

Snow Event Update

Recommendation:

That the January 19, 2011, Transportation Department report 2011TD0874 be received for information.

Report Summary

This report provides information outlining the City's response to the storm event between January 07, 2011 to January 09, 2011.

Report

The following background information is provided regarding both the City's response and some initial insights on any changes in response approach for future larger events of this type

Perspective – Scale of January 7, 2011, to January 9, 2011, event

The storm event of January 7, 2011, to January 9, 2011, was the largest single snowstorm in Edmonton since January 30, 1989, to January 31, 1989, and is clearly beyond the scale that was contemplated for the more typical snow events that the snow policy is designed to address. Overall, approximately 30 centimetres of snow were received from late Friday afternoon (January 7, 2011,) until snow ended approximately noon Sunday (the original snow warning anticipated 10-15 centimetres). The January 1989 event was 37.8 centimetres of snow.

Immediate storm response

All equipment was mobilized and City crews doubled up effective 7 p.m. on Friday, January 7, 2011, and have

remained doubled up ever since with over 100 pieces of City equipment responding. Hired graders were called in to start work on midnight Saturday (prior to the end of the storm event) and have continued to be called in on a daily basis. Priority response occurred as per operational procedures – first priority to river valley and major arterial network, followed by completion of minor arterials and bus routes. Snow windrow removal from the Downtown commenced at 8 p.m. Sunday, January 9, 2011.

Storm response versus snow policy

The snow policy stipulates a 48 hour expectation for the plowing to bare pavement of all arterials and bus routes, as well as plowing of sidewalks from the end of the storm event (i.e. following noon Sunday, January 9, 2011,). This target was not achieved. The following timelines were achieved for plowing:

- arterial roads – network completed by 3 p.m. Tuesday, January 11, 2011
- bus route/collectors – network completed by Friday, January 14, 2011
- sidewalks (City responsibility) – on going work as snow continued

Residential roadway blading

Residential roadway blading, including lanes, commenced on Wednesday, January 12, 2011, with crews working 7 a.m. to 7 p.m. daily, primarily using City sander/plows, with crews continuing to be double shifted to maximize speed of response.

Overall equipment response

Overall, the following equipment has responded to the event:

City: 111 sander/plows, 30 plows without sanders, 21 graders, 12 snow blowers, 20 sidewalk plows/sanders, six skid steers

Hired equipment: graders – initially 100, increased to 120 from Monday midnight onwards, 20 loaders, 78 end dump trucks, 30 skid steers, 22 bulldozers at snow sites (note increase of loaders and bulldozers from the initial call out list)

All equipment, including City and hired, is continuing to be deployed.

Public communications and inquiry response

311 is the primary response mechanism to receive public concerns. 311 has been able to keep up with the public inquiries, and more importantly, has been shown to be the best mechanism to record information in a timely way, as well as ensuring tracking of calls.

Although a number of other mechanisms are being used by citizens to report concerns (such as e mail), the timeliest tracking is through 311. Given the volume of calls, city staff are not able to respond personally back to the majority of concerns, however 311 ensures the recording and tracking, and provides the districts with information needed to address priorities.

Media releases and media availabilities are a good way of communicating progress of the storm response. A

media availability was held on the afternoon of Saturday, January 8, 2011, with Roadway Maintenance staff to inform the public of our storm response. A media release was sent out on Sunday, January 9, 2011, providing an update our progress to that point. Media releases were sent out each morning from Monday, January 10, 2011, through Friday, January 14, 2011, providing updated information. A joint media availability with Roadway Maintenance and Transit staff was held on the afternoon of Monday, January 10, 2011, and another media release with Roadway Maintenance staff was held on the morning of Friday, January 14, 2011, to close out the week.

A significant improvement in communications occurred through the response with the publication of a daily list of planned neighbourhoods to be bladed. This responded to the concerns raised through the citizen feedback from February 2010 and provides better information regarding need to shift parked vehicles off street, as well as an additional information channel to address media and public questions regarding which areas are being done on a given day.

Snow storage sites

The snow storage sites are continuing to handle incoming snow from both the private parking lots and windrow removal from City streets, even though the number of hired bulldozers was increased to keep up with the incoming volume of snow, as well as temporary diversion from one of the sites (Poundmaker) during part of the morning to ensure that bulldozers can keep up.

Initial Lessons learned from this event

Although our primary focus continues to be on completing the response to the snow event, the fact that we have been able to keep the city moving and ensure no interruptions in either emergency response or basic transit service through the largest snow event in more than 20 years indicates that our overall storm response strategy is effective.

The following are some of the initial areas where we need to consider modifications or improvements to process:

- a) **Snow Routes** – these were originally installed to allow a city-wide ban of parking on all bus routes to allow snow removal. Staff found that such an approach is ineffective, for targeted removal of windrows on bus routes/collectors in problem areas is most effective through use of temporary no-parking in advance of the work and courtesy tows. Amendments to bylaw authority are required to allow restrictions on on-street parking on bus routes during snow clearing activity (such as seasonal bans) and these will be brought forward for consideration.
- b) **Comprehensive Parking Ban** – the most serious impediment to snow clearing in residential areas is on-street parking. The current response of day-time only blading is largely taking place due to the presence of on street parked vehicles obstructing the progress of work. Amendments will be brought forward to the Traffic Bylaw to strengthen the authority to designate no parking overnight in the event that this is required to more rapidly respond to snow events.
- c) **Exemption from Noise Bylaw** – Transportation has to annually request this exemption, but practically, staff cannot respond to events of this type without the authority to undertake work on a 24-hour basis. Recommendations will be brought forward to City Council to ensure that authority is permanently maintained for 24-hour snow event response.
- d) **Overall availability of equipment and staff** – the storm response has tested the combined resources of the City and private sector. While keeping in perspective that this is a once in 20-year event, there may be opportunities to review targeted additions to fleet and staff, particularly if these are for equipment that can be used on a year round basis. Of note, the sander/plow trucks are the limiting factor in the speed of response to residential blading, and these trucks can also be utilized as part of City paving on collector roads and in residential resurfacing areas.
- e) **Snow Storage Site Contingency** – although not anticipated to be a problem at this stage, an additional snow storage site (new Northeast site) can be utilized if required. Staff will review our overall contingency plan.

- f) **Blading versus Bare Pavement Plowing in residential areas** – staff continue to believe that blading is the appropriate response, as this limits the size of windrows in residential areas, and prevents the need for follow up with skid steers to remove windrows in front of driveways. Staff have reviewed the implications of grading to bare pavement, which would result in large windrows, and restrictions of on-street parking throughout the city. Based on the feedback received in the public consultation process last winter, citizens will strongly resist removal of on-street parking for an extended period of time. While it has been suggested that snow be hauled out of residential areas, the practical reasons that this is not possible are as follows; capacity not available in snow storage sites; blowers and trucks not available, overall time to undertake the work if started when equipment is available and not interrupted by any other snow events is about 12 weeks. Authority is required from City Council for a comprehensive hauling from residential areas, as it is not part of the approved Snow Policy or within the discretion of the City Manager, nor is it part of available budget without specific approval of City Council.

Policy

C409F Winter Road Maintenance Program