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# APPLICATION FOR SPECIAL PERMIT

## 87 – 101 Cambridgepark Drive

### **Project Address:**

97 Cambridgepark Drive  
Cambridge, Massachusetts

### **Applicant:**

HCP | King 101 CPD LLC  
c/o King Street Properties  
800 Boylston Street | Suite 1570  
Cambridge, MA 02199

### **Date:**

October 4, 2019



# 101 CAMBRIDGEPARK DRIVE - SPECIAL PERMIT APPLICATION

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**101 CAMBRIDGEPARK DRIVE - SPECIAL PERMIT APPLICATION  
PROJECT TEAM**

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**OWNER | APPLICANT**

HCP | King 101 CPD LLC  
c/o King Street Properties, Inc.  
800 Boylston Street | Suite 1570  
Boston, MA 02199

**COUNSEL**

Adams & Rafferty  
907 Massachusetts Avenue  
Cambridge, MA 02139

**ARCHITECT**

DiMella Shaffer Associates, Inc.  
281 Summer Street  
Boston, MA 02110

**LANDSCAPE ARCHITECT**

Wagner Hodgson Landscape Architecture  
7 Marble Avenue  
Burlington, VT 05401

**CIVIL ENGINEER**

Highpoint Engineering, Inc.  
Canton Corporate Place  
45 Dan Road | Suite 140  
Canton, MA 02021

**TRANSPORTATION CONSULTANT**

Vanasse Hangen Brustlin, Inc.  
99 High Street | 10<sup>th</sup> Floor  
Boston, MA 02110

**SUSTAINABILITY | LEED CONSULTANT**

EnviEnergy Studio  
129 Newbury Street | 2<sup>nd</sup> Floor  
Boston, MA 02116



# APPLICATION FORMS

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD



CITY OF CAMBRIDGE, MASSACHUSETTS

# PLANNING BOARD

CITY HALL ANNEX, 344 BROADWAY, CAMBRIDGE, MA 02139

## SPECIAL PERMIT APPLICATION • COVER SHEET

In accordance with the requirements of the City of Cambridge Zoning Ordinance, the undersigned hereby petitions the Planning Board for one or more Special Permits for the premises indicated below.

Location of Premises: 87-101 Cambridgepark Drive

Zoning District: Office 2A/Alewife Overlay District (Triangle) 6

Applicant Name: HCP/King 101 CPD LLC

Applicant Address: c/o Adams & Rafferty, 907 Massachusetts Avenue, Cambridge MA

Contact Information: c/o 617.492.4100      c/o jrafferty@adamsrafferty.com

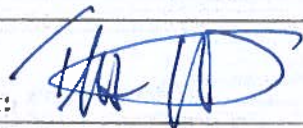
Telephone #                                      Email Address                                      Fax #

List all requested special permit(s) (with reference to zoning section numbers) below. *Note that the Applicant is responsible for seeking all necessary special permits for the project. A special permit cannot be granted if it is not specifically requested in the Application.*

- |           |  |
|-----------|--|
| 19.20     | Project Review Special Permit                        |
| 20.73     | Flood Plain Overlay District Special Permit          |
| 20.95.1.5 | FAR in excess of 1.25 for non-residential use        |
| 20.95.34  | Reduction of Yard Requirements (Front and Side Yard) |
| 20.95.2   | Height in excess of 55'                              |

List all submitted materials (include document titles and volume numbers where applicable) below.

Project Narrative; Dimensional Form; Ownership Certificate; Supporting Statement; Photographs; Survey; Site Plan; Building Elevations; Floor Plans; Landscape Plan; Flood Plain Certification; Sustainable Design Summary

Signature of Applicant: 

For the Planning Board, this application has been received by the Community Development Department (CDD) on the date specified below:

Date \_\_\_\_\_ Signature of CDD Staff \_\_\_\_\_

**DIMENSIONAL FORM**

**Project Address: 87/101 Cambridge Park Drive**

**Application Date: October 4, 2019**

	Existing	Allowed or required (max/min)	Proposed (101 CPD Only)	Proposed (Overall Site)	Permitted
Lot Area (sq ft)	132,745 sf	5,000 sf min	No change	No change	
Lot Width (ft)	316.52 ft	50 ft min	No change	No change	
Total Gross Floor Area (sq ft)	63,851 sf (87 CPD)	232,304 sf max (total 87&101)	141,834 sf	205,685 sf	
Residential Base	0	N/A	No change	No change	
Non-Residential Base	63,851 sf (87 CPD)	232,304 sf max (total 87&101)	141,834 sf	205,685 sf	
Inclusionary Housing Bonus	0	N/A	No change	No change	
Total Floor Area Ratio	0.48 (87 CPD)	1.25/1.5 max (O-2A) 1.75 max (AOD-6)	1.07	1.55	
Residential Base	0	N/A	No change	No change	
Non-Residential Base	0.48 (87 CPD)	N/A	1.07	1.55	
Inclusionary Housing Bonus	N/A	N/A	N/A	N/A	
Total Dwelling units	0	N/A	No change	No change	
Base Units	0	N/A	No change	No change	
Inclusionary Bonus Units	N/A	N/A	N/A	N/A	
Base Lot Area / Unit (sq ft)	N/A	N/A	N/A	N/A	
Total Lot Area / Unit (sq ft)	N/A	N/A	N/A	N/A	
Building Height(s) (ft)	28.1 ft (87 CPD)	60/70 max (O-2A) 85 max (AOD-6)	82 ft	28.1 ft (87 CPD) 82 ft (101 CPD)	
Front Yard Setback (ft)	229.0 ft (87 CPD)	65.8 (O-2A) 15 min (AOD-6)	15.1 ft (overhang)	229.0 ft (87 CPD) 15.1 ft (101 CPD)	
Side Yard Setback EAST (ft)	47.5 ft (87 CPD)	52.7 (O-2A) 10 min (AOD-6)	81.4 ft	47.5 ft (87 CPD) 81.4 ft (101 CPD)	
Side Yard Setback WEST (ft)	0.3 ft (87 CPD)	52.7 (O-2A) 10 min (AOD-6)	21.7 ft	0.3 ft (87 CPD) 21.7 ft (101 CPD)	
Rear Yard Setback (ft)	3.1 ft (87 CPD)	15 min (AOD-6)	74.6 ft (Bldg. to bldg.)	3.1 ft (87 CPD) 74.6 ft (101 CPD)	
Open Space (% of Lot Area)	36.2% (48,107 sf)	15% min	N/A	49,812 sf (37.5%)	
Private Open Space	N/A	N/A	N/A	N/A	
Permeable Open Space	28.5% (37,874 sf)	25% min	N/A	33,664 sf (25.4%)	
Other Open Space (Specify)	N/A	N/A	N/A	N/A	
Off-Street Parking Spaces	111 spaces (87 CPD)	Min 198 spaces Max 393 spaces (i)	143 spaces (ii)	254 spaces (iii)	
Long-Term Bicycle Parking	0 spaces	47 spaces (total 87&101) (iv)	48 spaces	64 spaces (v)	
Short-Term Bicycle Parking	6 spaces	15 spaces (total 87&101) (vi)	22 spaces	28 spaces (vii)	
Loading Bays	1 bay (87 CPD)	1 for 98 CPD + 2 for 101 CPD (per Cat. F)	2 bays	1 for 87 CPD + 2 for 101 CPD = 3 bays	

**Use space below and/or attached pages for additional notes:**

CITY OF CAMBRIDGE, MA • PLANNING BOARD • SPECIAL PERMIT APPLICATION



## DIMENSIONAL FORM FOOTNOTES

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(i) Off-Street Parking Requirements

Minimum Parking Required = 1 per 1,050 sf (Office/Lab) per §6.36.4f.  
1 per 700 sf (Retail) per §6.36.5a.2)  
= [202,985 sf x (1/1,050)] + [2,700 sf x (1/700)]  
= 194 + 4  
= 198 spaces

Maximum Parking Required = 1 per 525 sf (Office/Lab) per §6.36.4f.  
1 per 500 sf (Retail) per §6.36.5a.2)  
= [202,985 sf x (1/525)] + [2,700 sf x (1/500)]  
= 387 + 6  
= 393 spaces

(ii) Denotes total number of new parking spaces proposed for 101 Cambridgepark Drive building only, including surface and garage parking areas.

(iii) Denotes total parking proposed for both 101 Cambridgepark Drive and 87 Cambridgepark Drive, including surface and garage parking areas.

(iv) Long-Term Bicycle Parking Requirements

Minimum Parking Required = 0.1 per 1,000 sf (Retail) and 0.22 per 1,000 sf (Office/Lab) per §6.107.2

87 Cambridgepark Drive = 63,851 sf x (0.22/1,000)  
= 15 spaces

101 Cambridgepark Drive = [139,134 sf x (0.22/1,000)] + [2,700 sf x (0.1/1,000)]  
= 31 + 1 = 32 spaces

Total Required Long-Term  
Bicycle Parking = 15 + 32  
= 47 spaces

(v) Proposed Long-Term Bicycle Parking = 16 spaces (87 CPD) + 48 spaces (101 CPD)  
= 64 spaces

(vi) Short-Term Bicycle Parking Requirements

Minimum Parking Required = 0.6 per 1,000 sf (Retail) and 0.06 per 1,000 sf (Office/Lab) per §6.107.3

87 Cambridgepark Drive = 63,851 sf x (0.06/1,000) = 4 spaces

101 Cambridgepark Drive = [139,134 sf x (0.06/1,000)] + [2,700 sf x (0.6/1,000)]  
= 9 + 2 = 11 spaces

Total Required Short-Term  
Bicycle Parking = 4 + 11  
= 15 spaces

(vii) Proposed Short-Term Bicycle Parking = 6 spaces (87 CPD) + 22 spaces (101 CPD)  
= 28 spaces

**OWNERSHIP CERTIFICATE**

**Project Address:** 87 & 101 CambridgePark Drive

**Application Date:** 10/4/2019

This form is to be completed by the property owner, signed, and submitted with the Special Permit Application:

I hereby authorize the following Applicant: HCP/King 101 CPD LLC

at the following address: 800 Boylston Street, Suite 1570, Boston, MA 02199

to apply for a special permit for:

on premises located at: 97 CambridgePark Drive

for which the record title stands in the name of: HCP/King 87 CPD LLC

whose address is: 200 CambridgePark Drive, Cambridge MA

by a deed duly recorded in the:

Registry of Deeds of County: Middlesex Book: 67663 Page: 527

OR Registry District of the Land Court,  
Certificate No.:

Book: \_\_\_\_\_ Page: \_\_\_\_\_

Signature of Land Owner (If authorized Trustee, Officer or Agent, so identify)

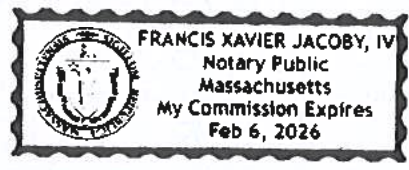
To be completed by Notary Public:

Commonwealth of Massachusetts, County of Suffolk

The above named Thomas Ragno personally appeared before me,  
on the month, day and year 9 / 23 / 2019 and made oath that the above statement is true.

Notary: Francis Xavier Jacoby IV  
Francis Xavier Jacoby

My Commission expires: 2 / 6 / 2026



## FEE SCHEDULE

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**Project Address:** 101 Cambridgepark Drive

**Application Date:** 10/04/2019

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The Applicant must provide the full fee (by check or money order) with the Special Permit Application. Depending on the nature of the proposed project and the types of Special Permit being sought, the required fee is the larger of the following amounts:

- If the proposed project includes the creation of new or substantially rehabilitated floor area, or a change of use subject to Section 19.20, the fee is ten cents (\$0.10) per square foot of total proposed Gross Floor Area.
- If a Flood Plain Special Permit is being sought as part of the Application, the fee is one thousand dollars (\$1,000.00), unless the amount determined above is greater.
- In any case, the minimum fee is one hundred fifty dollars (\$150.00).

### Fee Calculation

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New or Substantially Rehabilitated Gross Floor Area (SF): 141,834 SF × \$0.10 = \$14,183.40

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Flood Plain Special Permit Enter \$1,000.00 if applicable: \$ 1,000.00

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Other Special Permit Enter \$150.00 if no other fee is applicable: \$ 150.00

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**TOTAL SPECIAL PERMIT FEE** Enter Larger of the Above Amounts: \$15,333.40

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# PROJECT NARRATIVE

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD

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## **Project Overview**

### **Introduction**

This is an application by HCP/King 101 CPD, LLC (the “Applicant”) for a Special Permit to authorize the construction of a 141,834 sf building containing a technical office use with ground floor retail at 101 Cambridgepark Drive (the “Proposed Building”). The new building will include a 247-vehicle below-grade parking garage. The site currently contains an existing 63,851 sf building (87 Cambridgepark Drive) with surface parking for 111 motor vehicles. The Project is located in the Triangle Sub-district of the Alewife Overlay District (AOD 6).

