City of Toronto

Peer Review of the City’s Emergency Management Program Review

Prepared for City of Toronto
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**Summary Report**

**Background Context for Peer Review**

The City of Toronto (“CoT” or “the City”) experienced a winter storm (“Ice Storm” or “storm”) event on December 21, 2013 through to December 22, 2013. The storm produced freezing rain, ice pellets and wind resulting in downed power lines from fallen trees and tree limbs. There were over 300,000 Toronto Hydro customers without power and City services were disrupted. Additionally there were thousands of Torontonians who were displaced from their homes or experienced disruptions.

In January 2014 the Toronto City Council was presented with a report from the City Manager that included impacts from the 2013 Ice Storm. Several motions were adopted by Council including direction that the City Manager report back to the Executive Committee on the City’s review of the emergency response to the Ice Storm and provide recommendations for improvements to the management of future events. City Council authorized the City Manager to engage an independent third party consultant to participate in a review of the December 2013 winter storm, the Emergency Operation Centre and the emergency response system. In April 2014 the Toronto City Council was presented with another report from the City Manager which included a structure for the City’s comprehensive review.

The City’s comprehensive review included an assessment and review of the Operational Support Functions, Risk Specific Plans and supporting procedures that were activated in response to the December Ice Storm. Deputy City Managers and their staff considered their departments’ actions in response to the Ice Storm. Consideration was given to the strengths and weaknesses of the existing plans and recommendations were made for improvements in response to future emergencies. These reviews took place within an approximate six week period. Additionally the Office of Emergency Management (OEM) conducted an After Action Report for the Ice Storm as per their practices. Office of the City Manager staff indicated that this was the first time they have been asked to facilitate a review of Operational Support Functions.

**Scope of Peer Review**

PricewaterhouseCoopers LLP (“PwC” or “we”) recognizes that the City of Toronto Emergency Plan is an important part of the City’s emergency response framework. This was considered when conducting the Peer Review.

PwC was specifically engaged to conduct a Peer Review of the City’s After Action Report, Power Disruption Risk Specific Plan Review and specific Operational Support Functions Reviews (Damage Assessment, Debris Management, Emergency Donations Management, Emergency Human Services, Emergency Information and Media Relations, Emergency Operations Centre, Traffic Management and Volunteer Management).

There are two sections to this report:

Summary Report – We analyzed documents provided by the City and made recommendations and observations on the comprehensiveness of the original reviews in relation to emergency management industry standards. The City of Toronto Emergency Plan was also considered for context.

Detailed Responses – We provided specific reflections on the City’s original reviews in relation to questions we were asked to consider. This included observations on sufficiency, deficiency and comments on the original recommendations.
Analysis

The City’s comprehensive review was requested by City Council and includes other work that is beyond the scope of our Peer Review. Not included in our Peer Review was the City’s response to City Council motions and the Toronto Hydro Independent Review. Our analysis therefore provides feedback relating to the City reviews identified in the scope section above and our discussions with City staff.

Strengths

**Comprehensive Stakeholder Engagement** – Overall the internal and external stakeholders the City staff engaged included the parties in the associated plans which they reviewed. Information was collected in various methods and was detailed in the reviews. Methods used for feedback included meetings, emails and direct discussions which were all completed within a limited time period.

**Thorough Review of Incident** - The details provided in the City reviews generally provided specific details of their response to the Ice Storm. This includes timelines, statistics and details on stakeholder involvement. Information provided here is useful to set the context for the consequent analysis and recommendations that were made by the City.

**Consistent Approach** - The City’s Operational Support Function Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

Opportunities

**Prioritization Criteria** – There was no specific or consistent criteria used by City staff to outline how to best prioritize their recommendations. Objectives themselves may differ as can the weight distribution. A consistent approach that aligns to enhancing emergency response can help to minimize conflicting objectives and assist in decision making when considering distributing funds to address issues identified.

