

# CAMBRIDGE HISTORICAL COMMISSION

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Date: July 29, 2021

To: Members of the Historical Commission

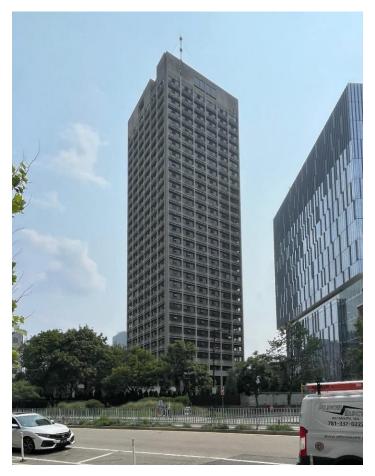
From: Eric Hill, Survey Director

Charles Sullivan, Executive Director

Re: D-1583: MIT Eastgate Tower - Building E55, 60 Wadsworth Street (1965)

An application to demolish Eastgate Tower at 60 Wadsworth Street on the corner of Main Street was submitted on July 13, 2021. The applicant, The Massachusetts Institute of Technology (MIT), was notified of an initial determination of significance and a public hearing was scheduled for August 5, 2021.

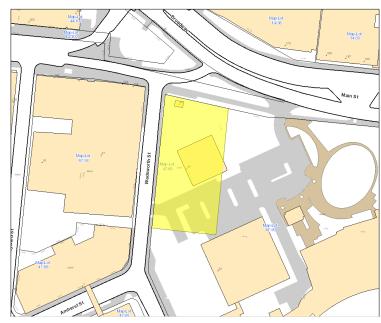
The demolition of Eastgate was anticipated in a 2015 agreement with the Institute by which the Commission agreed that it would not object to the demolition of E55 in recognition of MIT's commitment to restore 236 Main Street (E48), 264 Main Street (E37), and 292 Main Street (E38). The same agreement also established a protocol for staff review of alterations to MIT buildings on the National Register of Historic Places, similar to the CHC-Harvard University agreement of 1986. The parties to the 2015 agreement recognized that the Executive Director would find E55 "significant" under the demolition delay ordinance and that the Commission would consider finding the building "not preferably preserved" in the context of the overall Kendall Square development plan.



## Site

The Eastgate tower is located on the southeast corner of Main and Wadsworth streets. The building is southeast of Galaxy Park, a triangular park where Main and Broadway diverge. According to the Cambridge City-Viewer parcel map, the building spans two parcels, with most of the building footprint in parcel 47-85, and the eastern corner located in 47-90. Both parcels are owned by MIT.

Building E55 is sited parallel to Memorial Drive on a raised plaza at the corner of Wadsworth and Main streets. The high-rise tower is just east of the multi-building MIT SoMa projects, which are nearing completion. The building is north of the Hermann Building (E53) and the Sloan School of Management, both owned by MIT.



MIT Eastgate Apartment Tower, 60 Wadsworth Street. Cambridge CityViewer Map, 2021



2020 Aerial showing Eastgate (E55) at center

### Description

Eastgate (E55) is a 29-story reinforced concrete residential tower with 26 floors of apartments raised above three-story base. The building is square in plan, approximately 105'x105' with a flat roof. The three-story base consists of a ground-floor level clad in vertical concrete panels; a tall glazed second-floor level with cut-out corner bays and double-width center bays; and a third-floor level with concrete panel corner bays and horizontal window banks between wide concrete panels in four center bays. The upper 26 stories feature slender vertical piers and wide horizontal beams with rectangular cut-outs for windows that divide each elevation into six bays. The top story has wide band of concrete along the roofline. The fenestration of the top story varies on each elevation: the south elevation has large, paired windows flush with facade in each bay, while the east, north, and west elevations have different combinations of one or two recessed windows. One bay of the east elevation at the top story is cut out at the location of a rooftop lounge. A concrete headhouse is located on the roof with antennas above.



