




COMMUNICATION UPDATE

TO:	Mayor and Members City Council
DATE:	July 5, 2023
SUBJECT:	Hamilton City Hall Garage Structural Repairs (CFEM2307) (Ward 2)
WARD(S) AFFECTED:	Ward 2
SUBMITTED BY:	Indra Maharjan Director, Corporate Facilities & Energy Management Public Works Department
SIGNATURE:	

This Communication Update is to advise Members of Council and Hamilton City Hall staff of upcoming work to complete concrete repairs affecting the City Hall Garage. Work is expected to commence on July 10th, 2023 when the contractor will mobilize to the site, with contraction beginning the week of July 17th, 2023.

In 2018, Project staff from the Corporate Facilities & Energy Management (CFEM) Division engaged the services of a Structural Engineering consultant (Milman and Associates), to evaluate the structural integrity of the existing concrete structure (Garage) at Hamilton City Hall. The consultant recommended that required concrete repairs be undertaken at numerous locations of the structural elements in the Waste Management area and Clerks Storage area as well as the expansion joint that spans the upper parking lot. An existing HVAC unit in the Waste Management area will also be replaced.

A copy of the consultant's recommendation letter is attached as "Appendix A". The contents of the Structural Engineer's letter stipulate that the areas indicated on the drawings pose a health and safety risk to staff that work in the garage, of which, mitigation measures were undertaken pending future construction/repairs outlined below. Additionally, "Appendix B" includes the drawings and specifications showing the required structural repairs, which have been issued to the General Contractor (SST Group) to undertake the repair work. SST Group is a pre-qualified General Contractor, with experience in completing similar concrete repair and remediation work and are available to mobilize immediately.

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OUR Culture: Collective Ownership, Steadfast Integrity, Courageous Change, Sensational Service, Engaged Empowered Employees.

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In order to address the required repairs at the City Hall Garage, staff have taken the following actions:

- CFEM engaged the services of a consultant to complete a structural report in 2018, regarding the deterioration of the concrete at City Hall Garage;
- The recommendations from the structural consultant at that time, lead to the formation of temporary steel supports, under the expansion joint in the lower staff parking area of the garage. This was a temporary repair until funding was available for the appropriate concrete rehabilitation;
- CFEM along with procurement partners issued a pre-qualification to construction companies that are subject matter experts in the concrete/parking garage/ rehabilitation field. SST Group was our successful candidate;
- The repair work is anticipated to commence immediately once the schedule and phasing plan submitted by the contractor are approved. The repair work will be completed by Q1 2024. Further updates will be provided throughout the project;
- There will be noise and vibrations from the concrete repair work happening within the garage and upper parking lot area;
- During the summer months there may be some parking stalls on the upper level parking that will be unavailable, while the contractors are working in that area. Updates will be provided related to the parking areas that will be impacted in each phase. Standard construction hoarding will be erected for pedestrian safety;
- Staff will keep Members of Council and City Hall staff apprised as construction progresses related to any operational impacts.

At this time, the construction is not expected to impact access for staff or City Hall visitors. The work will be phased in order to minimize disruptions to daily operations.

If you require any further information on the above matter, please contact Kelly McKay, Project Coordinator at Kelly.McKay@hamilton.ca or at (905) 546-2424 Ext. 7615.

APPENDICES AND SCHEDULES ATTACHED

Appendix “A” to CFEM2307: Milman & Associates Structural Consulting Engineers Report (pages 1 to 3 only)

Structural Report



**City of Hamilton
City Hall Garage Roof Slab
Structural Review**

MAL# 218062

Final Report

August 8, 2018

Prepared for:

City of Hamilton



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Appendix A – Site Photographs

Appendix B – Repair Cost Estimate

Appendix C – Temporary Repair Sketches

Executive Summary:

1. The City of Hamilton (the City) has retained Milman & Associates Limited to perform a preliminary structural condition assessment of the existing City Hall Garage roof structure at 71 Main Street West, Hamilton, ON. The roof structure is currently being used as a public parking lot.
2. The structural review was limited to the roof structure above the Clerk's Central Records Room, the Ex Covered Storage Area, the Ex Shelled Space and the Maintenance Bay.
3. Concrete deterioration was observed at several locations. The most severely-deteriorated items were the concrete beams that support the expansion joint above the Ex Covered Storage and the Maintenance Bay, and the columns that support these beams.
4. Typical concrete deterioration included cracks, spalls, delamination, corroded reinforcement, and alkali-aggregate reaction. The deterioration has resulted in water penetration into the building.
5. Recommendations:
 1. Temporary shoring should be installed near the deteriorated structure that supports the expansion joint as soon as possible. Sketches for temporary shoring are included in Appendix C of this report.
 2. The deteriorated beams and columns at the expansion joint should be repaired before December of 2018.
 3. It is recommended to repair the remaining items identified in this report at the same time. If they are left unrepaired, the structure will continue to deteriorate, which may lead to a loss of structural integrity.
 4. All repairs should be designed by a Professional Engineer licensed in the province of Ontario.
6. Repair Cost Estimates:
 1. The estimated cost for the temporary repairs as per sketches SK-0 to SK-5 (Appendix C) is in the order of \$44,200.00 + HST.
 2. The estimated cost for the long-term repairs is in the order of \$891,960.00 + HST.