibit and regulate with respect to public nuisances, including matters that, in the opinion of council, are or could become or cause public nuisances.

In Ontario, regulation of idling is achieved either through anti-idling provisions in existing by-laws, such as for noise or parking, or through stand-alone idling control by-laws. The latter is judged preferable since control is sought for reasons of air pollution. Several Ontario municipalities that have enacted stand-alone idling control by-laws, including Burlington, Guelph, Hamilton, London, Markham, Oshawa, Ottawa, Toronto and Windsor, among others. There are a number of matters that the by-laws are required to address, including permitted idling time, exemptions and enforcement.

# **Permitted Idling Time**

Most Ontario by-laws permit idling for 2, 3 or 5 minutes. Burlington is the first municipality in Ontario to have a 1 minute idling limit. It was reduced in 2009 from its initial 3 minute limit. Other municipalities have expressed intentions to move to a 1 minute idling limit.

A report prepared for NRCAN in 2005 by the Clean Air Partnership proposed a model idling control by-law with a 1 minute idling limit. As mentioned previously, NRCAN proposes a 1 minute limit as a reasonable

idling period based on factors such as fuel savings, overall emissions and potential component wear on the starter and battery. Also, the shorter the idling limit the more efficient and cost-effective the enforcement.

In the idling control by-laws, longer idling limits are set for transit vehicles while at a layover or stopover location.

# **Exemptions**

All idling control by-laws in Ontario list exemptions, which include various emergency situations or involve emergency vehicles engaged in an operational activity. Other exemptions include vehicles being serviced, vehicles involved in parades, armoured vehicles while someone is on duty inside the vehicle, or a motor vehicle carrying a passenger where a medical doctor certifies in writing that for medical reasons, the person requires the temperature or humidity be maintained within a certain range.

## 1. Temperature

Some by-laws also include exemptions relating to outside temperature, while others don't. Municipalities that choose to include a temperature-related exemption for idling have settled on outside temperatures lower than 5oC and higher 27oC. Temperature introduces another factor that complicates enforcement. Officers must keep track of outside temperatures before laying an idling charge. On days when temperature approaches the exemption temperature limits, keeping track of temperatures is further complicated by variations during the day and between locations. In addition, staff in other municipalities have received complaints of unnecessary idling but were powerless to act due to the temperature being outside of the limits.

Several Ontario municipalities have chosen to remove temperature exemptions altogether. The Highway Traffic Act, for example, requires that a vehicle's windows afford the driver clear view to the front, side and rear. A driver can idle a vehicle to maintain clear view conditions, but would initially be expected to scrape windows rather than relying solely on the defrost/defog function in their vehicles.

## 2. Drive-throughs

Drive-throughs are convenient features associated with certain commercial establishments. At times, however, drive-throughs can lead to idling as vehicles queue up along the drive-through lane waiting for particular goods or services.

In Greater Sudbury, a drive-through service facility is permitted as an accessory use to a permitted restaurant, financial institution, retail store, automotive service station, gas bar and automated car wash, except in the C6 Downtown Commercial Zone. In Ontario, the trend is to include drive-throughs in the list of exemptions in idling control by-laws if these features are permitted through land-use planning.

### **Enforcement**

Idling control by-laws in Ontario are enforced on a complaints basis or as officers come across idling vehicles while conducting their normal work duties.

In Ontario, municipalities with idling control by-laws have preceded enforcement with education. Even during enforcement, education is seen as the preferred approach. Verbal warnings and a brochure that explains the benefits of not idling vehicles reinforces the message that 'idling gets you nowhere'. Charges for most idling control by-laws are laid under Part I of the Provincial Offences Act. In this instance, officers must obtain information from the driver before issuing a ticket. Drivers are not obliged to provide any information to the by-law officers. This has lead a few municipalities (e.g., Burlington, Peterborough and Orillia) to develop their by-law so as to make idling a Part II offence under the Provincial Offences Act. All

parking offences are issued Part II tickets and the licence plate number is used as a means to identify the owner of a vehicle who then becomes ultimately responsible for paying the ticket. Enforcement of the idling control by-law is, therefore, made simpler and more efficient for the officers, who only now need to record vehicle licence plate numbers on the tickets and affix the ticket to the windshield.