**Risk and Cost/Benefit Analysis** – The recommendations that were provided did not generally provide evidence of how they would specifically enhance the City’s capacity to better respond for future emergencies. City decision makers could benefit from understanding what residual risk may remain if certain recommendations are implemented over others. The Hazard Identification and Risk Assessment (HIRA) section of the City of Toronto’s Emergency Plan was not included in the City’s review as it related to power outage risk assessment. Also, a risk assessment methodology could have been useful during the response mode to assess the changing environment when secondary incidents occurred like the carbon monoxide threat.

**Review Scoping Considerations** – The After Action Report process is not formalized albeit there are practices in place to guide reviews. The reviews focused mostly on the Emergency Operations Centre and other aspects of the OEM’s function were not specifically considered such as continuity of operations. The response and ability of City departments to provide critical services in the midst of the Ice Storm was not determined. This capability is a critical consideration when looking at the emergency response capability. This should be analysed to determine if there were gaps in the City’s continuity of operations program.

**Operational Support Function Dependencies** – The focus of the review was to analyse and recommend ways to better assist the City in their response to future emergencies. Recommendations that were noted in one Operational Support Function could impact or relate to another Operational Support Function. An analysis to map out the recommendations can show opportunity to leverage resources. This may also point to opportunities to assess the existing capacity of resources, personnel, technologies and other assets. Considering this in advance of the emergency can help prepare the City to be more effective in emergency response in the future.
**Recommendations Summary**

We are providing the following recommendations to ways the City could consider addressing the weaknesses identified above.

**Prioritization of Recommendations**

The City of Toronto’s Emergency Plan provides a risk assessment methodology for assessing hazards in relation to impact and probability. This analysis may assist the City when contemplating specific considerations made by City staff to address recommendations that address power disruption hazards. If the power disruption risk is deemed to be “high” by the City then these associated recommendations could have higher weight when making decisions.

Other considerations for prioritization could relate to the City’s overall risk tolerance to social, environmental and economic wellbeing. Some details are provided in the City of Toronto’s Emergency Plan in section 6.9 Standardized Response Goals. The City could define impacts and probability by giving criteria for “low”, “medium” and “high”. This is similar to the risk assessment approach in the City of Toronto’s Emergency Plan under section 7.0.

Recommendations could align to specific risk criteria that are broader than the City of Toronto’s Emergency Plan by linking to broader City goals. In the context of the Ice Storm and consequent power outage the following is provided as a Social criteria example:

- **Social** – Safety and wellbeing of the general public and the vulnerable population.
- **Impact Consideration** - X number of people with health and safety concerns for X period of time. This could include vulnerabilities to patients at health care facilities or vulnerable people in their residences due to dependencies of electricity to base needs.
- **Probability Consideration** – X% likelihood of power disruption to occur based on statistical analysis and threat forecasting when considering potential impacts from hazards such as flooding or extreme wind.

Recommendations could be ordered by priority based on a risk level for social, environmental and economical. Further usefulness can come from assigning a weight. For example, Social criteria could have a 50% weight whereas Environmental and Economical each could have a weight of 25%.

**Cost/Benefit Analysis**

After determining a clear risk-based prioritization approach there is an opportunity to provide several recommendations for particular issues. With funding potentially limited this can help decision makers understand the impact of their decisions. Options provided could demonstrate how this reduces the risk level. Noting what residual risks still remain can assist decision makers when considering risk tolerance levels.

**Review Scoping**

The After Action Report could review not only the Emergency Operation Centre actions but to consider the validity of the broader City of Toronto’s Emergency Plan. Considering the response and lessons is vital to improve future emergency response but other sections around partnerships and authorities provides comprehensive enhancement opportunities. As an example, section 6.10 of the City of Toronto Emergency Plan considers external organizations and private sector partners for emergency response. A formal review process that articulates goals, prioritization and cost/benefit analysis is recommended.
Operational Support Function Dependencies

A systematic review of the recommendations made to consider relationships, impact or opportunities across the departments involved may reveal efficiencies and prevent contradictory responses. Because City Departments may lead one Operational Support Function and support several others there is an opportunity to better understand these relationships. The City may also take advantage of this analysis by considering how the recommendations may also support other government programs that are not emergency response based. This could provide an opportunity to create win-win scenarios.

