

HAMILTON WENTWORTH DISTRICT SCHOOL BOARD LIAISON COMMITTEE

April 3, 2025

Analysis of Hamilton Schools with Adequate HVAC Systems

Submitted By: Sheryl Robinson Petrazzini, Director of Education

Prepared By: Matthew Gerard, Associate Director, Business Services & Board Treasurer

David Anderson, Senior Manager, Facility Services

Recommendation:

That the report be received as information.

Background:

At the October 30, 2024, Hamilton-Wentworth District School Board (HWDSB) Liaison Committee meeting Committee members considered the *Analysis of Hamilton Schools with Adequate HVAC Systems* motion (attached as Appendix A). As a result, the Committee moved:

- (a) That the staff of Hamilton-Wentworth District School Board be directed to share a summary of their monitoring activity with a report back to the Hamilton-Wentworth District School Board Liaison Committee no later than Q1 2025; and
- (b) That staff of Hamilton-Wentworth District School Board staff collaborate with Public Health on the scope of the summary of monitoring activity.

Status:

Board staff met with representatives from the City of Hamilton (City) and Public Health (PH) in August 2024 and later in March 2025 to discuss the Committee request and share information. As a result, HWDSB staff are providing the following summary, by category:

- 1. HWDSB Heat Event Response.
- Percentage of Schools with cooling.
- 3. Monitoring of HVAC in schools.
- 4. Cooling going forward.

HWDSB Heat Event Response:

As identified on the Board's public-facing website, found here, HWDSB has a Procedure for heat events that shares what schools will do by way of monitoring both temperature and humidity through a board-supplied hygrometer. Additionally, the Procedure shares that the Principal may provide the class with rotating access to cool, shaded work areas in the building if practical and safe to do so, or close or relocate the class to an alternate space (refer to Appendix B).

Percentage of Schools with Cooling:

All HWDSB schools have some form of cooling, and as spaces are renovated that percentage continues to increase. As of March 2025, 54 of the 93 schools have 85% (or greater) of their space cooled, with the breakdown of percentages as follows:

- 46 schools have 100%
- 6 have 95%
- 1 has 90%
- 1 has 85%
- 1 has 70%
- 4 have 50%
- 2 have 40%
- 3 have 35%
- 1 has 30%
- 2 have 25%
- 7 have 20%
- 11 have 15%
- 8 have 10% or less

Monitoring of HVAC in schools:

All HWDSB schools are equipped with a Building Automation Systems (BAS) designed to regulate and monitor critical building functions. In some instances, the BAS will ensure optimal performance, energy efficiency, and occupant comfort. Utilizing various sensors (thermostats), the BAS has the ability to adjust heating, ventilation, and air conditioning (where provided) to maintain desired temperature setpoints throughout the facilities. The system provides real-time alarm notifications for any operational anomalies or deviations from normal parameters, enabling remote diagnostics and prompt maintenance to minimize operational impacts.

Cooling going forward:

The Board is committed to continuously enhancing air conditioning capacity through ongoing upgrades, system replacements, and facility renovations, ensuring improved climate control across our schools. The Board relies on Facility Condition Index (FCI) data provided by the Ministry of Education, through a third party, when developing retrofit projects that also considers

infrastructure improvement requirements. The HWDSB leverages both School Renewal Allocation and School Condition Improvement funding when supporting this work.

Financial Implications:

At this time, there are no financial implications as a result of this report.

Strategic Directions:

Building a Sustainable Education System

We will adapt to a rapidly changing world through responsible fiscal management, investing equitably in accessible and sustainable facilities, and supporting a robust workforce.



City of Hamilton Hamilton City Hall 71 Main Street West, 1st Floor Hamilton, Ontario Canada L8P 4Y5 www.hamilton.ca Matt Gauthier Legislative Coordinator Office of the City Clerk Matt.Gauthier@Hamilton.ca

October 10, 2024

Subject: Analysis of Hamilton Schools with Adequate HVAC Systems

Hello,

At its meeting of September 30, 2024, the Public Health Committee referred the following Motion respecting an Analysis of Hamilton Schools with Adequate HVAC Systems and requested feedback from the Hamilton-Wentworth District School Board Liaison Committee, Hamilton-Wentworth Catholic District School Board Liaison Committee, and other local school boards:

Analysis of Hamilton Schools with Adequate HVAC Systems

WHEREAS, Hamilton experienced an extended heat warning that lasted six days (June 17-22) during the school year of 2023-2024;

WHEREAS, to date Hamilton has experienced three heat warning and/or extended heat warning events totaling 8 days (post June 22, 2024) during the 2024 secondary school summer session;

WHEREAS, anecdotally, several classrooms across the City of Hamilton failed to have adequate heating, ventilation, and air conditioning (HVAC) systems during the heat waves; and

WHEREAS, anecdotally, many children suffered heat exhaustion and other heat related illnesses that also prevented their attendance at school.