The Applicant is seeking a Project Review Special Permit pursuant to Article 19.20 and, pursuant to the provisions of the Alewife Overlay District, Special Permits for additional FAR, increased height and reduced setbacks pursuant to Section 20.93.2. The Applicant is also seeking a Flood Plain Special Permit pursuant to Section 20.70.

As set forth in the plans and related materials contained in this Application, the Project has been designed in accordance with the objectives, criteria and guidelines set forth in the Concord-Alewife Plan.

### **Project Description**

The parcel consists of a 132,745 square foot lot that presently contains a two-story office and laboratory building of approximately 63,851 sf set 229 feet from the northerly line of Cambridgepark Drive. The new building will be sited in front of the existing building and consist of five stories with a height of slightly less than 80 feet (79.5). A mechanical penthouse will be located on the roof of the building.

A three story below grade parking garage will be constructed beneath the building that will accommodate 247 motor vehicles. The existing surface parking on the lot (101) spaces will be relocated into the garage. The balance of the spaces in the garage (146) will serve the tenants and visitors to the new building. The site will also contain seven (7) surface parking spaces proximate to the entries for both buildings to accommodate handicapped parking. Loading for both buildings will occur through an interior loading dock at the rear corner of the new building.

Short-term bicycle parking will be located near the entries of both buildings. Long term bicycle parking will be located in a first-floor bicycle room containing a repair station. The bicycle room will have direct access to the courtyard between the buildings. In addition, the applicant has committed to locate and fund the operation of a Blue Bike bicycle sharing station on the site.

A key feature of the site plan will be the creation of a multi-use path along the eastern edge of the lot that will accommodate bicycles and pedestrians. The location of the multi-use path was done with input from the Community Development Department to ensure alignment with the path being installed across the street at 50 Cambridgepark Drive. The path will extend from Cambridge Park Drive to the existing

Fitchburg Path that runs along the rear of the site. The Applicant has begun the process of applying for approval from the MBTA to extend the path across a portion of their land in order to create a more direct point of access to the Fitchburg Path. Early review of the application from the MBTA has been encouraging. If the segment of the path cannot be located on MBTA property, a connection can be made at the rear of the site. The path will be accessible to the general public and will provide a direct link to a newly designed crosswalk on Cambridgepark Drive. A courtyard will be created between the new building and the existing building. This area will consist of a wood deck system that will include plantings and outdoor seating to accommodate everyday use as well as events.

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## Compliance with Zoning

87-101 Cambridgepark Drive is sited in the Office 2A Zoning District (O-2A) as well as in the Alewife Overlay Zoning District (AOD 6) and the Flood Plain Overlay District, the requirements of which are set forth in Sections 20.90 and 20.70, respectively. Office and Laboratory uses are permitted as of right and the Project complies with the dimensional restrictions of the Overlay District. Pursuant to the Land Use threshold of Section 19.23, a Project Review Special Permit is required.

Based on the below, the Applicant respectfully requests the Planning Board grant the following Special Permits in favor of the Project:

- i. Special Permit under Section 19.20 for a Project Review Special Permit consistent with the Design Objections of Section 19.30;
- ii. Special Permit under Section 20.95.1 to permit a base Floor Area Ratio ("FAR") for the Property of 1.61 for general office, technical office for research laboratory, retail and consumer service establishment uses situated in two (2) buildings;
- iii. Special Permit under Section 20.95.2.6 to permit the Proposed Building to have a maximum height of up to eighty-two (82) feet;
- iv. Special Permit under Section 20.95.34 to permit a side-yard setback of twenty-four (24) feet for the Proposed Building along its westerly building face;
- v. Special Permit under Section 20.95.34 to permit a front yard setback of fifteen (15) feet for the Proposed Building along Cambridgepark Drive; and
- vi. Special Permit under Section 20.73 Flood Plain Overlay Special Permit, authorizing the implementation of earth-movement, landscaping and construction on the Property as the same is situated entirely within the Flood Plain Overlay.

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## Compliance with Criteria Specific to Special Permits Being Sought

### **ARTICLE 10.43 SPECIAL PERMIT GENERAL CRITERIA**

Section 10.43 of the Ordinance contains criteria concerning the granting of a Special Permit. Set forth below are the instructions as set forth in Section 10.43, together with a narrative response that describes why none of the conditions that might be regarded as cause for denial of a special permit apply in the case of the Project.

***Special permits will normally be granted where specific provisions of the Ordinance are met, except when particulars of the location or use, not generally true of the district or the uses permitted in it, would cause granting of such permit to be to the detriment of the public interest because:***

***(a) It appears that the requirements of the Ordinance cannot or will not be met.***

With the requested Special Permits, the Project will meet all other requirements of the Ordinance.

***(b) Traffic generated or patterns of access or egress would cause congestion, hazard, or substantial change in established neighborhood character.***

The Applicant has completed a detailed analysis of the traffic impacts associated with the Project, as set forth in the Transportation Impact Study (the "TIS") prepared by Vanasse, Hangen Brustlin, Inc. submitted to the City of Cambridge Traffic, Parking and Transportation ("TP&T") Department on September 9, 2019. The TIS was Certified by TPT Department on September 11, 2019 as having been prepared in accordance with the City's guidelines for TIS and responds to the TP&T scoping determination. The TIS indicates that the Project is expected to have limited transportation impact, and identifies a mitigation program to address potential impacts of Project traffic to congestion, hazard or a substantial change in the established neighborhood character. The mitigation includes, but is not limited to, a new multi-use path connecting Cambridgepark Drive with the Fitchburg Cut-off Path, ample bike parking exceeding the City's requirements, funding for a new Bluebikes station and a robust Transportation Demand Management (TDM) program. The Proponent has drafted a Parking and Transportation Demand Management (PTDM) Plan for execution with the City to establish and accomplish goals to reduce single occupancy vehicle (SOV) Project trips.

***(c) The continued operation of or the development of adjacent uses as permitted in the Zoning Ordinance would be adversely affected by the nature of the proposed use.***

Adjacent uses will not be adversely affected. The two directly adjacent uses are similarly office and laboratory uses, the function of which will not be affected by the Project.

***(d) Nuisance or hazard would be created to the detriment of the health, safety and/or welfare of the occupant of the proposed use or the citizens of the City.***



The Project will not create any nuisance or hazard to the detriment of the health, safety or welfare of the occupants of the Project or the citizens of Cambridge. The office, research lab and retail uses this project includes are all well understood and regulated in the City of Cambridge.

***(e) For other reasons, the proposed use would impair the integrity of the district or adjoining district, or otherwise derogate from the intent and purpose of this Ordinance.***

The proposal will enhance, rather than impair, the integrity of the district within which it lies, as well as the adjoining districts, and is fully consistent with the intent and purpose of the Zoning Ordinance. The Project will bring life and vitality to this stretch of Cambridgepark Drive by bringing a retail space to this office park.

***(f) The new use or building construction is inconsistent with the Urban Design Objectives set forth in Section 19.30.***

This Project is fully consistent with, and will significantly advance the implementation of, the Urban Design Objectives set forth in Section 19.30, as evidenced by the narrative discussion provided in Section V of this Application.

## **ARTICLE 19.000 PROJECT REVIEW**

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### ***19.25 Project Review Special Permit Criteria***

In granting a special permit under Section 19.200, the Planning Board is required to make the following findings:

***a) The Project is not expected to have substantial adverse impacts on the City's transportation network within the study area as analyzed in the required Transportation Impact Study (TIS).***

The TIS for the Project was Certified by TPT Department on September 11, 2019. The TIS indicates that the Project is expected to have limited transportation impact and identifies a mitigation program to address potential impacts of Project. The mitigation includes, but is not limited to, a new multi-use path connecting Cambridgepark Drive with the Fitchburg Cut-off Path, ample bike parking exceeding the City's requirements, funding for a new Bluebikes station and a robust Transportation Demand Management (TDM) program. The Proponent has drafted a Parking and Transportation Demand Management (PTDM) Plan for execution with the City to establish and accomplish goals to reduce single occupancy vehicle (SOV) Project trips.

***b) The Project is consistent with the urban design objectives of the city as set forth in Section 19.30 of the Ordinance.***

A narrative describing the consistency of the Project with the urban design objectives of the City, as set forth in Sections 19.31 through 19.37 of the Ordinance, is provided below in Section V of this Application.

### **19.30 Citywide Urban Design Objectives**

#### **19.31 New projects should be responsive to the existing or anticipated pattern of development.**

*Indicators include:*

***(1) Heights and setbacks provide suitable transition to abutting or nearby residential zoning districts that are generally developed to low scale residential uses.***

The Proposed Building is not adjacent or proximate to a residential zoning district. The adjacent buildings on the same block are technical office and laboratory uses of a comparable height. The Proposed Building conforms to the height regulations of the Alewife Overlay District.

***(2) New buildings are designed and oriented on the lot so as to be consistent with the established streetscape on those streets on which the project lot abuts. Streetscape is meant to refer to the pattern of building setbacks and heights in relationship to public streets.***

The Proposed Building will face Cambridgepark Drive and establish a friendly pedestrian landscaped area along the building edge that will serve to access the ground level retail and restaurant uses to be established within the building. These ground level uses will provide much needed retail amenities to Cambridgepark Drive and greatly improve its street edge.

***(3) In mixed-use projects, uses are to be located carefully to respect the context, e.g. retail should front onto a street, new housing should relate to any adjacent existing residential use, etc.***

The Proposed Building is primarily dedicated to office and research lab uses, but approximately 2,700 square feet of the ground floor fronting on Cambridgepark Drive is reserved for retail and restaurant space.

***(4) Where relevant, historical context are respected, e.g. special consideration should be given to buildings on the site or neighboring buildings that are preferably preserved.***

Nearly all of the structures on Cambridgepark Drive have been constructed within the past 40 years, many of which within the past 10.

#### **19.32 Development should be pedestrian and bicycle-friendly, with a positive relationship to its surroundings.**

*Indicators include:*

***(1) Ground floors, particularly where they face public streets, public parks, and publicly accessible pathways, consist of spaces that are actively inhabited by people, such as retail stores, consumer service businesses and restaurants where they are allowed, or general office, educational or residential uses and building lobbies. Windows and doors that normally serve such inhabited spaces***

***are encouraged to be a prominent aspect of the relevant building facades. Where a mix of activities are accommodated in a building, the more active uses are encouraged facing public streets, parks and pathways. In commercial districts, such active space consists of retail and consumer service stores and building lobbies that are oriented toward the street and encourage pedestrian activity on the sidewalk. However, in all cases such ground floor spaces should be occupied by uses (a) permitted in the zoning district within which the building is located, (b) consistent with the general character of the environment within which the structure is located, and (c) compatible with the principal use for which the building is designed.***

The ground floor of 101 Cambridgepark Drive contains a retail / restaurant space with an at grade entrance. There is ample space provided on the adjacent sidewalk and plaza surrounding the retail entry for informal, flexible seating. Planting areas with integral perimeter seating and pedestrian lighting encourage activity at the building entrances. Short-term bicycle parking for 101 Cambridgepark Drive, exceeding the City's requirements, is located at street level at the base of the main entrance stairs and adjacent to the retail entrance.

The area between the Proposed Building and the existing 87 Cambridgepark Drive will provide a common, dynamic outdoor space, designed for everyday use and for events. A wood deck system at adjacent street level is suspended above a flood storage area, that will accommodate planting in some areas. On the east side of the decked common space, large cutouts in the decking allow shrub and tree planting to grow up above deck height, rimmed with built-in seating elements. In addition to stairs an accessible, sloping wood deck walkway transitions between the offset 87 and 101 Cambridgepark Drive finished floor elevations, and provides an easy connection to the long-term bicycle storage housed within the Proposed Building. On the west side of the common space, an event lawn at the lower flood storage elevation is surrounded by stadium seating rising to the deck level, creating an amphitheater usable for events and daily use. Adjacent to the lower lawn, trees will grow up through the decking to create a shaded grove for café tables and chairs. Short-term bicycle parking for 87 Cambridgepark Drive will be relocated to the decking area just outside the main entrance. Long-term covered bike storage for 87 Cambridgepark Drive will be located at the southeast corner of the building, adjacent to the proposed multiuse path along the eastern edge of the site. A proposed Bluebikes station is proposed along the multiuse path, location just north of the crosswalk leading to the decked common space.