Peer Review Methodology

PwC was engaged as independent third party consultant to conduct the Peer Review of the City’s review of their Emergency Management Program with a focus on emergency response. The following documents were our focus for the Peer Review:

- After Action Review
- Operational Support Functions Reviews
  - Damage Assessment
  - Debris Management
  - Emergency Donations Management
  - Emergency Human Services
  - Emergency Information and Media Relations
  - Emergency Operations Centre
  - Traffic Management
  - Volunteer Management
- Power Disruption Risk Specific Plan Review

Information and supplementary documentation was provided by City staff. This was all used in our analysis and recommendations. Our task was to develop a summary report that provided our observations, analysis and recommendations in relation to industry practices in the field of emergency response. Through meetings with the City Manager’s staff and the Office of Emergency Management the following specific questions were the focus of this Peer Review:

- Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- Are there any deficiencies with the City’s review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- Are the recommendations proposed reasonable and consistent with the City’s intent to improve the response to future emergency events?

- Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We had back and forth discussions with City staff who clarified factual and assumptions in this report. Drafts were reviewed with the City before it was finalized to confirm contents of this report were accurate. City staff also started to consider recommendations during our peer review and was receptive of making enhancements to their reviews.
Detailed Responses to Peer-Review Questions

After Action Report Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The Office of Emergency Management (OEM) engaged nearly 500 City staff and external partners that were involved in the response of the Ice Storm. We reviewed the list of stakeholders and it appeared comprehensive and related to stakeholders identified in the City’s Emergency Plan.

- The OEM does not have a formal After Action Plan approach but does have a practice of considering other jurisdictions approach to After Action Plans to assist. The approach taken for the Ice Storm did not prioritize recommendations that were made.

- The City’s Review Process included a review by the Emergency Management Working Group and formal approval expected from the Toronto Emergency Management Program Committee on or around June 3, 2014.

- Toronto Hydro staff attended stakeholder feedback sessions and focused on their interface with the City of Toronto.

- The focus of the After Action Report seemed to mainly consider activities of the Emergency Operation Centre (EOC). An opportunity was provided to identify recommendations for future emergency responses.

- Specific questions for stakeholders were clearly articulated and focused on notification/activation, Emergency Operations Centre, internal/external communications, information management, resources, and preparedness/prevention/response and safety issues. These questions were relevant for emergency response.

- Specific questions were focused on the Emergency Operations Centre, Emergency Human Services Response, Assistance to Vulnerable Persons and the Toronto Emergency Management Program Committee activities. Information collected missed some other important areas as noted in the City of Toronto Emergency Plan like the City Hall Operational Response Team or private sector partners.

Are there any deficiencies with the City’s review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- The questions presented to stakeholders did not clarify what is meant by “adequate information” or “adequate communication”. Without clarity on criteria for “adequate” there provides an opportunity for disparity with feedback received. Different interpretations for what is meant by “adequate” could relate to conflicting conclusions.

- The After Action Report did not consider assessing capacity of resources, personnel, technologies and other assets during the emergency response. Although this was technically out of scope for the City’s review, exploring performance measures and expectations can be formalized as a control for effective emergency response.
Are the recommendations proposed reasonable and consistent with the City's intent to improve the response to future emergency events?

- Recommendations were diverse in nature and included people, facilities, assets and IT technology. This approach was comprehensive in nature.

- Many of the recommendations involved City staff time but not further costs. There were recommendations which involved costs where a cost-benefit analysis did not occur to assist decision makers to prioritize decisions.