THEREFORE, BE IT RESOLVED:

That Public Health staff be directed to work with the local school boards to determine their capacity to provide Hamilton schools with adequate heating, ventilation, and air conditioning (HVAC) systems to address air quality and room temperature concerns.

Please review the Motion and forward any feedback that you may have to Matt.Gauthier@Hamilton.ca by December 13, 2024. After this date, all feedback received will be placed on the agenda of the next Public Health Committee for the Committee's review when considering this Motion.

Respectfully,

Matt Gauthier Legislative Coordinator Office of the City Clerk



BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

RATIONALE:

Hamilton-Wentworth District School Board is committed to ensuring the safety and well-being of all students and employees. Therefore, inclement weather, extreme temperature, emergency condition, safe schools emergency or a City of Hamilton emergency may occasionally result in the delay or cancellation of transportation services and/or the closure of schools.

HWDSB strives to ensure that all schools and workplaces are open every instructional/operational day to meet the needs of students and of the community.

TERMINOLOGY:

City of Hamilton Emergency: Any situation within the city limits of Hamilton where the City of Hamilton has officially invoked its Emergency Plan.

Cold Alert: The Medical Officer of Health for the City of Hamilton issues a Cold Alert when outdoor temperatures are at or below -15 degrees Celsius, or -20 degrees Celsius with the wind chill. HWDSB asks principals to keep students and employees inside when a Cold Alert has been issued.

Emergency Condition: A breakdown in essential services, such as, but not limited to hydro, heat and/or water, or other conditions whereby the safety of students, employees and other building occupants would be compromised.

Executive Council: The executive employee team of HWDSB.

Extreme Temperature: Weather that does not warrant the declaration of an inclement weather day. Extreme weather includes but is not limited to extreme cold weather with wind chill or extreme hot weather with high humidex.

Heat Alert: Notification given by the City of Hamilton's Heat Warning and Information System (HWIS) for a heat event. The two levels of heat response and their triggers are:

- Heat Warning two or more consecutive days forecasted with daytime highs greater than or equal to 31°C and nighttime lows greater than or equal to 20°C or two or more consecutive days with a Humidex of 40°C or greater.
- Extended Heat Warning three or more consecutive days observed with daytime highs greater than or equal to 31°C and nighttime lows greater than or equal to 20°C or three or more consecutive days with a Humidex of 40°C or greater.

Updated: March 2025 Page 1 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

Humidex: The term "humidex" is short for humidity index. Humidex is an equivalent scale intended for the public to express the combined effects of warm temperatures and humidity. Environment Canada uses humidex ratings to inform the general public when conditions of heat and humidity are possibly uncomfortable.

Inclement Weather: Where road or weather conditions make it dangerous to operate a school bus or private vehicle safely.

Prolonged: An interruption of service that is confirmed to be so long that, in the judgment of the Director of Education or designate, school and/or board operations cannot continue safely.

Safe Schools Emergency: A situation where the safety of students and employees is at risk because of a serious violent threat or violent incident that is ongoing. Police Services are informed of all safe schools emergencies consistent with the police/school board protocol. A safe schools emergency can lead to a Secure Schools response.

Secure Schools Response: The Secure Schools Protocol outlines response requirements in the event of a serious violent threat or violent incident that would endanger the lives of employees or students (Lockdown), an external threat not related to schools (Hold and Secure) or environmental threats outside of the school (Shelter in Place).

PROCEDURES:

- 1.0 Cancellation of Transportation and All School and Board Operations Before the Commencement of the School Day.
 - 1.1 Inclement Weather Conditions
 - 1.1.1 If HWDSB experiences inclement weather, the General Manager of the Hamilton-Wentworth Student Transportation System will advise the Director of Education or designate of the road conditions and weather conditions.
 - 1.1.2 The Director of Education or designate will then decide whether to cancel all school and Board operations.
 - 1.1.3 If the conditions are determined to be unsafe and transportation is cancelled, the Director of Education or designate will then inform Executive Council, the Manager of Communications and Community Engagement and the General Manager of Hamilton- Wentworth Student Transportation System of the cancellation of all school and Board operations.
 - 1.1.4 Communications will immediately inform the community through an automated message to families, Board and school website posts, social media channels and contact through media outlets. Communications will notify employees through an all-staff email.