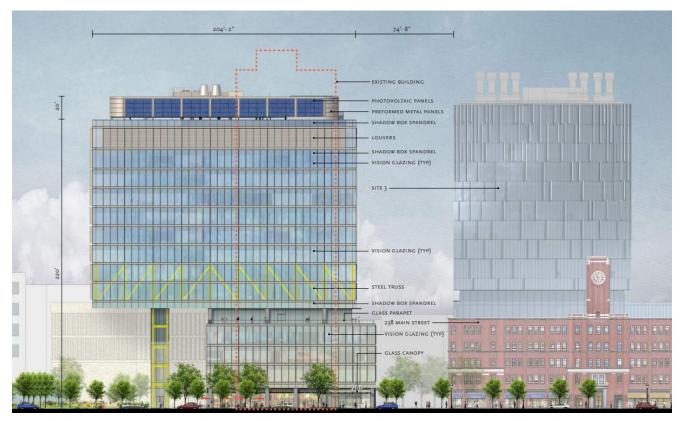
Eastgate during construction, August 1966. Image courtesy of MIT Museum.



The tower sits atop a raised plaza, which incorporates underground parking. A concrete retaining wall which runs along majority of the street edge contains the raised landscaping in the plaza. At the north yard, a grass lawn with trees and shrubs is bisected by a curvilinear path, which together provide a sizable setback of the tower from the street. At the Wadsworth Street façade, an aggregate concrete path connects the main entrance to the public sidewalk with steps and a ramp down to the door. A surface parking lot is located at the south side of the building between Eastgate and the Hermann Building, with access on both Main and Wadsworth streets.

Upper floors of Eastgate, facing east from roof of 238 Main St.

MIT is proposing to replace Eastgate with a new commercial laboratory building. The demolition will include all of Eastgate and adjacent hardscaping. The new building will be shorter than Eastgate but will contain more square footage as the floorplate will fill up more of the lot. The design by Elkus Manfredi Architects is intended to complement the new building behind 238 Main Street. The building will be comprised of two main rectangular blocks which are rotated 90 degrees with the top cantilevered over the mass below. While E55 was aligned to Memorial Drive, the new building will be aligned to Main Street.



Proposed replacement project (left) and adjacent 238 Main Street project (right). Note: Eastgate tower is shown in dotted red line.

#### History

The relocation of MIT from Boston's Back Bay to Cambridge in 1916 profoundly influenced the development of the land along the Charles River. MIT acquired its first Cambridge lands in 1912. The original campus property encompassed about 46 acres on the east side of Mass. Ave. between the railroad line along Vassar Street and the Charles River. The first Institute buildings completed in 1916 comprised of the Beaux-Arts Main Group, designed by William Welles Bosworth as an interconnected complex of academic buildings sited around the Great Court (now known as Killian Court) facing the river and Boston. Residential and industrial development on the surrounding lots remained slow through the 1920s. By 1924, the Institute had begun to outgrow its original Cambridge campus and started to acquire additional land on the west side of Massachusetts Avenue, later known as West Campus. Over the next 15 years, MIT added academic and dormitory buildings to the original campus and constructed student and athletic facilities on the new property. By 1940, it owned approximately 80 acres along the river with 20 educational buildings and laboratories, student housing, athletic fields, and a sailing pavilion.

The inter-war period at MIT saw the beginnings of a shift from the Classical architecture of Bosworth's original plan for the Institute to early Modernism. By the late 1930s, a few early Modern buildings had gone up on the MIT campus, all with purely industrial elements, including the original MIT Cyclotron, Building 44 (1938); the Wright Brothers Wind Tunnel, Building 17 (1939); and the Briggs Field House, W23 (1939, razed 2000). The transition to Modernism was slow, as the MIT Sailing Pavilion, Building 51 (1936) and the Rogers Building, Building 7 (1938) continued the Classical architecture of early MIT buildings.

During World War II, MIT operated in part as a national defense laboratory for research on subjects including radar, aeronautics, and high voltage. Temporary and permanent buildings were constructed within the project area during and immediately after the war. Other research facilities were built within the original campus complex and on vacant lots in the eastern part of the project area, where former industrial buildings had begun to deteriorate.

Institute buildings constructed in the 1940s and 1950s reflected a conscious shift from classicism to modernism. Some of the earliest buildings in Cambridge in the International Style include the Alumni Swimming Pool, Building 57 (1940) and the Radiation Laboratory, Building 24 (1941). After WWII, the Institute expanded on the International Style and hired MIT-trained architects at Anderson, Beckwith & Haible and Gordon Bunshaft of Skidmore, Owings & Merrill to design modern laboratory buildings with glass curtain walls and boxy forms, a gesture to the industrial character of the surrounding neighborhood.