# **Idling Control Options**

# Option 1 - Education on Vehicle Idling

Following this option the City would reinitiate its idling awareness and educational efforts that it had undertaken in the early to late 2000s. The EarthCare Sudbury Program would be focused on communication aimed externally at the community, while the Fleet Services would continue its idling awareness initiatives for City staff. Community education would involve delivering idling awareness campaigns through the EarthCare Sudbury Partnership, thereby potentially affecting tens of thousands of Sudburians; media releases; bookmarks to be delivered through the libraries; EarthCare Minutes on CTV; and, possibly, social media. A communications plan for idling control would be developed by EarthCare Sudbury in collaboration with Corporate Communications and French Language Services. Implementation of the communications plan will be achieved through the EarthCare Sudbury operating budget.

Fleet Services will continue to raise awareness among City staff as to the problems of idling and the existence of the Idling Control Policy. Key to this success will be the continued participation of all supervisors to ensure that staff comply with the Policy.

## Pros

- Minimal disruption to regular staff operations; continuing existing initiatives.
- No extra resources required to implement.

### Cons

• Idling is somewhat of an entrenched behaviour facilitated by such technologies as remote vehicle starters. Therefore, education alone may be insufficient to result in a significant reduction in vehicle idling.

# Option 2 – Education with Idling Control By-law

Under this option the City would initiate an education and awareness campaign similar to Option 1. In addition, the City would enact and subsequently enforce an idling control bylaw which would come into force on January 1, 2013, preceded by several months of public education. The bylaw would allow motor vehicles to idle up to 60 consecutive seconds within sixty consecutive minutes. The bylaw would be applicable to private and municipal properties and highways under the City's jurisdiction. Exemptions to the bylaw would include, but not necessarily be limited, to the following:

- Emergency vehicles, off-road vehicles and equipment while engaged in operational activities, including training and client transfer.
- Vehicles assisting in emergency response and/or activities.
- Mobile workshops where engine power is necessary for electrical or pressure generation, tool use, hoist or winch use, lift gate or boom operation, and/or similar applications.
- Vehicles with power take-off containing work equipment that must be powered by the vehicle engine.
- Transit vehicles in layover or stopover, defined as a stopping point along a transit route or at a transit vehicle terminal, for a maximum of 15 minutes to allow transit vehicles to adjust to service schedules.
- Vehicles that remain motionless because of emergency or traffic conditions, including but not limited to congestion, traffic control signals, weather conditions or mechanical difficulties.

- Vehicles where idling is required as part of the repair process or to prepare the vehicle for service.
- Extreme cold weather or heat alerts where idling may be necessary for the well-being of the operator and/or passengers.
- Idling to defrost, defog or deice vehicle windows provided a scraper is used prior to starting the engine. Idling must end once fog, frost, or ice conditions have been eliminated.
- Outside workers may idle a vehicle for up to 15 minutes for the purpose of getting warm and/or dry if
  indoor accommodations are not available at the work site. To reduce the possibility of carbon
  monoxide accumulation in the cab, window(s) must remain partially open for safe ventilation.
- A vehicle transporting a person who has in their possession a medical doctor's certificate stating that for medical reasons, the person requires the temperature or humidity to be maintained within a certain range and the idling of the vehicle is necessary to achieve that temperature or humidity level.
- Vehicles engaged in a parade or any other event authorized by the municipality.
- Vehicles that are operated on the travelled portion of a drive-through lane.

A minimum six-month period would be dedicated to education and awareness before commencement of full enforcement with issuance of tickets for bylaw infractions. During the education period, bylaw officers would only hand out brochures and issue warnings to those caught idling their vehicles for more than 60 seconds. Tickets would be issued under Part 2 of the Provincial Offences Act. Thus, it would be the owner of the vehicle rather than the driver who would ultimately be liable.

## Pros

- Should lead to adequate idling control with enforcement of the by-law rather than just relying on education.
- Enforcement using Part 2 powers makes the owner of the vehicle responsible for the fines.
- By-law officers will be able to enforce as they come across idling vehicles while conducting their normal work duties.

## Cons

• With complaints-based enforcement, it will be difficult to issue tickets for infraction situations that are occasional and without a set daily or weekly pattern. Response time of by-law officers is currently several days for non-emergency situations.