- The recommendations made in the After Action Report are consistent with improving the response capacity and capability for future events but do not identify the recommended levels based on City objectives.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We recommend the City consider:

- Developing a standard After Action Report template with definitions and prioritization criteria clarified. Content areas could include the following:
  
  o Summary of the emergency/disaster from a broad perspective.

  o Summary of the impacts to the City's emergency response and continuity of operations by critical service or operational function.

  o Analyse the response team’s actions in relation to pre-existing plans, procedures and protocols for that critical service or operational function. Flag best practices which were observed as meeting the goals of the emergency plan. Note lessons that were observed where the plans or actions did not relate to the goal of the plan.

  o Articulate where findings may relate or contradict across functional areas. Further discuss and analyze apparent contradictions across functions and departments to understand and/or remediate differences. Consider common findings across functions and departments and consider options to leverage commonalities.

  o Conduct a cost-benefit analysis using a criteria established by the City. Please refer to the Summary Report section for more suggestions to consider. There could be two or three options for adopting each best practice and/or lesson. Analysis for each option should include a description of residual risk. A description of required resources (people and approximate budget) along with a timeline and a management champion identified could assist decision making.

- Developing formalized agreements with partners and governments to assist in emergency response efforts in the future. This may include arrangements with suppliers or third-party service providers where high priority gaps exist. Other partnerships may include pre-arranged agreements with Federal or Provincial Governments to share resources or assets, such as equipment or facilities, in response to an emergency situation.

- Establishing criteria and defining terms used in the review. For example instead of asking participants to respond to whether “adequate communications” was collected there could be clarification made in the City of Toronto Emergency Plan on what communication content and timelines requirements.
**Damage Assessment OSF Review**

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- During the review of this OSF it was concluded by City staff that this OSF as was not utilized in response to the Ice Storm. We observed however in this review that damage and impact assessments were requested from all Divisions. The results were not provided in this review however.

Are there any deficiencies with the City’s review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- We did not observe any particular deficiencies in this OSF Review.

Are the recommendations proposed reasonable and consistent with the City’s intent to improve the response to future emergency events?

- Three recommendations were made but there was no indication of the prioritization criteria used to determine the order.

- We noted that it was recommended to expand the scope of damage assessment to consider other structures within the City’s responsibility. This can assist the City’s response to consider damage assessment more broadly to other critical infrastructures.

- The expansion of the damage assessment scope aims to take a more comprehensive approach to emergency response within the City.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We recommend the City consider:

- Leveraging the knowledge and expertise that may already exist in the City’s critical infrastructure protection program to assist in expanding the damage assessment to other infrastructures.

- Expanding the scope of damage assessment may have impacts to other OSFs or the broader City Emergency Plan. It is recommended to ensure that mandates are aligned to support a comprehensive approach.

- Training for City staff conducting damage assessments to a broader scope should be considered along with outreach to OEM staff for understanding of risk considerations.
Debris Management OSF Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- This OSF Review outlined most key items consistent with the response of City staff during the Ice Storm as it related to clearing downed trees and debris. During our review the City provided a revised review for this OSF which had more analysis and recommendations which was not in the initial review.

Are there any deficiencies with the City's review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- The City review of this OSF pointed to specific findings which seem to have identified gaps in the OSF but was not captured in the recommendations. This includes:
  - Observations from City staff that training was an apparent key part of their support to personnel responding to the emergency but there was no note in the recommendations around enhancing training requirements in the OSF.
  - Observations from City staff that private contractors were used in response to the Ice Storm but there was no note in the recommendations around exploring formal contracts in advance of the need.
  - Observations from City staff that other municipalities and private contractors assisted but there was no note in the recommendations around exploring arrangements.

Are the recommendations proposed reasonable and consistent with the City’s intent to improve the response to future emergency events?

- The recommendation was reasonable and supports the overall objective of enhancing the City’s emergency response effectiveness and efficiency by clarifying potential duplications in responsibilities during future emergencies.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

- We recommend the City consider making specific recommendations around training, private contractor utilization and enhanced municipality arrangements as noted above.
**Emergency Donations Management OSF Review**

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- Feedback was provided from key stakeholders identified in the OSF including 311 and Strategic Communications.

- This OSF Review provided a good overview of the response of City staff during the Ice Storm as it related to handling unsolicited donations.