By 1960, a new Campus Master Plan established ground rules for the future development of the campus. A fundraising drive called the Second Century Fund raised nearly \$100 million in the early 1960s, providing capital to acquire land, construct new buildings and renovate others.

In the 1960s, campus architecture shifted away from the sleek minimalist, glass and steel buildings in the International style and towards Brutalism, which was thought to compliment the tan limestone buildings from the Beaux-Arts era at MIT. Brutalist buildings constructed in the decade include McCormick Hall (1963), Vannevar Bush Building (1963) Green Building (1964), Stratton Student Center (1965), Dewey Library aka. Grover M. Hermann Building (1965), Eastgate (1967), Dreyfus Chemistry Building (1967), Vassar Street Buildings (1967), and more.

The term Brutalism was apparently coined by French architect Le Corbusier during the construction of Unité d'Habitation in Marseille, France, where he used the French term *béton brut*, literally "raw concrete" in English. The term spread widely after British architectural critic Reyner Banham used it in the title of his 1966 book, *The New Brutalism: Ethic or Aesthetic?* to characterize a recent cluster of new designs in Europe.

Béton brut became popular among modern architects, leading to the creation of the brutalist architecture style which thrived in the 1950s-1970's. Brutalism expresses one of the key premises of Modernism, that truth in architecture requires the raw expression of materials. The essence of the approach is seen in the imperfections of béton brut, which support an aesthetic based on the exposure of a building's components, including the frame, sheathing, and mechanical systems. The style took off in the United States for these reasons and especially due to its relatively low-cost in materials and rapid construction of either poured-in-place concrete or pre-cast components assembled on-site.

### Eastgate (Building E55)

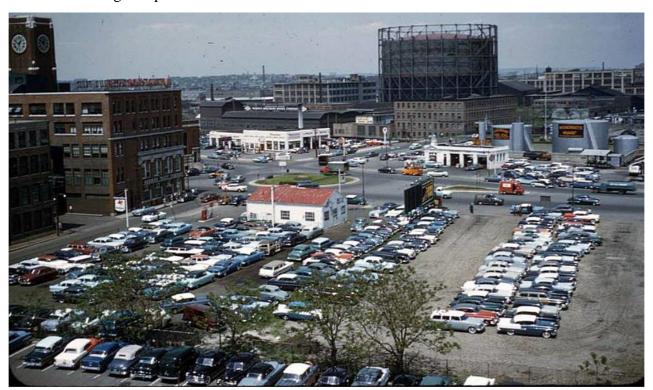
Eastgate was permitted in 1965 and opened two years later as a residence for married graduate students and faculty associated with the nearby School of Industrial Management (SIM, now known as the Sloan School of Management). In the early 20<sup>th</sup> century, the land around Eastgate was occupied by small wooden dwellings and a boiler works that backed up to the Charles River. A seawall constructed in 1892-96 allowed the expansion of filled land to the south. The construction of the present Longfellow Bridge (1900– 1906) and a subway down Main Street (1912) brought new commercial activities and factory construction to Kendall Square. After WWII, office and research buildings were constructed along Memorial Drive between Kendall Square and the MIT campus, includ-



1930 Bromley map showing Eastgate site before MIT expansion towards Kendall Square.

ing the corporate offices for Lever Brothers and the National Research Corporation.

By 1950, a gas station and parking lot occupied the corner of Wadsworth and Main streets. During this period MIT acquired several substantial buildings along Main Street and Memorial Drive. The School of Industrial Management, the School of Humanities, and the Faculty Club occupied the former Lever Brothers corporate office building, which was renamed after Alfred P. Sloan Jr. (1875–1966), an MIT alumnus and longtime president of General Motors.



Future site of Eastgate (foreground), ca. 1955.

Planning Board Collection, CHC

An internal planning process begun in response to the substantial increase in the number of students requiring housing during the post-World War II years and the tightening of the real estate market in Cambridge brought forth a plan for housing, a library, recreational facilities, and parking for the east campus area. The Institute asked Architecture Professor Eduardo F. Catalano to develop an overall design for the area around the Sloan Building (now known as the Morris and Sophie Chang Building).