Updated: March 2025 Page 2 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

- 1.1.5 The Director or designate will make every effort to cancel all school and Board operations by 6:00 a.m.
- 1.2 Emergency in the City of Hamilton or Prolonged Hydro Interruption
 - 1.2.1 If the City of Hamilton declares a city-wide emergency, or if there is an anticipated prolonged interruption of hydro services, the Director of Education or designate will consider whether to cancel all Board and school operations. If the decision is made to cancel, they will inform Executive Council, the Manager of Communications and Community Engagement and the General Manager of Hamilton-Wentworth Student Transportation System of the cancellation of all school and Board operations.
 - 1.2.2 Communications will immediately inform the community through an automated message to families, Board and school website posts, social media channels and contact through media outlets. Communications will notify employees through an all-staff email.
 - 1.2.3 The Director or designate will make every effort to cancel all school and Board operations by 6:00 a.m. where possible.
- 1.3 The Board will suspend the Student Attendance and Safe Arrival Policy when school operations have been cancelled.

2.0 Cancellation of Transportation Due to Extreme Cold Temperatures

- 2.1 If the temperature reaches extreme cold, the General Manager of the Hamilton-Wentworth Student Transportation System will advise the Director of Education or designate of the status of the bus fleet.
- 2.2 The Director of Education or designate will then decide whether to cancel all school and Board operations or only transportation.
- 2.3 The Director of Education or designate will then inform the Manager of Communications and Community Engagement and the General Manager of Hamilton-Wentworth Student Transportation System of the decision.
- 2.4 Communications will immediately inform the community through an automated message to families, Board and school website posts, social media channels and contact through media outlets. Communications will notify employees through an all-staff email.
- 2.5 The Director or designate will make every effort to cancel all school and Board operations or transportation by 6:00 a.m.

Updated: March 2025 Page 3 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

3.0 Cancellation of Individual School or Board Operations Before the Commencement of the School Day

- 3.1 Communication in the Event of Individual School or Board Cancellation of Operations
 - 3.1.1 The superintendent will inform the Director of Education or designate of any condition or situation in an individual school that might lead to potential closure. The Director or designate will decide whether to cancel operations at the school or facility.
 - 3.1.2 The Director of Education or designate will notify the superintendent who will notify the principal, manager or supervisor of the decision.
 - 3.1.3 In the event that the superintendent notifies a principal to cancel school operations, the superintendent will follow the School Emergency Response Flow Chart and inform the General Manager of Hamilton-Wentworth Student Transportation System, the Manager of Communications and Community Engagement and the Manager of Early Learning and Childcare.
 - 3.1.4 Communications will inform the community immediately through an automated message to families, Board and school website posts and through social media channels. The principal will notify school employees through an email of the cancellation and their work location for the day.
 - 3.1.5 The Director of Education or designate will make every effort to cancel all school and Board operations by 6:00 a.m.
 - 3.1.6 Childcare centres that open before the beginning of the school day will remain open until all the children have been picked up and then they will close.
- 3.2 Loss of Power and/or Water
 - 3.2.1 Principals, managers or supervisors will inform the superintendent and Facilities Operations Supervisor of the loss of power and/or water.
 - 3.2.2 Facilities Management will contact the appropriate utility company to attempt to determine the length of time that will be required to remedy the problem.
 - 3.2.3 The superintendent will advise the Director of Education or designate who will decide whether to cancel individual school or Board operations.

Updated: March 2025 Page 4 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

3.3 Gas Leak

- 3.3.1 Upon suspecting a gas leak, principals, managers or supervisors will ensure that all students, employees and visitors have evacuated the building and will call 911 and ask for Fire Department assistance. Schools will follow their evacuation plan.
- 3.3.2 Principals, managers or supervisors will follow the School Emergency Response Flow Chart to inform superintendents and other employees of the suspected gas leak and the evacuation.
- 3.3.3 Facilities Management will contact the appropriate utility company to conduct an inspection or test to determine the length of time that will be required to remedy the problem.
- 3.3.4 The superintendent will advise the Director of Education or designate who will decide whether to cancel individual school or Board operations.

