



BUILDING CODE COMMISSION

IN THE MATTER OF Subsection 24(1) of the *Building Code Act*, S.O. 1992, c. 23, as amended.

AND IN THE MATTER OF Sentence 9.8.8.1.(1) of the Regulation 403, as amended, (the Building Code).

AND IN THE MATTER OF an application by Roger Ball, EDB Financial Planners Inc., for resolution of a dispute with Ann Borooah, Chief Building Official, City of Toronto, to determine whether the 0.6 m wide stationary platform located at the rear of the garage, within which an automated platform operates, having been constructed without guards provides sufficiency of compliance with Sentence 9.8.8.1.(1) of the Building Code at 1840 Lakeshore Boulevard East, City of Toronto, Ontario.

APPLICANT	Roger E Ball EDB Financial Planners Inc Toronto, ON
RESPONDENT	Ann Borooah Chief Building Official City of Toronto
PANEL	Tony Chow, Chair Gerry Egberts Rick Florio
PLACE	Toronto, Ontario
DATE OF HEARING	June 22, 2006
DATE OF RULING	June 22, 2006
APPEARANCES	Roger Ball EDB Financial Planners Inc. Toronto, ON The Applicant Martin Elksnitis Building Inspector City of Toronto Designate for the Respondent

RULING

1. Particulars of Dispute

The Applicant has received an Order to Remedy Unsafe Building under the *Building Code Act, 1992*, to remedy certain alleged deficiencies at 1840 Lakeshore Boulevard East, City of Toronto, Ontario.

The subject building is a Group C residential dwelling. It is the garage of this residential dwelling that is the central location for the subject dispute. The garage is one storey in building height and has a 1.8 m deep “pit” below grade. The garage is approximately 20 m² in area and is comprised of combustible construction material.

The single car garage is equipped with a car elevating device which allows for occupants of the dwelling unit to park more than one vehicle within the garage. In the centre of the garage there is a below grade pit within which the automated platform operates and there is a stationary platform located at the rear of the garage. A car is driven into the garage and onto the automated platform. Occupants of the vehicle then exit the vehicle and proceed to the stationary platform located at the rear of the garage. Once the occupant is safely on the stationary platform, a key is used to activate the elevating device and the vehicle is lowered into the below grade pit. A second platform, located directly above the first platform, simultaneously lowers into place. Once the first platform has reached the bottom of the pit, the second platform is level with the garage floor and is available for a second car to be parked in the garage. When the platform is in motion and not level with the garage floor, there is a difference in elevation of more than 600 mm. In accordance with Sentence 9.8.8.1.(1) of the Building Code, where there is a difference in elevation of more than 600 mm between adjacent surfaces, every surface shall be protected by a guard.

The issue at dispute between the Applicant and the Respondent is whether a guard is required to protect the stationary platform located at the rear of the garage when the car elevating device is in motion.

2. Provisions of the Building Code in Dispute

9.8.8.1. Required Guards

- (1) Except for the edges of floor pits in *repair garages* and loading docks, every surface to which access is provided for other than maintenance purposes, including but not limited to exterior landings, porches, decks, balconies, *mezzanines*, galleries, raised *walkways* and roofs, shall be protected by a *guard* on each side which is not protected by a wall and where there is a difference in elevation to adjacent surfaces of more than 600 mm.

3. Applicant’s Position

The Applicant submitted that he believes, if a guard is required, the installation of the type of guard suggested by the municipality, creates difficulties with accessing the vehicles in the garage and the overall use of the garage. He referred to the pictures included in his submission and described the car elevating device as having two platforms which move up and down simultaneously. He informed the Commission that it takes approximately 45 seconds to elevate the platform from the below grade pit level to the level of the garage floor. In describing the daily use of the elevating device, he stated that the elevating device is used an average of three to

four times a day and therefore the platform is in motion approximately two to three minutes a day.

The Applicant agreed that safety may be a concern when the platform is in motion but maintained that the occupants of the dwelling unit are aware of the associated risks and understand how to operate the mechanism in a safe and responsible manner. He advised the Commission that a key is required to be turned and a button pushed in order to operate the elevating device. He further advised that the elevating device is prevented from operating when the overhead garage door is open and this feature, in essence acts as a guard for the laneway side of the garage.