Catalano's initial design consisted of two residential towers, a free-standing auditorium, and a library/academic building all connected to each other and the existing Sloan Building by a large plaza with underground parking. The four-story Grover M. Hermann Building (#E53, 1965) housing the Dewey Library and academic space was the first part of Catalano's plan to be realized. Construction on the first of the two planned towers (Building E55) began in January 1966, funded by the College Housing Loan Program of the federal Housing and Home Finance Agency, and was completed in August 1967. The second tower in Catalano's plan was never built.

When completed, Eastgate was the second-tallest building in Cambridge at 265 feet tall, just shy of the 277 foot tall Green Building. The cast-in-place concrete tower complimented the design of the low-rise Hermann Building, also designed by Catalano. The tower opened with 204 one- and two-bedroom efficiency apartments, with over 75% allocated to married students; the remaining units went to married faculty. The building was designed with conveniences for families, which included a laundry room and lounge at the top floor and a nursery space and playroom for children at the ground floor.



Image of final architectural model showing Eastgate (left) and Grover M. Hermann Building (right). Courtesy of MIT Museum.

#### Eduardo Catalano (1917-2010)

Eduardo Fernando Catalano was born in Buenos Aires, Argentina in 1917 and came to the United States on scholarships to both the University of Pennsylvania and Harvard. At Harvard's Graduate School of Design he was a student of Walter Gropius and Marcel Breuer, both masters of Modernist architecture. In 1945, after earning his second master's degree in architecture, he returned to Argentina, where he

taught at the University of Buenos Aires and ran a private practice. He taught at the Architectural Association in London from 1950 to 1951, when he came back to the United States to serve as a Professor of Architecture at the School of Design at North Carolina State University in Raleigh.<sup>1</sup>

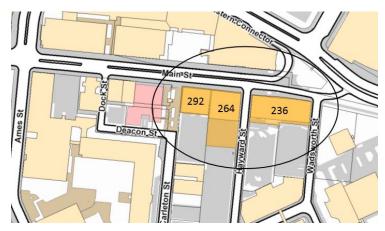
In 1956, Catalano accepted a professorship position at MIT after Pietro Belluschi, then Dean of Architecture requested that he join the growing program in Cambridge. During his time Catalano had an architecture practice in Central Square at 18 Pleasant Street, at the corner of Franklin Street. Catalano was said to have run a tight ship at his design offices in Cambridge, requiring his staff to use both sides of paper - even thin tracing paper - to save money.

Catalano retired from teaching in 1977 and received a certificate of recognition from MIT for his more than twenty years of service. In addition to holding emeritus status at MIT Catalano was also named an honorary professor at his alma mater, the Universidad de Buenos Aires. Catalano closed his architecture firm in 1995 but continued working in retirement. His last project was an 18-ton steel and aluminum sculpture of a flower known as Floralis Genérica that he created in 2002; located on the United Nations Plaza in his native Buenos Aires, the flower's huge petals open in the morning and close at night. Catalano passed away on January 28, 2010, in Cambridge and was buried in his native Argentina.

### Kendall Square Landmark Group and the MIT Protocol

Efforts to preserve several older buildings in Kendall Square began in October 2010 when MIT Real Estate (now MIT Investment Management Company, or MITIMCO) announced plans to raze the former Suffolk Engraving & Electrotyping Co. building at 292 Main Street (1920), a six-story reinforced concrete structure then occupied by The MIT Press. It soon developed that the former J.L. Hammett building, a two-story brick structure at 264 Main Street (1915) and the Kendall Square Building at 236 Main Street (1917, 1925) were also threatened with destruction, an act that would have destroyed the last significant early 20<sup>th</sup> century industrial structures in Kendall Square and erased the traditional streetscape of Main Street.