Are there any deficiencies with the City's review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- We note in the City’s review that a positive observation made was related to a private company’s willingness to provide assets that could be utilized should the need arise. There is an opportunity for the City to assess needs and reach out to corporate partners to have existing arrangements in place to support emergency response efforts. This was not recommended in this OSF Review. There is an opportunity for the City to take a positive finding and recommend a broader recommendation to improve the emergency response capability.

Are the recommendations proposed reasonable and consistent with the City’s intent to improve the response to future emergency events?

- The consistent finding in this OSF review was a need to formalize process around responding to unsolicited donation offering. The need to address this was noted in the OSF Review.

- The recommendations in the City’s Review recommend more work around communicating with the public and staff around unsolicited donations.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

- We recommend the City consider proactively develop and implement a public awareness campaign before an emergency event occurs to explain the City’s policy and approach towards donations.
Emergency Human Services OSF Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The Emergency Human Services Review was based on a qualitative survey involving 12 City Divisions, Boards and Commissions and data from supporting Divisions. The stakeholders consulted had consistent direction.

- Detailed information was accounted for in this OSF Review and provided useful context and response statistics.

Are there any deficiencies with the City’s review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- City Staff indicated that the recommendations were prioritized. The criterion for prioritization was not clear in the OSF Review but Staff indicated that higher priority recommendations were based on prevalence of stakeholder feedback. Commonality of feedback to base recommendations can be useful when considering program support. This however may not address higher risk scenarios relating to OSF compliance.

- During our review the City provided clarity on the recommendations from the original OSF Review. This clarification linked recommendations to weaknesses observed by City staff. An observation made by the City in their review of this OSF was that the communication between the Emergency Operations Centre was “irregular”. This should be explored in more detail to clarify needs and expectations. It could also be added to the City’s recommendation around strengthening communication mechanisms between Cluster A management and OEM.

Are the recommendations proposed reasonable and consistent with the City’s intent to improve the response to future emergency events?

- There were several recommendations made that linked to the OSF and supporting SOPs. A clear prioritization criterion would help City officials to make decisions based on a prioritized approach.

- Recommendations are comprehensive and aim at enhancing the City’s ability to better respond to future emergencies. This includes formalizing partner agreements, vulnerable sector process and training enhancements and communication improvements between Cluster A and OEM.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We recommend to the City consider:

- Clarifying the need to strengthen communication procedures and practices between the OEM and field staff.

- Analyzing how the recommendations from the other OSFs, like Emergency Information and Media Relations, may impact the Emergency Human Services OSF.
Emergency Information and Media Relations OSF Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- City staff reviewed the Emergency Binder which is used by Strategic Communications Division as a supplementary, and more detailed, resource to this OSF.

- Stakeholders identified in the OSF were engaged directly as part of this OSF Review. The included a prime partner via 311. There were several engagements and discussions with the OEM as Strategic Communications is part of the Emergency Operations Centre as well.

- We have been informed during our review that staff from OEM and Strategic Communications work together closely and collaboratively on an ongoing basis. They worked together to provide information on multiple reviews including for this OSF Review as well as the After Action Report and Power Disruption Risk Specific Plan.

Are there any deficiencies with the City’s review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- This OSF review did not specifically consider the City’s communications with abutting municipalities who were also impacted by the Ice Storm. This analysis would be helpful to consider communication messaging and is in the current scope of this OSF.

- In some parts of this OSF Review there was limited information provided as part of the City’s analysis. As an example, the “Reception Centres” section notes that communications at reception centres was adequate but could be improved. Details of the strengths and weaknesses were not provided in this case.

- We learned from speaking to City’s Strategic Communications staff that a media relations analysis was completed where the City analyzed statistics around media and press releases. This was shared with us for our peer review. This document provided a detailed overview of the City’s media releases and media postings about the Ice Storm. The report noted that overall it was felt the media reports was accurate. It was not clear in this report where specifically the media reports reported non-factual information. A social media analysis was not part of the City’s media analysis nor was consideration of assessing the actual messages the City used to communicate to the public via their media releases.
Are the recommendations proposed reasonable and consistent with the City's intent to improve the response to future emergency events?