***(2) Covered parking on the lower floors of a building and on-grade open parking, particularly where located in front of a building, is discouraged where a building faces a public street or public park, and publicly accessible pathways.***

The Project will include 254 parking spaces, the majority of which will be located within a below-grade parking facility located within the Proposed Building. The existing surface parking at the front of the lot will be eliminated. The portion of the garage facing the street will not be visible and the ramps to the parking garage will be located at the rear of the Proposed Building.

***(3) Ground floors should be generally 25-50% transparent. The greatest amounts of glass would be expected for retail uses with lesser amounts for office, institutional or residential use.***

The facades of the Ground Floor fronting Cambridgepark Drive are greater than 50% transparent for a combination of retail and office use.

***(4) Entries to buildings are located so as to ensure safe pedestrian movement across streets, encourage walking as a preferred mode of travel within the city and to encourage the use of public transit for employment and other trips. Relating building entries as directly as possible to crosswalks and to pathways that lead to bus stops and transit stations is encouraged; siting buildings on a lot and developing site plans that reinforce expected pedestrian pathways over the lot and through the district is also encouraged.***

The main entry for 101 Cambridgepark Drive is adjacent to the corner retail / restaurant space and is surrounded by a street-level plaza at the southeast corner of the Proposed Building. This corner of the Proposed Building has the closest proximity to the Alewife Transit Station to the east. From the Alewife Station, the Proposed Building's main entry and retail entry are accessed through the street level plaza utilizing a single crosswalk across the vehicular access to the 101 parking garage and loading dock areas for both the 87 and 101 buildings.

The proposed multiuse path along the eastern edge of the site runs parallel to the vehicular drive and is separated by shrub and tree planting. The path aligns with the proposed multiuse path for 50 Cambridgepark Drive to the south and continues north to connect with the Fitchburg Cutoff multiuse path. From the southeast corner of the property, the 101 site's proposed path identifies a widened path for pedestrians and bicycles to the service drive crosswalk leading to the common space between the 87 and 101 buildings.

***(5) Pedestrians and bicyclists are able to access the site safely and conveniently; bicyclists should have, secure storage facilities conveniently located on-site and out of the weather. If bicycle parking is provided in a garage, special attention must be paid to providing safe access to the facilities from the outside.***

The Project includes a total of 70 new bicycle spaces. For the office/lab tenants, 48 spaces are located inside the building in a secure bicycle storage room adjacent to lockers and changing rooms with 7 showers. In addition, for building visitors and retail/restaurant customers, 22 bicycle spaces are provided in close proximity to building and retail entrances.

***(6) Alternate means of serving this policy objective 19.32 through special building design, siting, or site design can be anticipated where the building form or use is distinctive such as freestanding parking structures, large institutional buildings such as churches and auditoriums, freestanding service buildings, power plants, athletic facilities, manufacturing plants, etc.***

Alternative means of serving these objectives are not necessary.

***19.33 The building and site design should mitigate adverse environmental impacts of a development upon its neighbors.***

Indicators include:

***(1) Mechanical equipment that is carefully designed, well organized or visually screened from its surroundings and is acoustically buffered from neighbors. Consideration is given to the size, complexity and appearance of the equipment, its proximity to residential areas, and its impact on the existing streetscape and skyline. The extent to which screening can bring order, lessen negative visual impacts, and enhance the overall appearance of the equipment should be taken into account. More specifically:***

***(a) Reasonable attempts have been made to avoid exposing rooftop mechanical equipment to public view from city streets. Among the techniques that might be considered are the inclusion of screens or a parapet around the roof of the building to shield low ducts and other equipment on the roof from view.***

Most of the building's mechanical equipment, including air handling units, chillers, boilers, emergency and stand-by power generators, and elevator machine rooms, is located inside the enclosed two-story penthouse, which provides both visual and acoustical buffering from any adjacent buildings. Chillers are located on the roof in an outdoor well that is integrated into the penthouse design, shielded behind a screen wall. Primary exhaust fans, which need access to free flow of air, are located on the upper roof in an architecturally organized manner. Any additional or supplemental equipment that needs to be provided to meet tenant requirements will be located near the center of the penthouse roof, effectively screened from view by the building geometry and height.

***(b) Treatment of the mechanical equipment (including design and massing of screening devices as well as exposed mechanical elements) that relates well to the overall design, massing, scale and character of the building.***

The massing design and cladding materials of the penthouse and roof-top screen walls are carefully composed to integrate with the building massing while stepping back from the street walls to minimize the perception of the building height.

***(c) Placement of mechanical equipment at locations on the site other than on the rooftop (such as in the basement), which reduces the bulk of elements located on the roof; however, at-grade locations external to the building should not be viewed as desirable alternatives.***

87-101 Cambridgepark Drive includes no mechanical equipment placed at grade external to the Building. The Proposed Building's electrical vault, to which ready access is required by the electrical utility company, is located at the northwest corner at the rear of the building so as to minimize its impact on any public street, with the primary points of access located on the north and west faces of the building adjacent to a raised patio area and walkway adjacent to a private grassed corridor. In a similar manner, the water entrance room is located on the west side of the building, with the fire pump accessible from the east side of the building adjacent to the loading area. The Project does not have a basement.

***(d) Tall elements, such as chimneys and air exhaust stacks, which are typically carried above screening devices for functioning reasons, are carefully designed as features of the building, thus creating interest on the skyline.***

Only exhaust stacks and chimneys, which must functionally extend higher, rise above the penthouse and screen walls. The major building exhaust fans are architecturally organized in relation to the building and penthouse massing. Other smaller exhaust fans and chimneys will be located close to the middle of the penthouse roof where they will generally be visually screened from view from the street and sidewalks below.

***(e) All aspects of the mechanical equipment have been designed with attention to their visual impact on adjacent areas, particularly with regard to residential neighborhoods and views and vistas.***

See (d) above.

***(2) Trash that is handled to avoid impacts (noise, odor, and visual quality) on neighbors, e.g. the use of trash compactors or containment of all trash storage and handling within a building is encouraged.***

All building dumpsters will be located within the Proposed Building. The primary compactor serving office and R&D uses is in the primary loading dock.

***(3) Loading docks that are located and designed to minimize impacts (visual and operational) on neighbors.***

The loading docks for the Proposed Building will be located off an access driveway situated along the easterly side of the Property with overhead doors.

***(4) Stormwater Best Management Practices and other measures to minimize runoff and improve water quality are implemented.***

The drainage design and stormwater management plan address both the quality and flow rates of stormwater runoff from the site and conforms to the standards outlined by the Massachusetts Department of Environmental Protection Stormwater Management Policy and the City of Cambridge Department of Public Works Concord-Alewife Stormwater Management Guidelines.

***(5) Landscaped areas and required Green Area Open Space, in addition to serving as visual amenities, are employed to reduce the rate and volume of stormwater runoff compared to pre-development conditions.***

The open space is designed with a combination of hardscape and green landscape materials, providing visual amenity as well as an active seating area, but also serves as the primary location for the phosphorus reduction infiltration systems located below the surface.

***(6) The structure is designed and sited to minimize shadow impacts on neighboring lots, especially shadows that would have a significant impact on the use and enjoyment of adjacent open space and***

***shadows that might impact the operation of a Registered Solar Energy System as defined in Section 22.60 of this Zoning Ordinance.***

The Project is bordered by 125 Cambridgepark Drive, a 6-story office building to the west, 35 Cambridgepark Drive, a 6-story office building to the east, and the Alewife Reservation to the north. The Proposed Building will be no more than 5 stories in height plus a mechanical penthouse. A shadow analysis indicates shadows from the project will not impact on the use and enjoyment of adjacent open spaces.

***(7) Changes in grade across the lot are designed in ways that minimize the need for structural retaining walls close to property lines.***

The Project design minimizes grade changes and the need for structural retaining walls close to lot lines.

***(8) Building scale and wall treatment, including the provision of windows, are sensitive to existing residential uses on adjacent lots.***

The Project is designed with consideration given to the pedestrian scale along Cambridgepark Drive as well as the architecture of surrounding uses. Window locations and wall treatments were selected with consideration to the existing adjacent office/R&D buildings and tenants thereof to the east, south, and west of the Project, as well as the future building and tenants of 50 Cambridgepark Drive southeast of the Project.

***(9) Outdoor lighting is designed to provide minimum lighting and necessary to ensure adequate safety, night vision, and comfort, while minimizing light pollution.***

Outdoor lighting on the sidewalks and open spaces will be designed to provide adequate safety, night vision, and comfort, while minimizing light pollution.

***(10) The creation of a Tree Protection Plan that identifies important trees on the site, encourages their protection, or provides for adequate replacement of trees lost to development on the site.***

A Tree Protection Plan was submitted to the City Arborist and is included with this application. The total DBH of significant trees at the existing Property is 671 DBH (inches). Of these the Project will retain 290 DBH and remove 381 DBH. A total of 263 DBH of new trees will be planted as part of the proposed Project resulting in a net decrease of 118 DBH at Project completion. The design team is working with a consulting arborist to determine if any existing trees to be removed are candidates to be transplanted to areas within the Project Site. The team will assess feasibility of transplanting any large trees that currently exist on site. If transplanting trees is not an option, a contribution to the City of Cambridge Tree Fund will be made in accordance with the requirements of Section 8.66.060 of the City of Cambridge General Ordinance.

***19.34 Projects should not overburden the City infrastructure services, including neighborhood roads, city water supply system, and sewer system.***

***Indicators include:***

***(1) The building and site design are designed to make use of water-conserving plumbing and minimize the amount of stormwater run-off through the use of best management practices for stormwater management.***

The proposed stormwater management system will be designed to comply with the most recent City of Cambridge Wastewater and Stormwater Drainage Use Regulations, Concord-Alewife Area Stormwater Management Guidelines, and the MassDEP Stormwater Management Policy. The proposed system is designed with respect to rainfall quantities provided in “NOAA Atlas 14, Volume 10, Version 2 Point Precipitation Frequency Estimates.”

Ground surface and new building roof runoff will discharge to an underground stormwater detention system to be located south and east of the existing 87 Cambridgepark Drive building. The system will comprise 2,230 R-Tank 1.5 modules embedded in crushed stone. The modules will be lined with an impermeable liner due to the system’s proximity to the seasonal high groundwater elevation and the unsuitability of on-site soils for infiltration. The combined runoff will discharge at controlled rates via precast outlet control manhole to the existing stormwater conveyance system located in Cambridgepark Drive, whereafter it will enter the 66-inch Alewife Brook conduit pipe running north across the site and discharge via headwall to Alewife Brook. The stormwater management system has been designed to mitigate the peak discharge difference of the 25-year post-development peak rate of runoff relative to the 2-year pre-development peak rate of runoff per the City of Cambridge Wastewater and Stormwater Management Guidance.

***(2) The capacity and condition of drinking water and wastewater infrastructure systems are shown to be adequate, or the steps necessary to bring them up to an acceptable level are identified.***

The sanitary sewage for the Project will be collected internally and discharged via an 8-inch diameter sewer service outside the building. This sewer service will extend along the east edge of the building to a sewer holding tank, discharging to the existing 12” sewer main located in Cambridgepark Drive.

Lab waste will be separated from sanitary waste within the building and diverted to an acid neutralization tank located within a dedicated room adjacent to the loading dock. The acid neutralization tank will then discharge to the 8-inch diameter building sewer service.

The first-floor building program includes approximately 2,700 square feet of retail space. In the event a café or restaurant tenant occupies the space, kitchen waste will be separated from sanitary waste and routed through grease traps/interceptors within the kitchen space prior to discharge to the 8” dia. building sewer.

The Applicant and its design team are working with the Cambridge Department of Public Works and the MWRA to coordinate the new sanitary connections and locations.

Based upon City of Cambridge Wastewater and Stormwater Drainage Use Regulations, 314 CMR 7.00 – The Commonwealth’s Sewer System Extension and Connection Permit Program, and 310 CMR 15.000 – State Environmental Code (Title 5), the Proposed Building and uses will generate approximately 14,431 gallons per day (GPD). The City of Cambridge inflow/infiltration (I/I) mitigation requirements do not apply



to this Project because proposed flows do not exceed the 15,000 GPD threshold. The Project does not require a Massachusetts DEP Sewer Connection Permit and it is not located within a City area where mitigation is required.

A Stormwater and Wastewater Infrastructure Permit (SWIP) for stormwater and wastewater discharges is required under Article 1, Section 8 (a) of the City of Cambridge Wastewater and Stormwater Drainage Use Regulations and shall be issued by the City of Cambridge Department of Public Works.