3.4 Localized City of Hamilton Emergency

- 3.4.1 In the event that the City of Hamilton declares an emergency in a localized area within the district, the principal or manager of any affected facility will follow the School Emergency Response Flow Chart to inform superintendents and other employees of the emergency.
- 3.4.2 The superintendent will inform the Director of Education or designate who will decide whether to cancel individual school or Board operations.

3.5 Heat Alert

- 3.5.1 When the City of Hamilton declares a Heat Alert, all employees will follow the Occupational Health and Safety guidelines for working during a heat event.
- 3.5.2 It is unlikely the Director of Education or designate will close a school to in-person learning before the commencement of the school day during a Heat Alert, since temperatures usually peak in the early afternoon.
- 3.5.3 Refer to Section 5.2 for more information about Heat Alerts and potential classroom closures during the school day.

3.6 Safe Schools Emergency

- 3.6.1 In the event that there is a safe schools emergency, the principal will follow the School Emergency Response Flow Chart to inform the superintendent. The principal will follow the Secure Schools Protocol as needed.
- 3.6.2 The superintendent will inform the Director of Education or designate who will decide whether to cancel operations at the school.

Updated: March 2025 Page 5 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

3.7 The Director or designate will make every effort to cancel individual school operations by 6:00 a.m.

4.0 Cancellation of All School and Board Operations After the Commencement of the School Day

4.1 General Process

- 4.1.1 Once school operations commence, every effort will be made to dismiss students at their normal dismissal time.
- 4.1.2 If there is a decision to cancel school and Board operations before student dismissal time, the Director of Education or designate will make every effort to cancel by 11:00 a.m.
- 4.1.3 If it is necessary to cancel school and Board operations, including rental permits, after 6:00 p.m., the Director of Education or designate will make every effort to do so by 4:00 p.m.
- 4.1.4 In some cases, after-school activities or rental permits may be cancelled even though students are not dismissed early, e.g., worsening weather conditions. The Director of Education or designate will make every effort to cancel after-school activities or rental permits by 1:00 p.m. and earlier if possible.
- 4.1.5 The Director of Education or designate will inform Executive Council, the Manager of Communications and Community Engagement and the General Manager of Hamilton- Wentworth Student Transportation System of the cancellation of all school and Board operations.
- 4.1.6 Communications will immediately inform the community through an automated message to families, Board and school website posts and through social media channels. Communications will also notify employees through an all-staff email.
- 4.1.7 The principal will inform employees and students. The principal will implement the School Cancellation Student Contingency Plan.
- 4.1.8 The principal and an adequate number of school employees, including caretaking employees, will remain at school for student safety, to ensure the security of the building and until reasonably assured that all students have had an opportunity to arrive home safely.
- 4.1.9 Childcare centres will remain open until all the children have been picked up and then they will close. Caretaking employees will remain to ensure the security of the building.

Updated: March 2025 Page 6 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

- 4.2 Severe/Worsening Weather Conditions, Prolonged Hydro Interruption, or City of Hamilton Emergency During the School Day
 - 4.2.1 Severe/worsening weather, a prolonged hydro interruption across the district or a City of Hamilton emergency may result in a recommendation to cancel all school and Board operations and to dispatch transportation services to schools across the entire district.
 - 4.2.2 If conditions are determined to be unsafe, the Director of Education or designate will decide whether to cancel all school and Board operations.
 - 4.2.3 In some cases, after-school activities or rental permits may be cancelled even though students are not dismissed early. The director or designate will make every effort to cancel after-school activities or rental permits by 4:00 p.m.

5.0 Cancellation of Individual School or Individual Board Operations After the Commencement of the School Day

- 5.1 Cancellation of individual school or Board operations after the school or workday has begun will follow the same processes as above with the following additions.
- 5.2 Heat Alert During the School Day
 - 5.2.1 When the City of Hamilton declares a Heat Alert, all employees will follow the Occupational Health and Safety guidelines for working during a heat event.
 - 5.2.2 The principal or designate will monitor indoor temperatures in degrees Celsius with Humidex in all classrooms and learning spaces as measured by a board provided and installed device in each learning space. For learning spaces that are equipped with air conditioning, if temperatures do not remain constant and continue to rise, the principal will contact the Facilities Operations Supervisor who will address the concern related to air conditioning. The steps below will be followed if the mechanical systems for air conditioning cannot be rectified quickly and for learning spaces without air conditioning.
 - 5.2.3 Beginning at a reading of 40 degrees Celsius with Humidex in learning spaces, principals will share information or instruction with employees including:
 - 5.2.3.1 Schedule strenuous activities to be done during cooler times of the day.
 - 5.2.3.2 Ensure there is a board provided portable fan in the learning space.
 - 5.2.3.3 Limit physical activities in the learning space.
 - 5.2.3.4 Ensure all students have easy access to water and are reminded to stay hydrated.