- This OSF Review did not originally list recommendations but instead noted the work that was initiated to enhance the communications for future emergencies. The City later provided draft recommendations as part of our review. They were succinct and included developing a new OSF relating to clarify the role of councillors and to enhance in the coordination and communication with councillors during an Emergency Operations Centre activation. This clarification could enhance the coordination and consistency of messages.

- The draft recommendations also suggested updating the current OSF and made emphasis around confirming social media accounts and clarifying the coordination of the City's social media accounts during an Emergency Operations Centre activation. The recommendation does not overly speak to standards or process around monitoring and responding to social media messages received by the City. This clarification could assist in accomplishing the goals of public understanding during emergencies.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We recommend to the City consider:

- Clearly articulate specific issues that were observed and develop a prioritized list of recommendations for the City to consider.

- Develop protocols for monitoring and responding to social media messages during an Emergency Operations Centre activation in order to improve the effectiveness of the City’s response to future emergency situations.

- Consider analyzing the messaging used to determine how this impacted perceptions and/or decision making from the public.

- Consider formally assessing the communications interface with abutting municipalities for reinforced and consistent messaging.


**Emergency Operations Centre OSF Review**

**Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?**

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- Supporting stakeholder feedback was not specifically requested by OEM for this OSF Review although stakeholders were engaged in the After Action Report which considered overall emergency response efforts.

**Are there any deficiencies with the City’s review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?**

- We observed that the City’s review provided limited insights into actual weaknesses or strengths of this OSF. This OSF provides details on authority and responsibilities which may be ambiguous. For example the OSF indicates that criteria for triggering an Emergency Operations Centre activation includes “operational efficiency” which is not defined. During our review OEM staff have told us that the After Action Report was the main driver for analysis and recommendations. Please refer to our detailed review of the After Action Report in this document.

**Are the recommendations proposed reasonable and consistent with the City’s intent to improve the**

- Six recommendations were made in this OSF Review but there was no indication of the prioritization criteria used to determine the order.

- We note that although limited analysis was noted in this OSF Review there were recommendation provided that intend to enhance the capability of the Emergency Operations Centre or future emergencies. The After Action Report considers this in more detail.

**Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?**

We recommend to the City consider:

- Engage existing stakeholders in the OSF document to determine if there are any other strengths, weaknesses or recommendations.

- Adding details on specific strengths and weaknesses observed for this review and articulate priority criteria in order to add and order recommendations.

- The recommendations from our After Action Report peer review are also relevant.
Traffic Management OSF Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- It was not clear whether supporting stakeholders were engaged for this OSF review.

- In addition to the OSF Review, Transportation Services also completed a response review which included detailed information about the actions of their department in response to the Ice Storm.

Are there any deficiencies with the City's review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- We observed in this OSF Review that there were limited details provided on weaknesses other than the difficulty noted around Toronto Police Services support role in managing intersections. There were neither strengths identified nor recommendations around this.

Are the recommendations proposed reasonable and consistent with the City’s intent to improve the response to future emergency events?

- This OSF Review noted that specific recommendations were made in the Transportation Services Response to the Ice Storm document. This document used an analytical framework used in July 2013. In relation to the Ice Storm response the analytical framework did not have results documented in the report we reviewed.

- The OSF also notes some specific recommendations for the Traffic Signal Sections where the support from the Toronto Police Service is noted. This supports an enhanced emergency response capability.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We note that this OSF Review included a recommendation for each OSF to include supporting documentation to assist with increasing understanding amongst supporting partners. We recommend the City consider having training and awareness sessions between departments that have interfacing OSFs before an emergency to prepare for response.
Volunteer Management OSF Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

- The City’s OSF Reviews were conducted in a consistent approach by the City Manager’s Office. Deputy City Managers were asked to provide a review considering if the City’s response met the objectives of this OSF, considering consistent and inconsistent actions relating to the OSF, analysis of the OSF strengths and weaknesses and recommendations for improvement.