Domestic water service to the proposed 101 Cambridgepark Drive building is to be provided by a new primary domestic service line from the above referenced 10-inch water main in Cambridgepark Drive. A new primary fire service will also be connected to the 10-inch water main in Cambridgepark Drive. The new domestic service lateral will be equipped with a separate meter. Hydrant flow tests will be completed prior to completion of final design to verify adequate flow and pressure for the Proposed Building's fire suppression system. Additionally, the need for a fire service pump to boost pressure in the fire suppression system will also be analyzed. All water infrastructure improvements for 101 Cambridgepark Drive and appurtenances thereto shall conform to Cambridge Water Department standards and specifications.

***(3) Buildings are designed to use natural resources and energy resources efficiently in construction, maintenance, and long-term operation of the building, including supporting mechanical systems that reduce the need for mechanical equipment generally and its location on the roof of a building specifically. The buildings are sited on the lot to allow construction on adjacent lots to do the same. Compliance with Leadership in Energy and Environmental Design (LEED) certification standards and other evolving environmental efficiency standards is encouraged.***

The Project will be designed to minimize any negative impact on the environment and its performance will be measured using the Leadership in Energy and Environmental Design (LEED) standards. A description of the sustainable design approach for the project is contained in the LEED Narrative and LEED Checklist submitted with this Application. Mechanical systems will be of high efficiency and insulated, minimizing impact on the water, electrical, and gas service.

***19.35 New construction should reinforce and enhance the complex urban aspects of Cambridge as it has developed historically.***

***Indicators include:***

***(1) New educational institutional construction that is focused within the existing campuses.***

87-101 Cambridgepark Drive does not comprise an educational or institutional use.

***(2) Where institutional construction occurs in commercial areas, retail, consumer service enterprises, and other uses that are accessible to the general public are provided at the ground (or lower) floors of buildings. Where such uses are not suitable for programmatic reasons, institutional uses that encourage active pedestrian traffic to and from the site.***

87-101 Cambridgepark Drive does not comprise an educational or institutional use, although the intent of this objective is addressed through the provision of 2,700 square feet of retail and restaurant services fronting on Cambridgepark Drive.

***(3) In large, multiple-building non-institutional developments, a mix of uses, including publicly accessible retail activity, is provided where such uses are permitted and where the mix of uses extends the period of time the area remains active throughout the day.***

2,700 square feet of retail or restaurant space is provided at the ground floor of the building. Ample exterior amenity space is provided in the front and rear of the building.

***(4) Historic structures and environments are preserved.***

Construction of the proposed structure will not result in any demolition of existing structures.

***(5) Preservation or provision of facilities for start-up companies and appropriately scaled manufacturing activities that provide a wide diversity of employment paths for Cambridge residents as a component of the development; however, activities heavily dependent on trucking for supply and distribution are not encouraged.***

The Project will provide additional retail uses and R&D employment opportunities for existing and future residents and professionals frequenting the District for business and recreational purposes alike. The Project will complement other commercial uses within the District and will not require frequent heavy truck access for supply and distribution purposes.

### ***19.36 Expansion of the inventory of housing in the city is encouraged.***

***Indicators include:***

***(1) Housing is a component of any large, multiple building commercial development. Where such development abuts residential zoning districts substantially developed to low-scale residential uses, placement of housing within the development such that it acts as a transition/buffer between uses within and without the development.***

The Project does not abut a residential zoning district.

***(2) Where housing is constructed, providing affordable units exceeding that mandated by the Ordinance. Targeting larger family-sized middle-income units is encouraged.***

The Project does not comprise construction of housing units.

### ***19.37 Enhancement and expansion of open space amenities in the city should be incorporated into new development in the city.***

***Indicators include:***

***(1) On large-parcel commercial developments, publicly beneficial open space is provided.***

The Project does not constitute a large-parcel commercial development but will improve public access to the Alewife Brook Reservation and the amenities therein via construction of public bicycle transportation and open space improvements on the eastern portion of the Project site.

***(2) Open space facilities are designed to enhance or expand existing facilities or to expand networks of pedestrian and bicycle movement within the vicinity of the development.***

The Project proposes to create a bicycle transportation corridor to provide multimodal connectivity between Cambridgepark Drive and an outdoor deck and performance space to be constructed between the existing and new building on the Project site. The multimodal path will transition to a bicycle-only two-way path continuing north along the east side of the Project site, transitioning to a shared-access path marked by sharrows in the existing driveway north and northeast of the existing building and ultimately connecting to the Fitchburg Path in the Alewife Brook Reservation abutting the Project site to the north.

The Applicant is currently in negotiations with the MBTA to secure easement rights to extend the bicycle path across MBTA property located northeast of the Project Property. This alternative alignment would generally follow the existing alignment of an existing, underutilized dirt footpath located west of Old Alewife Brook and the headwall outlet for the Alewife Brook drainage conduit. The alternative alignment would provide total separation of bicycle and automobile traffic from Cambridgepark Drive to the Fitchburg Path, enhancing cyclist safety as well as a more scenic path of travel for cyclists.

***(3) A wider range of open space activities than presently found in the abutting area is provided.***

The Project includes construction of a landscaped outdoor deck and performance space between the existing and Proposed Buildings, with pedestrian connections to the abutting property at 125 Cambridgepark Drive to the west and a new multimodal path on the east side of the Project site.

## ***20.90 ALEWIFE OVERLAY DISTRICT***

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### ***20.92 General Purpose.***

***It is the purpose of this Section 20.90 to augment existing base district zoning regulations to respond to the unique problems and pressures for change in the Alewife area. The regulations contained in this Section 20.90 provide for more careful public scrutiny of future development proposals and provide an opportunity to shape the form and character of that development in ways that will benefit both individual property owners and the general interests of the larger commercial and residential neighborhood as a whole. These regulations are intended to harness the opportunities presented with the redevelopment of private property in ways that will:***

***1. Encourage forms of development, mix of uses, and range of improvements that will facilitate and encourage walking, biking and transit use and reduce the growth of auto trips in an area already burdened with regional vehicular traffic passing through to other destinations in the metropolitan region;***

The frontage along Cambridgepark Drive will be improved for pedestrians and is a short walk to the Alewife “T” Station. The property also has direct access to the Fitchburg Cutoff Bike Path to the north, along with its associated bike trail network, and has storage space for 92 bicycles including short- and long-term spaces for both the existing and proposed buildings. Additionally, the Applicant has committed to the installation of a Bluebikes station on the site.

***2. Preserve and enhance the capacity to store floodwater, recharge groundwater and manage the collection and disposal of stormwater in ways that add to the quality and visual appeal of the built environment as well as to the quality of the water itself;***

The Project will meet all of the new, enhanced requirements for storm water management on the site as well as flood water storage.

***3. Minimize the negative impact of new development on the adjacent Cambridge Highlands residential neighborhood while introducing new amenities and services that will benefit the residents of that neighborhood;***

The Property is well removed from the Highlands neighborhood thus no negative impacts are anticipated.

***4. Integrate the entire area through the creation of new pedestrian paths, roadways, green spaces and bridges that will facilitate movement within the several Districts and beyond to the Cambridge Highlands, North Cambridge and Neighborhood Nine neighborhoods and the Fresh Pond Reservation;***

The Project’s adjacency to the Fitchburg Cutoff Bike Path and Alewife “T” Station will provide residents with convenient access to alternate modes of transportation.

***5. Introduce a significant component of residential living and support retail services to enhance the area’s appeal for all persons who come to work, shop as well as live within the Districts; and***

The Project includes approximately 2,700 square feet of retail space directly adjacent to Cambridgepark Drive.

***6. Create an identity and sense of place for the Alewife Districts that parallels the development of the historic urban centers that characterize much of Cambridge.***

The Project will replace existing paved parking areas with landscape, pedestrian and bicycle uses and amenities consistent with other urban areas in Cambridge. The Project will replace the existing private outdoor courtyard with a multi-tenant building with ground-floor retail space visible and accessible from Cambridgepark Drive. The Project will enhance the continuity of the urban streetscape along Cambridgepark Drive via ground-level retail space in the Proposed Building and activated landscape and hardscape areas. The proposed multi-modal path along the east side of the Property will enhance the natural environment and encourage non-vehicular circulation to and from the Property, contributing to the creation of a more bikeable and walkable urban environment.

***20.93.2 Criteria for Special Permits.***

## ***I. Compliance with the Goals of the Concord Alewife Plan***

The proposed Project achieves several of the goals of the Concord-Alewife Plan for the Triangle District (AOD-6).

***GUIDELINE: Encourage more transit-oriented development. Allow higher density and height to take advantage of proximity to Alewife Station.***

The Proposed Building is within 500 feet of Alewife Station and is thus well suited for the increased FAR allowed for in the AOD-6.

***GUIDELINE: Continue to allow commercial development to be focused in this area, while also encouraging housing close to the T station.***

The Site currently contains an office building. The landscape details, pedestrian and bicycle access and retail components have been designed to support the existing residential uses in the neighborhood, specifically the 294 units under construction across the street at 50 Cambridgepark Drive.

***GUIDELINE: Improve bicycle and pedestrian connection among the Minuteman Trail, Belmont Path, Linear Park, and a future pathway along the Watertown Rail Line.***

The proposed multi-modal path to be constructed as part of this Project will directly connect the sidewalk on Cambridgepark Drive to the Fitchburg Path that runs through the Alewife Reservation.

## ***II. Compliance with the Guidelines of the Concord Alewife Plan***

The building design and site improvements are consistent with the Guidelines of the Triangle District (AOD-6).

***GUIDELINE: Create a pedestrian-friendly environment along Cambridgepark Drive.***

Site improvements include a widened sidewalk with landscaping that will enhance the pedestrian experience along Cambridgepark Drive and a reduction in curb cuts from two (2) to one (1).

***GUIDELINE: Provide small setbacks (5 to 15 feet) from the right-of-way for café seating, benches, or small open spaces.***

The southeast corner of the Site proximate to the retail use will contain a landscaped plaza that will provide tables, chairs, and benches.

***GUIDELINE: Screen service areas from Cambridgepark Drive.***

The loading and trash operations for both buildings will occur within an enclosed loading bay that will not be visible from Cambridgepark Drive.

***GUIDELINE: Provide pedestrian links that strengthen physical connection to Alewife Reservation, consistent with its master plan.***

As noted elsewhere in this Application, the proposed pathway along the eastern edge of the property will create an important physical connection to the Alewife Reservation.

**GUIDELINE: Create building height / façade setbacks between 85 feet and 105 feet.**

The Proposed Building height is 82 feet.

**GUIDELINE: Site new development to preserve right-of-way for future crossing of the railroad track to connect to the Triangle and Quadrangle.**

Unlike the sites on the opposite side of Cambridgepark Drive, this site is not adjacent to the railroad tracks that separate the Triangle and Quadrangle.

### **20.94.2 Environmental Limitations.**

**Within the Alewife Overlay Districts 1-6 the following restrictions shall apply.**

**1. All dust, fumes, odors, smoke, or vapors are effectively confined to the premises or disposed of so as to avoid air pollution.**

The Proposed Building's HVAC system will include rooftop-mounted air handling units with air filters placed at the front of each unit. The ground-floor loading and trash docks will be equipped with overhead doors which will be closed when loading and trash disposal operations are not occurring.

**2. Any noise, vibration, or flashing is not normally perceptible without instruments at a distance of one hundred (100) feet from the premises.**

The Proposed Building's rooftop mechanical equipment will be contained within an acoustical enclosure. All air handling units will be equipped with vibration isolators. The fire pump room will be constructed using soundproofing materials and construction methods.

### **20.95.34.3 Waiver of Yard Requirements.**

**The yard requirements of the applicable base or Overlay districts may be reduced or waived as set forth below. The Planning Board shall consider the following in making its findings:**

**a. The objectives of the Concord-Alewife Plan continue to be met.**

The Project directly supports the primary goals of the Concord-Alewife Plan by introducing a retail component to serve the residents and office users. Moreover, the Project will greatly enhance pedestrian and bicycle access by creating a designated path from Cambridgepark Drive to the Fitchburg Path.

**b. The stormwater management objectives for the area continue to be met both on the site and as the site may be a part of a larger system for managing stormwater runoff.**

The proposed stormwater management system has been designed to comply with the most recent City of Cambridge Wastewater and Stormwater Drainage Use Regulations, Concord-Alewife Area Stormwater Management Guidelines, and the MassDEP Stormwater Management Policy for a redevelopment project.