The Applicant stated that once a car is parked in the garage there is very little space left to manoeuvre in that area. His initial position was that a guard should not be required and that the current situation complied with the intent of the Building Code. Alternatively, he submitted, if the Commission felt that the existing construction did not comply, he offered two options which he believed would be preferable to the solution dictated by the municipality. He described two options of providing compliance with the Code requirements while still maintaining the functionality of the garage. The first involved installing a moveable guard across the 0.6 m stationary platform located at the end of the garage. This moveable guard would be interlocked with the electrical system to prevent operation of the elevating device unless the guard is in position. The second proposal was to relocate the operating key switch to the outside of the garage and to interconnect the key switch with the electrical system. By interconnecting the key switch with the electrical system, the elevating device would be prevented from operating unless both doors to the garage are closed. When questioned as to which option would be his preference, the Applicant responded that he would prefer to relocate the spring-loaded key switch.

The Applicant summed up his position by stating that he believes his proposal adequately addresses the life safety concerns of Sentence 9.8.8.1.(1) of the Building Code while still maintaining the functionality of the design and intended use of the elevating device and the garage.

4. Respondent's Position

The Respondent submitted that an Order to Remedy Unsafe Building was issued to the Applicant in January 2006. The Order indicated that, pursuant to Sentence 9.8.8.1.(1) of the Building Code, guards were required to be provided within the single car garage. He stated that when the car elevating device is not level with the garage floor, the difference in elevation is greater than 600 mm, therefore, in his opinion, a guard is required on the sides of the pit to prevent injury from falls.

The Respondent indicated that the Building Code does not specifically speak to car elevating devices such as is installed in the Applicant's garage. He further indicated that when the elevating platform is in motion and not level with the grade of the garage floor, there is a significant difference in elevation and therefore a guard is required. He advised the Commission that a code consultant firm had been contracted by the builder to develop a proposed guard system meeting the objective of Sentence 9.8.8.1.(1) of the Code. The Respondent stated that the Applicant has refused the installation of this guard to date and thus an Order was issued.

When questioned as to whether the municipality had considered the options proposed by the Applicant, the Respondent responded that his preference would be option number two involving the relocation of the key switch.

In summation, the Respondent reaffirmed that, since there is a difference in elevation of more than 600 mm between surfaces when the platforms are in motion, Sentence 9.8.8.1.(1) stipulates that a guard is required. He further stated that, since no guard is presently installed, compliance with the technical requirements of the Building Code has not been achieved.

5. Commission Ruling

It is the Decision of the Building Code Commission that the 0.6 m wide stationary platform located at the rear of the garage, within which an automated platform operates, having been constructed without guards provides sufficiency of compliance with Sentence 9.8.8.1.(1) of the Building Code at 1840 Lakeshore Boulevard East, City of Toronto, Ontario, on condition that:

- a) The spring-loaded key switch, which operates the automated platform, shall be relocated to the outside of the exterior wall of the garage on the hinge side of the swing door. Furthermore, the key switch shall be interconnected with the swing door as well as the overhead garage door, so as to prevent the elevating platform from being operated unless both doors are closed. The interconnected doors shall only be opened when one of the automated platforms is level with the stationary platform.

6. Reasons

- i) The requirements for guards as outlined in Sentence 9.8.8.1.(1) of the Building Code are based on the premise that, where there is a difference in elevation of 600 mm or more between two surfaces, the potential risk of injury in a fall is sufficient that there must be some kind of barrier to reduce the chances of such a fall. The relocation of the key switch and the interconnecting of the garage doors, so as to prevent the elevating platform from being operated unless the doors are closed will, in the opinion of the Commission, achieve sufficiency of compliance with the intent of the Code.
- ii) The interlocking of the key switch will prevent the elevating platform from being operated unless the doors are closed, thereby protecting persons from a fall during normal operation. The relocation of the key switch will make it impossible for the person operating the elevating platform to physically be in the garage while the elevating platform is in motion, thereby protecting the operating person from a fall. There is also a window in the swing door through which the person operating the elevating platform can view the interior of the garage to ensure that the overhead garage door is closed and that no one else is in the garage before operating the platform.
- iii) The difference in grade between the 0.6 m stationary platform and the "pit" level of the garage is only an issue when the elevating platform is in motion, as when the elevating platform is in place; both the stationary platform and the elevating platform are at the same level.

Dated at Toronto this **22nd** day in the month of **June** in the year **2006** for application number **2006-09**.

Tony Chow, Chair

Gerry Egberts

Rick Florio