- This OSF Review indicated that stakeholders identified in the OSF were engaged to participate in the review process. This included several City Divisions and the Canadian Red Cross.

- This OSF Review indicated that volunteer recruitment was not initiated. Feedback from the stakeholders engaged still was able to demonstrate opportunities for improvements and recommendations.

Are there any deficiencies with the City's review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

- Although this OSF was not fully utilized, the analysis pointed to clear strengths and weaknesses to help identify opportunities for emergency response improvements.

- This reviewed seemed to not consider the responsibilities for Divisions to identify or pre-determine specific skills required from volunteers. This presents a gap in recommendations around responsibilities in advance to the need during an emergency.

Are the recommendations proposed reasonable and consistent with the City's intent to improve the response to future emergency events?

- This OSF Review noted that specific recommendations were made relating to communication, training, Canadian Red Cross and existing community resources.

- The training recommendations suggest that training arrangements with an external training agency could assist during future events. Training arrangements and materials would be better served if they were pre-established in a prioritized approach before the need exists.

- A recommendation was made to consider apartment building owner, managers and staff to be a potential resource for volunteer support. There is no consideration made to commercial building owners or managers in this case which also may have the skills required to support in a future emergency.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We recommend to the City consider:

- Adding to the OSF the responsibility of all Divisions to identify and create an inventory of critical skill sets that are required to complete the goals of OSF specific responsibilities as well as continuity of operations needs.

- Developing training materials and arrangements with external providers in advance of the emergency.

- Including commercial building owners, managers and staff as a potential volunteer resource. Once an inventory of essential and critical skills are created there may be other partners or stakeholders identified to target volunteer recruitment efforts.
Power Disruption Risk Specific Plan Review

Has sufficient work been undertaken and information collected to support the conclusions of each review (i.e. actions consistent with policy, actions inconsistent with policy, relevant strengths and weaknesses of policy)?

• This Risk Specific Plan Review was conducted in a similar way as the OSF Reviews. In this case however it was the OEM who facilitated the review and asked stakeholders to consider if the response met the objectives of this OSF, were there consistent and inconsistent actions relating to the OSF, analyze the OSF strengths and weaknesses and make recommendations for improvement.

• The information noted in the Risk Specific Plan provided limited information on the details of the City’s actions relating to this plan. For example, the details accounts for December 20th and 21st, 2013 and not for the entire event.

Are there any deficiencies with the City's review? If so, what are the deficiencies and what is the potential impact of these deficiencies on the conclusions drawn or recommendations proposed?

• We noted that limited information is provided in this OSF to describe the observations and analysis in the review of this OSF. For example, it was noted in the review that communication linkages were established between OEM and Toronto Hydro but does not describe the nature of the linkages. It is possible that detailed observations of issues could help to identify more comprehensive recommendations.

Are the recommendations proposed reasonable and consistent with the City's intent to improve the response to future emergency events?

• Two clear recommendations were presented in the review of this Risk Specific Plan. There is no indication what was used to prioritize the recommendations however.

• A weakness was observed in this review relating to opportunities to better link Strategic Communications sections within this Risk Specific Plan. A recommendation around enhancing the Risk Specific Plan was not listed as a specific recommendation however.

• The first recommendation related to developing and implementing OEM’s mapping capability of the city’s population. The link to improving emergency response was not clear not did it appear to link to the analysis in the report.

Are there additional recommendations and/or best practices that the City should consider that would enhance its ability to respond to future emergencies?

We recommend to the City consider:

• Analyze the OSF and After Action Report Reviews to determine if there are any recommendations may impact this Risk Specific Plan Review.

• Amend the Risk Specific Plan in relation to enhancing the communication integration as noted in the report.

• Confirm that there were no inconsistencies in the City’s actions relating to this Risk Specific Plan. For example there may be an opportunity to clarify the “Considerations” section in the plan. This may be amended to consider other potential stakeholder support interfaces identified in the plan like Transportation.