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***c. The reduction or waiver of yard requirements provides for more efficient development of land; encourages or facilitates a more logical pattern of buildings, streets, parks and open space; or enhances the urban, pedestrian character of the area as envisioned in the Concord-Alewife Plan.***

The siting of the Proposed Building towards the front of the lot will allow for greater pedestrian flow to and from the Fitchburg Path and the proposed retail component. The proposed front setback will create a consistent street wall with the recently renovated building at 35 Cambridgepark Drive, which also was granted a Special Permit for a 15-foot front yard setback.

## ***20.70 FLOOD PLAIN OVERLAY DISTRICT***

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***The Planning Board shall grant a Special Permit for development in the Flood Plain Overlay District if the Board finds that such development has met all of the following criteria in addition to the other criteria specified in Section 10.43:***

***1. No filling or other encroachment shall be allowed in Zone A areas or in the floodway which would impair the ability of these Special Flood Hazard Areas to carry and discharge flood waters, except where such activity is fully offset by stream improvements such as, but not limited to, flood water retention systems as allowed by applicable law.***

The Project provides on-site compensatory flood storage exceeding the existing condition via site grading and at flood storage areas beneath raised outdoor plaza. No flood storage is provided within the Proposed Building footprint, and no actively deployed flood protection measures are necessary to protect the main building first floor from the theoretical 2070 100-year Sea Level Rise / Storm Surge (SLR/SS) event.

***2. Displacement of water retention capacity at one location shall be replaced in equal volume at another location on the same lot, on an abutting lot in the same ownership, on a noncontiguous lot in the same ownership, or in accordance with the following requirements.***

The construction of the Project as proposed will result in a net loss of the site's available flood storage for certain incremental flood elevations due to building displacement within the flood plain. Therefore, in accordance with the Zoning Ordinance and the Massachusetts Wetlands Protection Act (310 CMR 14.00), the flood loss will be compensated for entirely on site on an incremental elevation basis, within which the existing flood storage volume is displaced.

***3. All flood water retention systems shall be suitably designed and located so as not to cause any nuisance, hazard, or detriment to the occupants of the site or abutters. The Planning Board may require screening, or landscaping of flood water retention systems to create a safe, healthful, and pleasing environment.***

The proposed outdoor plaza between the two buildings will comprise a free-standing elevated deck structure independent of either building, creating an interstitial space between the plaza structure and finished grade below dedicated to providing compensatory flood storage. The Project will be designed

to enable free flow between the areas underlying the deck and other depressed landscape areas east of the existing 87 Cambridgepark drive building and west and southwest of the proposed 101 Cambridgepark Drive building. Additionally, the driveway and parking area at the southeast corner of the Proposed Building and the landscape and hardscape areas between the Proposed Building and Cambridgepark Drive will be graded to provide additional flood storage. The overall flood storage on site is designed to be hydraulically contiguous to the existing, non-displaced flood plain within Cambridgepark Drive, eliminating the potential for isolated flood storage areas.

**4. The proposed use shall comply in all respects with the provision of the underlying zoning district, provisions of the State Building Code, Wetlands Protection Act, and any other applicable laws.**

In addition to the Flood Plain Overlay District, the proposed use complies with the provisions of the Office-2A District, AOD-6 District, Massachusetts Building Code, and the Wetlands Protection Act.

The Project comprises activities subject to protection under M.G.L. c. 131, Section 40 (the Wetlands Protection Act) and 310 CMR 10.00 and therefore requires the filing of a Notice of Intent. The Applicant will seek approval of the Project from the Cambridge Conservation Commission under a Notice of Intent filing to be made concurrently with this application. The Project will be subject to an Order of Conditions to be issued by the Cambridge Conservation Commission upon approval of the Project by same.

**5. Applicants for development in the Alewife area shall be familiar with area-specific and general city-wide land use plans and policy objectives (e.g. Concord-Alewife Plan, A Report of the Concord Alewife Planning Study, November 2005; Toward a Sustainable Future, Cambridge Growth Policy, 1993, Update, 2007; Section 19.30 - Urban Design Objectives of this Zoning Ordinance) and shall demonstrate how their plan meets the spirit and intent of such documents in conjunction with the requirements of this Section 20.70 - Flood Plain Overlay District and Section 20.90 – Alewife Overlay Districts 1-6.**

The Project has been designed with consideration to the requirements of the *Concord Alewife Plan, A Report of the Concord Alewife Planning Study*, and *Toward a Sustainable Future*. The Project will encourage and facilitate pedestrian and bicycle access and circulation within the site as well as to and from adjacent pedestrian and bicycle amenities and accessways. At-grade parking will be significantly reduced to include accessible and compact parking stalls, with the majority of vehicular parking for both the existing and Proposed Building located in a below-grade parking garage at the Proposed Building. Service areas will be located within the Proposed Building, set back from the street line approximately 100 feet and equipped with overhead doors. The Project will implement Low Impact Development stormwater best management practices (BMPs) and meet the requirements of the Massachusetts DEP Stormwater Management Policy and the City of Cambridge Department of Public Works Concord-Alewife Stormwater Management Guidelines. The Project will offer a variety of open space and recreational amenities for Cambridge residents at multiple locations on site, including enhanced landscaped open space throughout; a public multimodal pedestrian/bicycle transportation corridor on the east side of the site separated from the vehicular driveway by a visually appealing landscaped median; a raised outdoor deck for private tenant use with a performance space and seating; outdoor



seating adjacent to a public street-level retail space near Cambridgepark Drive; direct connectivity of on-site pedestrian ways and public retail space to the Cambridgepark Drive sidewalk; and short- and long-term bicycle parking and a 14-space Bluebike station. The Project will greatly enhance bicycle transportation within the Concord-Alewife area overall, connecting Cambridgepark Drive directly to the Fitchburg Path to the north, and in turn the Alewife MBTA station, resulting in a reduction of vehicular trips to and from the site.

***6. The requirement of Section 20.74(3) has been met (i.e., Certification and supporting documentation by a Massachusetts registered professional engineer demonstrating that such encroachment of the floodway as specified above in Subsection 20.73 shall not result in any increase in flood levels during the occurrence of the 100-year flood).***

A compensatory flood storage certification with supporting documentation has been prepared pursuant to Section 20.74(3) and is included in the Appendix.

## Envision Plan – Alewife Design Guidelines

<b>3.1 CREATE HUMAN-SCALED URBAN BLOCKS</b>	
<b>1. <i>New development and redevelopment of sites should break up large blocks and increase permeability by creating new streets, and pedestrian and bicycle connections.</i></b>	Multi use path added to the site.
<b>2. <i>Blocks should have a coherent perimeter, consisting of facades and elevations, along the streets, parks, and squares they border.</i></b>	Conforms
<b>3. <i>Massing of buildings and the geometry of floorplates should be arranged to fill out the block perimeters as designated by building setback lines recommended in the Envision Alewife Plan.</i></b>	Front Setback set by the special permit allowance.
<b>4. <i>Building massing and geometry should be designed in coordination with those of adjoining buildings within the block to create coherently aligned streetwalls along public streets and other public open spaces.</i></b>	Conforms
<b>3.2 FRAME URBAN SPACE</b>	
<b>1. <i>Create strong, continuous streetwalls that define and celebrate public open space.</i></b>	
<b>a. <i>Buildings should be sited parallel to the street, generally at the inner edge of sidewalks or along any setback lines recommended in the Envision Alewife Plan.</i></b>	Conforms
<b>b. <i>Streetwall facades addressing public streets or open spaces should be a minimum of three floors above grade or above the level of elevated sidewalks.</i></b>	Conforms
<b>c. <i>Building masses taller than 85' above grade should generally step back at that level. Where buildings face large open spaces such as Fresh Pond Reservoir, or arterial streets such as Alewife Brook Parkway, such setbacks may be at a higher level.</i></b>	N/A
<b>d. <i>Developers of large properties should create a site massing plan that establishes build-to lines.</i></b>	N/A – Single development parcel

<p><b>2. Depending on the street and building type, portions of buildings may be set back from the inner edge of sidewalks to allow for:</b></p>	
<p><b>a. Building entrances, outdoor dining, and residential forecourts, courtyards etc. The minimum percentage of streetwalls that must be located on the build- to line should be in accord with the importance of the street.</b></p>	<p>Conforms</p>
<p><b>b. Recessed retail or other entrances, recessed storefronts, loggias.</b></p>	<p>Conforms</p>
<p><b>3. Projecting elements at second floors and above, such as balconies and bay windows, should be provided to enliven facades.</b></p>	<p>Conforms</p>
<p><b>4. Pedestrian frontages should not project beyond the plane of the streetwall above.</b></p>	<p>Conforms</p>
<p><b>3.3 ARTICULATE URBAN SPACE</b></p>	
<p><b>1. For large buildings, massing should be broken down to enhance connections and avoid a monolithic appearance.</b></p>	<p>Conforms</p>
<p><b>2. Building massing should be designed to minimize shadows on existing and proposed open spaces.</b></p>	<p>Conforms . See shadow study.</p>
<p><b>3. Facades and massing should be differentiated in response to the varied conditions of the site context. A combination of the following should be used:</b></p>	
<p><b>a. Exceptional elements, located and designed to engage and reinforce views, axes, significant corners, building entrances, courtyards and other critical points in the district’s public realm.</b></p>	<p>Conforms</p>
<p><b>b. Relatively neutral facade elements serving as background to exceptional elements.</b></p>	<p>Conforms</p>
<p><b>4. Facades and massing should respond to the design of adjoining buildings and to elements of the building’s own structure or program as appropriate to their role in defining</b></p>	<p>Conforms</p>

<i>and shaping the public realm.</i>	
<b>5. Facades and elevations should emphasize the difference between the types, sizes and character of streets, open spaces, or other conditions they address by differences in building massing, materials, color, fenestration, window to wall ratios, bay patterns, etc. on their different sides.</b>	Conforms
<b>3.4 ENTRIES, ACCESS, AND UTILITIES</b>	
<b>Pedestrian entries</b>	
<b>1. Locate pedestrian entrances to engage and activate the streets and other public spaces.</b>	
<b>a. Frequent entrances should be provided along public ways.</b>	Conforms
<b>b. Retail entrances should be at block corners.</b>	Conforms
<b>c. Lobbies for office, laboratory, and industrial buildings should generally be located mid-block.</b>	Conforms
<b>Vehicular entries and drop-offs</b>	
<b>2. Design and locate vehicular entrances, driveways and vehicle drop-offs to minimize their impact on the pedestrian environment.</b>	
<b>a. Driveways and parking entrances should be located on side streets or alleys wherever possible.</b>	Conforms
<b>b. Driveway widths should be minimized.</b>	Conforms
<b>c. Driveways should be perpendicular to the street they connect to.</b>	Conforms
<b>d. Curb cuts should be minimized and shared wherever possible.</b>	Conforms
<b>e. Privately owned shared driveways should be designed as streets, within the hierarchy of proposed street types.</b>	Conforms
<b>f. Where fire lanes are required between buildings, they should be shared between adjoining lots and designed as streets or pedestrian/bicycle paths, depending on their connectivity within the overall street system.</b>	N/A

<p><b><i>g. Circular drives/drop-offs should be avoided.</i></b></p>	<p>No circular drop-off</p>
<p><b>Loading and servicing areas</b></p> <p><b>3. Design and locate loading/servicing areas and parking entrances to create a high- quality pedestrian environment.</b></p>	
<p><b><i>a. Except in industrial areas, service and loading should be located out of sight from public streets or other open spaces.</i></b></p>	<p>Conforms</p>
<p><b><i>b. Where possible, consolidate off-street loading areas and service roads serving multiple buildings and multiple parcels.</i></b></p>	<p>N/A</p>
<p><b><i>c. Locate entrances to service areas on secondary streets and alleys.</i></b></p>	<p>Conforms</p>
<p><b><i>d. Vehicular entrances should be appropriately screened from public view and integrated into building forms to minimize visual impacts. They should be limited to secondary streets.</i></b></p>	<p>Conforms</p>
<p><b><i>e. Avoid loading/servicing entrances exceeding two bays or 30 feet wide on public streets except in the industrial subdistrict.</i></b></p>	<p>Conforms</p>
<p><b><i>f. Any loading bays facing public streets should be provided with architectural doors designed to complement the overall facade composition.</i></b></p>	<p>N/A</p>
<p><b><i>g. Dumpsters, and loading access should be accessed from alleys internal to blocks, or rear or side streets.</i></b></p>	<p>Conforms</p>
<p><b>Utilities</b></p> <p><b>4. Mechanical or electrical equipment, and gas meters should not be visible or audible from public streets or open spaces.</b></p>	
<p><b><i>a. Preference should be given to housing mechanical and electrical equipment within buildings.</i></b></p>	<p>Conforms</p>
<p><b><i>b. If electrical equipment must be located at grade, it should not be sited between the building and any public way, or forward of the principal façade. Such equipment should be concealed by plantings or an</i></b></p>	<p>N/A</p>