CHC and Community Development Department staff collaborated to seek preservation of these buildings, and on September 8, 2011 the Historical Commission voted to initiate a landmark designation study for the buildings at 236, 264, and 292 Main Street, protecting the Kendall Square Landmark Group from unauthorized alterations for a year while it formulated a recommendation to the City Council. The Commission voted to confirm the eligibility of the three properties for designation of the confirmation of the confirmation of the commission voted to confirmation the eligibility of the three properties for designation of the confirmation of the

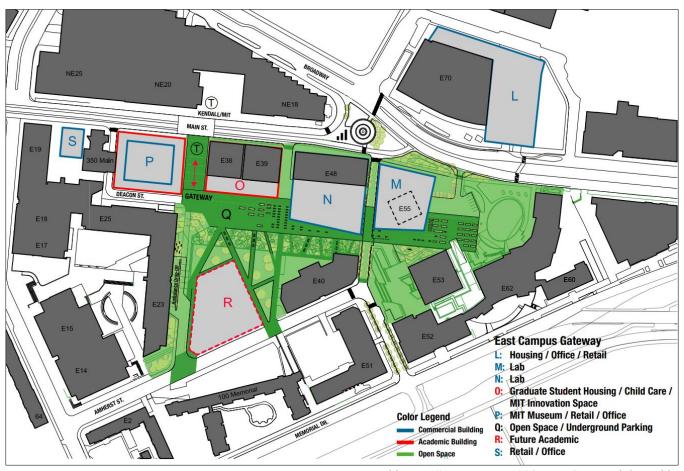


nation in July 2012. At the same time the Commission also accepted MIT's offer to extend the interim protections for 60 days beyond the expected end of the protection period in September 2012.

The Commission subsequently extended the protection period (with the owner's consent) for three more years to allow for resolution of the community planning process that MIT initiated in 2009. After five years of discussions with the city and the community and passage of a zoning package by the City

<sup>&</sup>lt;sup>1</sup> Catalano's 1954 house in Raleigh was notable for its hyperbolic roof. The home was publicized as the "House of the Decade" by *House and Home Magazine* in 1956. Although it was praised even by the egocentric Frank Lloyd Wright it was demolished in 2001.

Council in 2013, MIT announced in 2015 that it would retain all three buildings in conjunction with construction of six new residential and laboratory buildings in the vicinity. One of these buildings would replace Eastgate, which was not then fifty years old.



MIT's six-building Kendall Square Initiative of 2015, as amended. Building "N" incorporates 238 Main Street, while Building "O" rests above 264 and 292 Main Street. Building "M" occupies the site of Eastgate

In July 2015 the Commission accepted MIT's proposal to resolve the landmark designation process for the Kendall Square Landmark Group. This involved the establishment of a protocol that would delegate review of future alterations of the Landmark Group as well as all MIT-owned buildings listed on the National Register to CHC staff. As described in the attached staff memo of June 30, 2015 it was understood that demolition of Eastgate was an integral part of the six-building redevelopment plan that enabled restoration of the Kendall Square Landmark Group. The protocol document (also attached) incorporated the understanding that while Eastgate would be considered significant under the demolition delay ordinance it would not be found preferably preserved.



Kendall Square Landmark Group: Left to Right, 238 Main Street (under construction), 264 Main Street, and 292 Main Street. CHC Photo April 2021.

## Significance and Recommendation

We recommend that the Eastgate Tower (Building E55) at 60 Wadsworth Street be found significant for its architecture as an example of Brutalism constructed at MIT during the 1960s and as a design by Eduardo Catalano, a prominent Modernist architect with strong ties to Cambridge and MIT. We further recommend that it be found not preferably preserved in the context of the Kendall Square Initiative and the restoration of the Kendall Square Landmark Group.

cc: Emma Corbalan, MIT
Sarah Gallop, MIT
Ranjit Singanayagam, Inspectional Services, City of Cambridge.

## Sources

## CHC Survey File for Eastgate

- Glancey, Jonathan. "Eduardo Catalano Obituary." The Guardian, 15 Feb. 2010, <a href="www.theguardian.com/artanddesign/2010/feb/15/eduardo-catalano-obituary">www.theguardian.com/artanddesign/2010/feb/15/eduardo-catalano-obituary</a>.
- Meades, Jonathan (13 February 2014). "The incredible hulks: Jonathan Meades' A-Z of brutalism". The Guardian.
- "M.I.T. Builds 2nd High-Rise Apartment Tower" Jan. 6, 1966. Cambridge Chronicle
- "M.I.T. Married Student Tower Officially Opened Today" Nov. 30, 1967. Cambridge Chronicle.
- Public Archaeological Laboratory, Inc. <u>Catalog of Significant Structures 2016</u>, <u>Historic Inventory and Assessment Massachusetts Institute of Technology.</u> November 2016.

Reports to the President of MIT. Accessed from MIT Libraries, Digital collections.