Updated: March 2025 Page 7 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

- 5.2.3.5 Provide the class with rotating access to cool, shaded work areas in the building if practical and safe to do so.
- 5.2.3.6 Review any existing Plans for Care for students with conditions that may be exacerbated by increased temperatures with Humidex.
- 5.2.4 If indoor temperatures with Humidex increase beyond 45 degrees Celsius with Humidex, as measured by a board provided and installed device in each learning space and classroom, the principal will close the classroom to learning, move the class to another learning space and inform the superintendent. If classes cannot be accommodated elsewhere on school premises, the superintendent will inform the Director of Education or designate who will decide whether to cancel learning and close classrooms at the school.
- 5.2.5 The Director of Education or designate will notify the superintendent who will notify the principal of the decision.
- 5.2.6 In the event that the superintendent notifies a principal to cancel learning and close classrooms, the superintendent will follow the School Emergency Response Flow Chart and inform the General Manager of Hamilton-Wentworth Student Transportation System, the Manager of Communications and Community Engagement and the Manager of Early Learning and Childcare.
- 5.2.7 In the event that learning is cancelled and classrooms closed, all school employees will be provided instruction from their supervisor for the rest of the workday in accordance with Occupational Health and Safety Guidelines for Working During a Heat Event.
- 5.2.8 Communications will inform the community immediately through an automated message to families, Board and school website posts and through social media channels.
- 5.3 Localized City of Hamilton Emergency During the School Day
 - 5.3.1 If the City of Hamilton declares an emergency in a localized area within the district, affected principals or managers must follow the School Emergency Response Flow Chart to inform superintendents and other employees of the emergency.
 - 5.3.2 The superintendent will inform the Director of Education or designate who will decide whether to cancel operations at the school or facility.
- 5.4 The Director or designate will make every effort to cancel school or Board operations by 1:00 p.m. or earlier if possible.

Updated: March 2025 Page 8 of 9

BOARD AND SCHOOL CANCELLATION OF OPERATIONS PROCEDURE

- 5.5 The principal will implement the School Cancellation Student Contingency Plan in the event that the superintendent notifies the principal to cancel school operations after the school day has begun.
- 5.6 The principal and an adequate number of school employees, including caretaking, will remain at school for the safety of students, to ensure the security of the building and until reasonably assured that all students have had an opportunity to arrive home safely.

6.0 School Cancellation Student Contingency Plan

- 6.1 It is the duty of the principal to prepare, by the end of September each year, a School Cancellation Student Contingency Plan that will provide for the care and safety of students.
- 6.2 The plan should include procedures for an emergency early dismissal and any other issues that would need to be addressed including a school communication plan for parents/guardians/caregivers.
- 6.3 Parents/guardians/caregivers are to provide a current and updated phone number, email and home address in the student information system.
- 6.4 By the end of September, and as new students enroll, the principal shall inform parents/guardians/caregivers in writing through School Messenger, about the School Cancellation Student Contingency Plan.
- 6.5 Principals will help keep parents/guardians/caregivers prepared for this situation by providing regular School Messenger updates about the contingency plan during the winter months.
- 6.6 The principal will provide the following statement to parents/guardians/caregivers:
 - 6.6.1 "It is a parent/guardian responsibility to decide whether it is safe for their child/ren to attend school. It is the responsibility of parents/guardians to arrange alternative plans if their child/ren cannot go home during an unscheduled school cancellation. The parent/guardian is expected to clearly explain the alternative to the child and to inform the school, in writing, of the alternative arrangements. Parents/guardians are requested to provide the school with any changes to these arrangements throughout the school year."
- 6.7 The plan will advise parents/guardians/caregivers to refer to the Board and school websites current information.

Updated: March 2025 Page 9 of 9