<i>attractive enclosure.</i>	
<i>c. Mechanical/utility rooms are not appropriate along major streets, they should be located on minor streets or on the interiors of blocks.</i>	Conforms
<i>5. Electrical and data lines should be buried.</i>	Conforms
<i>6. For all new streets, locate utilities within streets, not sidewalks to protect tree plantings from conflicts.</i>	Conforms
<b>411 THE PEDESTRIAN FRONTAGE ZONE</b>	
<i>1. Where possible, buildings should engage, define and animate the pedestrian realm with active uses, such as retail, restaurants, live/ work units, flexible office space, and amenity spaces and community space in residential buildings.</i>	Conforms
<i>2. The pedestrian frontage zone should incorporate a variety of facade treatments to create a visually rewarding and intimate pedestrian environment. Examples include:</i>	
<i>a. angled display windows, frequent and recessed entrances</i>	Elevated first floor for flood mitigation.
<i>b. awnings and canopies</i>	Conforms
<i>c. a high percentage of glazing</i>	Conforms
<i>d. changes in mullion patterns, and incorporation of operable windows</i>	Conforms
<i>e. varied materials or colors</i>	Conforms
<i>f. higher-quality materials and detailing, with particular attention given to enhancing building entries and openings.</i>	Conforms
<i>3. The design of first floor facades should directly engage the pedestrian realm by reducing the distinction between exterior and interior space to extending the effective public realm indoors and reveal the activity within:</i>	

<b>a. On major public streets, including Smith Place, Wilson Road, Fawcett Street, Concord Ave, Cambridgepark Drive, Fresh Pond Parkway, Alewife Brook Parkway and Rindge Ave, first floor facades should be 60 to 75% glazed. For all other streets, 40 to 60% transparent glazing should be provided.</b>	Conforms
<b>b. First floor facades of retail, restaurant, and office space should maximize transparency, particularly between 2 feet to 12 feet above the adjoining sidewalk.</b>	Conforms
<b>c. Consider incorporating large operable doors/windows in sidewalk-side restaurant dining.</b>	Glazing but not operable.
<b>d. Storage rooms, toilets, restaurant kitchens, and other back-of-house facilities should be located away from primary streets and other public open spaces to maximize facade transparency.</b>	Conforms
<b>e. Kitchen exhaust for food service uses should not negatively impact the ground level pedestrian experience.</b>	Conforms
<b>f. Blank walls on primary streets exceeding 20' in length should be avoided.</b>	Conforms
<b>g. First floors should have a minimum of 18' floor-to-floor dimension.</b>	No but the second floor over 20' above grade.
<b>h. First floor levels should be flush with or easily accessible from the adjoining grade level or elevated sidewalk.</b>	Elevated first floor for flood mitigation.
<b>i. Where courtyards occur at grade or on upper levels, create visual and physical connections to these spaces.</b>	N/A – No upper courts
<b>4. Where the facade expression of the pedestrian frontage zone includes the building's second floor, the second-floor facade</b>	Conforms

<p><i>should be visually connected with the ground floor facade and differentiated from the street wall zone or serve as a mediating element linking the ground floor and the streetwall zone.</i></p>	
<p><b>5.</b> <i>Where buildings are set back from the sidewalk on streets where raised sidewalks are not required, low walls, combined with steps and ramps, should achieve the requisite grade change to first floor level. Sloped berms are discouraged.</i></p>	<p>Several strategies are used to negotiate the change in elevation at grade. Sloped walks, tiered seating and landscaped areas.</p>
<p><b>6.</b> <i>Where retail or community uses are not provided, first floor spaces on Smith Place, Wilson Road, Concord Ave, Cambridgepark Drive, and Alewife Brook Parkway should be designed to accommodate future active uses.</i></p>	
<p><b>a.</b> <i>Leasable ground floor depths of at least 40 feet should be provided where possible.</i></p>	<p>Conforms</p>
<p><b>b.</b> <i>First floor facades should be readily convertible to retail storefronts.</i></p>	<p>Conforms</p>
<p><b>c.</b> <i>Venting and exhaust needs of future food service uses should be readily accommodated.</i></p>	<p>Conforms</p>
<p><b>d.</b> <i>Interior power and HVAC that is zoned or easily convertible to enable convenient division and sublease of interior spaces to retail tenants should be provided.</i></p>	<p>Conforms</p>
<p><b>7.</b> <i>On designated streets, elevated sidewalks should provide direct pedestrian access to retail and other public uses whose first floor levels are elevated above street level. Such elevated sidewalks should constitute the primary focus of pedestrian life.</i></p>	<p>No elevated sidewalk but level 1 plinth provided as part of the development.</p>
<p><b>412 THE STREETWALL</b></p>	
<p><b>Guidelines</b></p> <p><b>1.</b> <i>Streetwall heights should be in harmony with the widths of the streets and squares they address, typically a minimum of approximately 5 floors. Taller streetwalls may be appropriate where buildings address large open spaces.</i></p>	<p>Conforms</p>



<b>2</b> <i>Streetwalls should be organized by a pattern of expressed structural bays, window openings, and/or surface articulation.</i>	Conforms
<b>3</b> <i>The overall configuration and pattern, the middle scale of bay design, and the details and nuances of fenestration and wall materials should be considered with respect to both distant views and contribution to the intimate scale of the pedestrian realm.</i>	Conforms
<b>4</b> <i>Differentiate between primary streets and open spaces on one hand, and secondary ones on the other hand by such means as differing levels of articulation and relief and changes of material or scale.</i>	Conforms
<b>5</b> <i>Incorporate focal elements in response to significant visual axes, to emphasize significant corners, to express changes in interior program, or to articulate primary building entrances.</i>	Conforms
<b>6</b> <i>Elaboration and differentiation of streetwalls' top floors should emphasize the room-like quality of the street and create an interesting roofline.</i>	Conforms
<b>7.</b> <i>Fenestration for commercial and mixed-use buildings streetwalls should consist of punched windows.</i>	No* - Compliance on 2/3 of building.
<b>413 THE BUILDING TOP</b>	
<b>Guidelines</b>	Yes* - Mechanical Penthouse
<b>1.</b> <i>The tops of buildings may be differentiated in massing or facade design from the typical streetwall floors to create a varied profile at the skyline, to frame the street as volumetric space, or to reflect the presence of mechanical equipment.</i>	Conforms
<b>2</b> <i>Tops that are differentiated in material and design from the façades below should be stepped back a minimum of 5' from the plane of the building façade.</i>	
<b>3.</b> <i>Mechanical penthouses and other roofscape elements, should generally be designed integrally with the façade</i>	Penthouse screen wall set back from the main elevation

<i>below, or as modulations of the pattern established below.</i>	
<b>4. All rooftop mechanical equipment should be covered with a reflective, ventilated screen with a Solar Reflectance Index (SRI) of 45 to mitigate the urban heat island effect.</b>	Conforms – LEED requirement
<b>TALL BUILDINGS</b>  <i>In the context of Alewife, a tall building is considered to be any building with a height greater than 85’.</i>	
<b>4.2 ARCHITECTURAL CHARACTER</b>	
<b>Guidelines</b>  <b>Scale and Detail</b>  <b>1. The overall form and detailed design of facades should emphasize human scale and presence using well-proportioned features. Examples include:</b>	Yes
<b>a. Punched windows, balconies, setbacks;</b>	Fenestration mimics punched windows. Façade elements setback from each other on CPD elevation.
<b>b. Size, rhythm and depth of windows that has regard to the scale of the building;</b>	Conforms
<b>c. Projecting cornices;</b>	No, not in the context.
<b>d. Projecting bay windows; and</b>	Conforms
<b>e. Expression of structural bays.</b>	Conforms
<b>2 Design details and embellishments should be used to soften, refine, and enrich facades. Examples include:</b>	
<b>a. Masonry string courses, lintels, sills, and trim;</b>	Masonry panels
<b>b. Changes in plane to produce shadow lines; and</b>	Conforms
<b>c. Variations in texture and color; and the arrangements of joint patterns</b>	Conforms

<p><b>3. Key locations for detailed design focus are the pedestrian frontage zone, building entrances, corners, setbacks, top floors and silhouettes.</b></p>	Conforms
<p><b>Fenestration</b></p> <p><b>4. Windows should be detailed and articulated to enrich the building's appearance.</b></p>	Conforms
<p><b>5. Variations in mullion widths and pattern, incorporation of solid panels within openings; the articulation of wall surface at the periphery of openings, and the incorporation of shading elements, should be considered.</b></p>	Conforms
<p><b>6. Operable windows should be used in residential and community buildings, and where possible in commercial buildings.</b></p>	No, lab building
<p><b>7. Strip windows should be avoided except in industrial buildings.</b></p>	Conforms
<p><b>4.3 BUILDING MATERIALS</b></p>	
<p><b>.Guidelines</b></p> <p><b>1. Buildings should be constructed of high- quality durable materials, particularly at the lower levels experienced closely by pedestrians.</b></p>	Conforms
<p><b>2. Sustainability considerations should be a factor in material choices.</b></p>	Conforms
<p><b>3. In general, streetwall facades should be primarily masonry (brick, terracotta, stone, precast concrete, etc.). Areas of curtain wall, metal panels, or siding should be used for emphasis or contrast.</b></p>	Conforms
<p><b>4. Warm and inviting color is encouraged.</b></p>	Conforms
<p><b>5. Large areas of glass, such as bay windows or glazed curtain walls, spanning more than one floor, should be used deliberately, as elements of emphasis in contrast to solid wall surface; predominately glass facades are discouraged.</b></p>	Fits within the existing context.

<p><b>6</b> <i>Vision glass should be clear, with high transparency and low reflectivity. Low iron glass with no reflective coatings on the first surface is preferred for ground floors</i></p>	<p>Conforms</p>
<p><b>4.4 BUILDING TYPES</b> <i>Each building should contribute to the creation and visual enrichment of Alewife.</i></p>	
<p><b>COMMERCIAL BUILDINGS INCLUDING OFFICE, LABORATORY, AND RESEARCH</b></p>	
<p><i>Guidelines</i></p> <p><b>1</b> <i>Commercial lobbies should occupy no more than 25 feet of frontage.</i></p>	<p>Conforms</p>
<p><b>2</b> <i>Structural bays should be expressed and have a dimensional range of 20' to 30'.</i></p>	<p>Conforms</p>
<p><b>3</b> <i>Streetwalls should incorporate detail, subtle relief, and carefully considered patterns of fenestration at scales to create a visually engaging pedestrian environment.</i></p>	<p>Conforms</p>
<p><b>4</b> <i>Organize mechanical equipment and screening relative to building massing and facades; treat them as integral parts of the building design.</i></p>	<p>Conforms</p>
<p><b>5</b> <i>Interior lighting, especially in commercial buildings with late-night uses, should minimize light pollution that would affect residents of nearby housing or hotels.</i></p>	<p>Conforms</p>

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## Consistency with Envision Cambridge and City Planning

The Alewife District of Cambridge is bounded by the Alewife Brook Reservation to the north, Concord Avenue to the south, Blanchard Street to the west and Danehy Park to the east. The area includes four distinct neighborhoods or subdistricts: Triangle (where this project is located), Quadrangle, Cambridge Highlands, and Shopping Center.

In 2003 the City initiated a multidisciplinary planning study of this area and developed what is now known as the 2006 Concord-Alewife Planning Study (CAP). The Study created a plan for the Concord-Alewife area and addressed issues such as appropriate mix of uses, including housing, commercial, possible City uses, and open space; the character of future development; access and traffic; and zoning changes needed to accomplish City goals.

More recently, the City of Cambridge embarked on creating a citywide plan “to create a more sustainable, equitable, and inclusive community.” This comprehensive plan, *Envision Cambridge*. *Envision Cambridge*, sets a framework for Alewife, which is designated as an evolving mixed-use district, as a district that “should continue to accommodate the bulk of the city’s growth and change, taking advantage of transit proximity, and positively transforming areas characterized by surface parking lots, automobile-oriented uses, and obsolete commercial buildings.” The draft plan recommends that Cambridge should seek to enhance its multimodal network locally and expand connections to regional sustainable transportation. The City has also prepared *Alewife District Design Guidelines*, which are “meant to inform property owners, business owners, developers, architects, and the general public about the desired character and form of the Alewife District.” Within the Triangle, these guidelines focus on improving the pedestrian environment and providing better connections within the area.

This Project looks to expand upon area connectivity by providing a link from Cambridgepark Drive to the Fitchburg Cut-Off Path while transforming a surface parking lot into an active office/lab building with direct proximity to the MBTA Red Line. To reduce dependence on auto travel, the Project will reduce existing parking ratios consistent with the goals of the *Envision Cambridge* Plan. The Project also introduces street level retail on Cambridgepark Drive which will reduce the need for residents and employees to leave and return to the Triangle for some of their restaurant and retail needs.

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## Consistency with Transportation Elements of the Envision Cambridge Plan

Envision Cambridge sets a framework for Alewife, which is designated as an evolving mixed-use district that “should continue to accommodate the bulk of the city’s growth and change, taking advantage of transit proximity, and positively transforming areas characterized by surface parking lots, automobile-oriented uses, and obsolete commercial buildings.” The Plan recommends that Cambridge should seek to enhance its multimodal network locally and expand connections to regional sustainable transportation. The City has also prepared *Alewife District Design Guidelines*, which are “meant to

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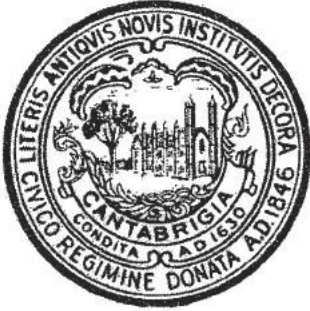


**MUNICIPAL AGENCY /  
PLAN RECEIPT CERTIFICATION**

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD



CITY OF CAMBRIDGE, MASSACHUSETTS

# PLANNING BOARD

CITY HALL ANNEX, 344 BROADWAY, CAMBRIDGE, MA 02139

## CERTIFICATION OF RECEIPT OF PLANS BY CITY OF CAMBRIDGE TRAFFIC, PARKING & TRANSPORTATION

**City Department/Office:** Cambridge Traffic, Parking, and Transportation

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**Project Address:** 101 Cambridgepark Drive

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**Applicant Name:** HCP/King 101 CPD LLC

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For the purpose of fulfilling the requirements of Section 19.20 and/or 6.35.1 and/or 5.28.2 of the Cambridge Zoning Ordinance, this is to certify that this Department is in receipt of the application documents submitted to the Planning Board for approval of a Project Review Special Permit for the above referenced development project: (a) an application narrative, (b) small format application plans at 11" x 17" or the equivalent and (c) Certified Traffic Study. The Department understands that the receipt of these documents does not obligate it to take any action related thereto.

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**Signature of City Department/Office Representative**

**Date**





CITY OF CAMBRIDGE, MASSACHUSETTS

# PLANNING BOARD

CITY HALL ANNEX, 344 BROADWAY, CAMBRIDGE, MA 02139

## CERTIFICATION OF RECEIPT OF PLANS BY CITY OF CAMBRIDGE DEPARTMENT OF PUBLIC WORKS

**City Department/Office:** Cambridge Department of Public Works

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**Project Address:** 101 Cambridgepark Drive

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**Applicant Name:** HCP/King 101 CPD LLC

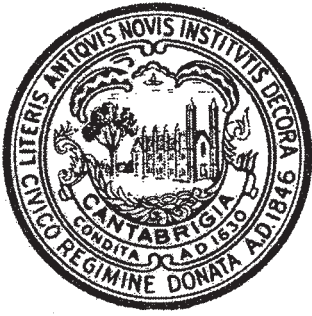
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For the purpose of fulfilling the requirements of Section 19.20 of the Cambridge Zoning Ordinance, this is to certify that this Department is in receipt of the application documents submitted to the Planning Board for approval of a Project Review Special Permit for the above referenced development project: (a) an application narrative and (b) small format application plans at 11" x 17" or the equivalent. The Department understands that the receipt of these documents does not obligate it to take any action related thereto.

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**Signature of City Department/Office Representative**

**Date**



CITY OF CAMBRIDGE, MASSACHUSETTS

# PLANNING BOARD

CITY HALL ANNEX, 344 BROADWAY, CAMBRIDGE, MA 02139

## CERTIFICATION OF RECEIPT OF PLANS BY CITY OF CAMBRIDGE TREE ARBORIST

**City Department/Office:** Cambridge Tree Arborist

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**Project Address:** 101 Cambridgepark Drive

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**Applicant Name:** HCP/King 101 CPD LLC

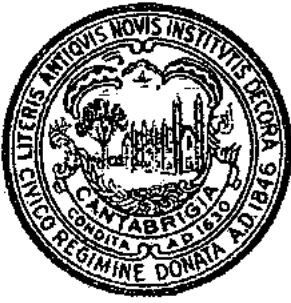
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For the purpose of fulfilling the requirements of Section 4.26, 19.20 or 11.10 of the Cambridge Zoning Ordinance, this is to certify that this Department is in receipt of the application documents submitted to the Planning Board for approval of a MultiFamily, Project Review or Townhouse Special Permit for the above referenced development project: a Tree Study which shall include (a) Tree Survey, (b) Tree Protection Plan and if applicable, (c) Mitigation Plan, twenty one days before the Special Permit application to Community Development.

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**Signature of City Department/Office Representative**

**Date**



CITY OF CAMBRIDGE, MASSACHUSETTS

# PLANNING BOARD

CITY HALL ANNEX, 344 BROADWAY, CAMBRIDGE, MA 02139

## CERTIFICATION OF RECEIPT OF PLANS BY CITY OF CAMBRIDGE WATER DEPARTMENT

City Department/Office: Cambridge Water Department

Project Address: 101 Cambridgepark Drive

Applicant Name: HCP/King 101 CPD LLC

For the purpose of fulfilling the requirements of Section 19.20 of the Cambridge Zoning Ordinance, this is to certify that this Department is in receipt of the application documents submitted to the Planning Board for approval of a Project Review Special Permit for the above referenced development project: (a) an application narrative and (b) small format application plans at 11" x 17" or the equivalent. The Department understands that the receipt of these documents does not obligate it to take any action related thereto.

Signature of City Department/Office Representative

9/4/2019  
Date

CITY OF CAMBRIDGE, MA • PLANNING BOARD • SPECIAL PERMIT APPLICATION



CITY OF CAMBRIDGE, MASSACHUSETTS

# PLANNING BOARD

CITY HALL ANNEX, 344 BROADWAY, CAMBRIDGE, MA 02139

## CERTIFICATION OF RECEIPT OF PLANS BY CITY OF CAMBRIDGE LEED SPECIALIST

**City Department/Office:** Cambridge Sustainability Office

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**Project Address:** 101 Cambridgepark Drive

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**Applicant Name:** HCP/King 101 CPD LLC

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For the purpose of fulfilling the requirements of Section 22.20 of the Cambridge Zoning Ordinance, this is to certify that this Department is in receipt of the application documents submitted to the Planning Board for approval of a Special Permit for the above referenced development project: (a) an application narrative, (b) small format application plans at 11" x 17" or the equivalent and (c) completed LEED Project Checklist for the appropriate LEED building standard, accompanying narrative and affidavit. The Department understands that the receipt of these documents does not obligate it to take any action related thereto.

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**Signature of City Department/Office Representative**

**Date**

# INFRASTRUCTURE NARRATIVES

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD

**STORMWATER INFRASTRUCTURE NARRATIVE**

The proposed stormwater management system will be designed to comply with the most recent City of Cambridge Wastewater and Stormwater Drainage Use Regulations, Concord-Alewife Area Stormwater Management Guidelines, and the MassDEP Stormwater Management Policy for a redevelopment project. The proposed system is designed with respect to rainfall quantities provided in “NOAA Atlas 14, Volume 10, Version 2 Point Precipitation Frequency Estimates.”

Roof runoff from the new 101 Cambridgepark Drive building will be captured in a roof drainage collection system, and ground surface runoff from disturbed areas will be collected in a series of catch basins and landscape area drains. Surface runoff from paved parking and driveway surfaces will be treated on site through the implementation of stormwater pre-treatment Best Management Practices (BMPs) such as deep-sump hooded catch basins and proprietary water quality units. The pre-treatment BMPs will collectively be designed to provide 80% minimum Total Suspended Solids (TSS) removal in accordance with the MassDEP Stormwater Management Policy via deep-sump catch basins and a Contech CDS hydrodynamic separator unit. Additionally, the proposed project will discharge stormwater to Alewife Brook and is subject to its Total Maximum Daily Load (TMDL) for phosphorus. The TMDL assigns a 65% minimum phosphorus removal rate for discharges to Alewife Brook. The proposed project will achieve the minimum phosphorus removal rate via implementation of proprietary nutrient removal filters contained within existing and proposed catch basins and conversion of impervious surfaces to pervious surfaces.

The treated surface runoff and the new building roof runoff will discharge to an underground stormwater detention system to be located south and east of the existing 87 Cambridgepark Drive building. The system will comprise 2,120 R-Tank 1.5 modules embedded in crushed stone. The modules will be lined with an impermeable liner due to the system’s proximity to the seasonal high groundwater elevation and the unsuitability of on-site soils for infiltration. The combined runoff will discharge at controlled rates via precast outlet control manhole to the existing stormwater conveyance system located in Cambridgepark Drive, whereafter it will enter the 66-inch Alewife Brook conduit pipe running north across the site and discharge via headwall to Alewife Brook. The stormwater management system has been designed to mitigate the peak discharge difference of the 25-year post-development peak rate of runoff relative to the 2-year pre-development peak rate of runoff per the City of Cambridge Wastewater and Stormwater Management Guidance.

<b>STORM EVENT</b>	<b>PRE-DEVELOPMENT PEAK RUNOFF (CFS)</b>	<b>POST-DEVELOPMENT PEAK RUNOFF (CFS)</b>	<b>PEAK RUNOFF COMPARISON (CFS)</b>
2-Year	4.36	1.84	-2.52
10-Year	7.71	3.12	-4.59
25-Year	10.32	3.87	-6.45
100-Year	15.65	6.80	-8.85

A Stormwater and Wastewater Infrastructure Permit (SWIP) for stormwater and wastewater discharges is required under Article 1, Section 8 (a) of the City of Cambridge Wastewater and Stormwater Drainage Use Regulations and shall be issued by the City of Cambridge Department of Public Works.

END

**SEWER INFRASTRUCTURE NARRATIVE**

The Project site currently supports 87 Cambridgepark Drive, a 63,851 SF three-story life sciences building together with its supporting site and utility infrastructure. Sanitary sewer discharging from the existing building is collected and discharges to an existing 48” MWRA sewer collector located within a sewer easement on the Property. Lab waste from the building is separately collected and treated via an acid neutralization tank prior to connection to the same 48” MWRA sewer collector.

The Applicant proposes to construct a 141,834 SF five-story life sciences building separate from 87 Cambridgepark Drive, but on the same parcel. The sanitary sewage for the Project will be collected internally and discharged via an 8” dia. sewer service outside the building. This sewer service will extend along the east edge of the building to a sewer holding tank, and then discharge to the existing municipal sewer collector.

Lab waste will be separated from sanitary waste within the building and diverted to an acid neutralization tank located within a dedicated room adjacent to the loading dock. The acid neutralization tank will then discharge to the 8” dia. building sewer service.

The first-floor building program includes 2,700 SF retail space. In the event a café or restaurant tenant occupies the space, kitchen waste will be separated from sanitary waste and routed through an external grease trap/interceptor prior to discharge to the municipal sewer collector.

The Applicant and its design team are working with the Cambridge Department of Public Works to coordinate the new sanitary connections and locations.

Based upon City of Cambridge Wastewater and Stormwater Drainage Use Regulations, 314 CMR 7.00 – The Commonwealth’s Sewer System Extension and Connection Permit Program, and 310 CMR 15.000 – State Environmental Code (Title 5), the proposed building and uses will generate approximately 14,431 gallons per day (GPD) as demonstrated in Table 1. The threshold for a MassDEP Sewer Connection Permit is 50,000 GPD and therefore is not required.

**Table 1. – Proposed Sanitary Sewer Discharge Estimate**

USE	GROSS FLOOR AREA	RATE -(GPD/SF)*	DISCHARGE ESTIMATE
Office/Laboratory <sup>1</sup>	139,134	75 GPD/1000 GSF	10,435
Retail	2,700	50 GPD/1000 GSF	135
Restaurant	100 seats	35 GPD/SEAT	3,500
Parking Garage	123,375	0.5 GPD/1000 GSF	62
<b>TOTAL ESTIMATED SEWAGE DISCHARGE</b>			<b>14,132 GPD</b>
*314 CMR 7.00: SEWER SYSTEM EXTENSION AND CONNECTION PERMIT PROGRAM			

Footnotes:

1. The Office/Laboratory gross floor area excludes mechanical penthouse.

The City of Cambridge inflow/infiltration (I/I) mitigation requirements do not apply to this Project because proposed flows do not exceed the 15,000 GPD threshold for I/I mitigation. The Project does not require a Sewer Connection Permit and it is not located within a City area where mitigation is required.

A Stormwater and Wastewater Infrastructure Permit (SWIP) for stormwater and wastewater discharges is required under Article 1, Section 8 (a) of the City of Cambridge Wastewater and Stormwater Drainage Use Regulations and shall be issued by the City of Cambridge Department of Public Works.

END



**WATER SERVICE INFRASTRUCTURE NARRATIVE**

The domestic water estimate for the proposed 101 Cambridgepark Drive building is based on the projected approximate daily wastewater flow. Per 314 CMR 7.00, wastewater flow for retail and laboratory/office uses is based on floor area. Assuming a 1.1 usage and loss factor on the design flows summarized in Table 1 to account for consumption not resulting in direct wastewater discharge, the approximate water demand is 1.1 x 14,132 gallons per day (GPD) or 15,546 GPD.

**Table 1. – Proposed Sanitary Sewer Discharge Estimate**

USE	GROSS FLOOR AREA	DESIGN FLOW RATE <sup>1</sup>	DISCHARGE ESTIMATE
Office/Laboratory <sup>2</sup>	139,134	75 GPD/1000 GSF	10,435
Retail	2,703	50 GPD/1000 GSF	135
Restaurant	100 seats	35 GPD/SEAT	3,500
Parking Garage	123,375	0.5 GPD/1000 GSF	62
<b>TOTAL ESTIMATED SEWAGE DISCHARGE</b>			<b>14,132 GPD</b>
Footnotes:			
1. Per 314 CMR 7.00: Sewer System Extension and Connection Permit Program.			
2. The Office/Laboratory gross floor area excludes mechanical penthouse.			

Per the direction of the City of Cambridge Water Department, and prior to the commencement of construction of the proposed 101 Cambridgepark Drive building, the existing water service for the existing 87 Cambridgepark Drive building shall be relocated as a single, 10-inch water service to connect via anchor tee with three-way valving to the existing water main in Cambridgepark Drive. The single service shall split into an 8-inch fire prevention service and 6-inch domestic water service prior to entering the existing 87 Cambridgepark Drive building. Shut-off and post indicator valves shall be installed per Cambridge Water Department requirements and specifications. The existing water service connection serving 87 Cambridgepark Drive shall be “discontinued” at the water main in Cambridgepark drive, such that the existing anchor tee and attached valves shall be cut out and replaced with a section of pipe matching the size of the main and coupled at each end of the new section with solid sleeve couplings. The “discontinuation” of the existing single service line for 87 Cambridgepark Drive shall not be conducted until installation of the relocated service is substantially complete. All required discontinuances of service will require a shutdown of the corresponding water main and all logistical measures associated with the shutdown, including but not limited to notification of affected water users and coordination with the Cambridge Water and Fire Departments. Expenses associated with water main improvements, “discontinuation” of abandoned water services, and testing and field observation shall be borne by the Applicant.

Based on plans of record and utility infrastructure information from the City’s online GIS database, and per Article 3 Section 3 of the Cambridge Water Department Construction Standards for laboratories and biotech buildings, domestic water service to the proposed 101 Cambridgepark Drive building is to be provided by a new primary domestic service line with three-way valving from the above referenced 10-inch water main in Cambridgepark Drive. A new primary fire service line will also be connected to the 10-

inch water main in Cambridgepark Drive, as well as a dedicated 8-inch water main to serve two new yard hydrants to be located east of the existing and proposed buildings. The new domestic service laterals will be equipped with a dedicated meter. Hydrant flow tests will be completed, with expenses borne by the applicant, prior to completion of final design to verify adequate flow and pressure for the proposed building's sprinkler system. Additionally, the need for a fire service pump to boost pressure in the fire suppression system will also be analyzed. All water infrastructure improvements for 101 Cambridgepark Drive and appurtenances thereto shall conform to Cambridge Water Department standards and specifications.

END



October 4, 2019

Mr. H. Theodore Cohen, Chairman  
Cambridge Planning Board  
City Hall Annex  
344 Broadway  
Cambridge, MA 02139

Re: 87/101 Cambridgepark Drive  
Compensatory Flood Storage Certification

Dear Mr. Cohen and Members of the Board:

As required by Section 20.75 of the Cambridge Zoning Ordinance and by the Massachusetts Wetlands Protection Act, the Project site's flood storage capacity was evaluated for storm events up to and including the 100-year storm to determine if the proposed Project would result in a net reduction in on-site flood storage capacity. Additionally, pursuant to the City of Cambridge Climate Change Vulnerability Assessment initial recommendations, the Project is designed with consideration of anticipated 100-year storm events and flood elevations associated with the Vulnerability Assessment's model for the Year 2070. Per the City of Cambridge DPW, the Project implements the following design standards:

1. Building ground floor areas (with exception of some entry vestibules), loading doors, and garage entrance driveway will be located above the theoretical 2070 | 100-year precipitation El.=20.0.
2. Building main entry vestibules on the south and north sides of the building are designed to flood under, and recover from, the theoretical 2070 100-year Sea Level Rise/Storm Surge (SLR/SS) El. =22.5 without flooding the main first floor lobby or tenant areas.
3. Building garage entrance will be equipped with a passive-deployment Floodbreak™ passive flood protection deployment system at the garage entrance gate and trench drain inlet to prevent flood waters from the theoretical 2070 100-year SLR/SS event from entering the below-grade garage.
4. The Project provides on-site compensatory flood storage exceeding the existing condition via site grading and at flood storage areas beneath raised outdoor plaza. No flood storage is provided within the proposed building footprint, and no actively deployed flood protection measures are necessary to protect the main building first floor from the theoretical 2070 100-year SLR/SS event.

Highpoint has determined that the construction of the Project as proposed will result in a net loss of the site's available flood storage for certain incremental flood elevations due to building displacement within the flood plain. Therefore, in accordance with the Zoning Ordinance and the Massachusetts Wetlands Protection Act (310 CMR 14.00), the flood loss will be compensated for on an incremental elevation basis, within which the existing flood storage volume is displaced.

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Highpoint Engineering  
Canton Corporate Place  
45 Dan Road | Suite 140  
Canton, MA 02021

Page 1 of 2



To compensate for the displaced flood storage on site, the proposed outdoor plaza between the two buildings will be elevated creating an interstitial space between the plaza structure and finished grade below dedicated to providing compensatory flood storage. The Project will be designed to enable free flow between the areas underlying the deck and other depressed landscape areas east of the existing 87 Cambridgepark drive building and west and southwest of the proposed 101 Cambridgepark Drive building. Additionally, the driveway and parking area at the southeast corner of the proposed building and the landscape and hardscape areas between the proposed building and Cambridgepark Drive will be graded to provide additional flood storage. The overall flood storage on site is designed to be hydraulically contiguous to the existing, non-displaced flood plain within Cambridgepark Drive, eliminating the potential for isolated flood storage areas.

In conclusion the Project provides sufficient compensatory flood storage up the existing 100-year flood elevation (El. 18.4) via site grading and below-plaza interstitial areas to compensate for the loss of flood storage volume due to development of the Project. The Project as designed provides an additional 3,985 cubic feet of available flood storage on site, providing a contingency for use by the Project and adjacent properties.

The Flood Report and associated design drawings summarize the evaluation results and the incremental and cumulative flood storage impacts and mitigation for the Project. The attached Flood Report will be submitted as part of a Notice of Intent Application to the Cambridge Conservation Commission.

In accordance with Section 20.75 of the Zoning Ordinance and with the requirements of the Wetlands Protection Act, Highpoint hereby certifies that the Project and the associated site improvements (as presented in the Special Permit package) provide the required compensation for the flood storage losses due to the construction of the proposed building, associated vehicular and bicycle parking and circulation improvements, and site infrastructure. The site's flood storage capabilities will not be adversely affected by the construction of said improvements. Additionally, the project has been designed to meet the City of Cambridge Climate Change Vulnerability Assessment initial recommendations.

Best regards,

**HIGHPOINT ENGINEERING**

A handwritten signature in blue ink, appearing to read 'Douglas J. Hartnett', written over a faint blue circular stamp or watermark.

Douglas J. Hartnett, P.E.

President, MA Registration Number 37796

**FLOOD REPORT**

A portion of the Project is located within Bordering Land Subject to Flooding (BLSF; the Flood Plain) as defined by the Massachusetts Wetlands Protection Act (the WPA). A Flood Insurance Study of the City of Cambridge was performed and published June 4, 2010. The Study established flood elevations for the 10-year, 50-year, 100-year, and 500-year floods adjacent to Little River north of Cambridgepark Drive.

Table 1 summarizes current FEMA flood elevations expressed in North American Vertical Datum 1988 (NAVD 1988) and City of Cambridge Base (CCB) elevations.

**Table 1. – Present-Day FEMA Flood Elevations\***

<b>FLOOD FREQUENCY</b>	<b>FLOOD ELEVATION (NAVD 1988)</b>	<b>FLOOD ELEVATION (CCB)</b>
10-Year	3.1 feet	14.7 feet
50-Year	4.9 feet	16.5 feet
100-Year	6.8 feet	18.4 feet
500-Year	10.7 feet	22.4 feet

The WPA requires that no project shall result in more flood volume displacement than that which exists on site under existing conditions and that any lost flood storage shall be compensated for under any project that results in loss of flood storage for each elevation increment in which the loss occurs. Under the proposed Project, compensatory flood storage will be provided through site grading, including storage provisions under a raised outdoor deck between the two buildings.

Calculations to determine the flood storage volume available under the proposed Project have been conducted for each elevation increment between the lowest existing grade within the on-site Flood Plain and the current flood elevation of 18.4 feet CCB. The available flood storage under the proposed Project was compared to the available storage under existing conditions for the same elevation increments.

The available flood storage volumes for the existing and proposed conditions were calculated using AutoDesk AutoCAD Civil 3D 2018 software and the results are summarized in this Report. The software compared the existing topographic data of the Project site to each one-foot incremental flood elevation up to the proposed 100-year flood elevation of 18.4 feet CCB. The total volume per increment was calculated and tabulated as provided in Table 2. The same methodology was applied to the proposed topographic data for the Project site, and the results thereof are provided in Table 3.

**Table 2. – Existing Available Flood Storage**

ELEVATION INCREMENT (FT)	EXISTING CUMULATIVE AVAILABLE FLOOD STORAGE (CY)	EXISTING INCREMENTAL AVAILABLE FLOOD STORAGE (CY)
Up to 16.0	0	0
16.0 to 17.0	6	6
17.0 to 18.0	107	101
18.0 to 18.4	335	228

**Table 3. – Proposed Available Flood Storage**

ELEVATION INCREMENT (FT)	EXISTING CUMULATIVE AVAILABLE FLOOD STORAGE (CY)	EXISTING INCREMENTAL AVAILABLE FLOOD STORAGE (CY)
Up to 16.0	0	0
16.0 to 17.0	6	6
17.0 to 18.0	253	247
18.0 to 18.4	555	302

To determine the total change in available flood storage for the post-development condition of the proposed Project, the total available post-development storage volume was compared to that of the pre-development condition for each one-foot elevation increment. Table 4 summarizes the net flood storage compensation for the Project.

**Table 4. – Net Incremental Available Flood Storage**

ELEVATION INCREMENT (FT)	EXISTING INCREMENTAL AVAILABLE FLOOD STORAGE (CY)	PROPOSED INCREMENTAL AVAILABLE FLOOD STORAGE (CY)	NET INCREMENTAL AVAILABLE FLOOD STORAGE (CY)
Up to 16.0	0	0	0
16.0 to 17.0	6	6	0
17.0 to 18.0	101	247	+146
18.0 to 18.4	228	302	+74

As demonstrated in Table 4, the proposed Project will result in a net increase in available flood storage for the site. The increase in available flood storage is achieved via re-grading of pedestrian and parking areas and creation of contiguous depressions under the proposed outdoor raised deck and within expanded landscaped open space areas adjacent to the existing and proposed buildings.

The depressed areas under the raised deck and within the expanded landscaped open space areas are designed for hydraulic connectivity both between each other and with the overall Flood Plain within Cambridgepark Drive and adjacent to Little River to the north. Flood waters will be able to flow under the raised outdoor deck both under advancing and receding conditions through large-opening vertical grates to prevent restriction of free flow due to debris accumulation and to provide ease of maintenance and inspection when necessary. The proposed available flood storage calculations also account for an assumed volumetric loss due to a raised deck foundation system comprising 2-foot diameter Sonotube-formed concrete piers spaced 10 feet on center.

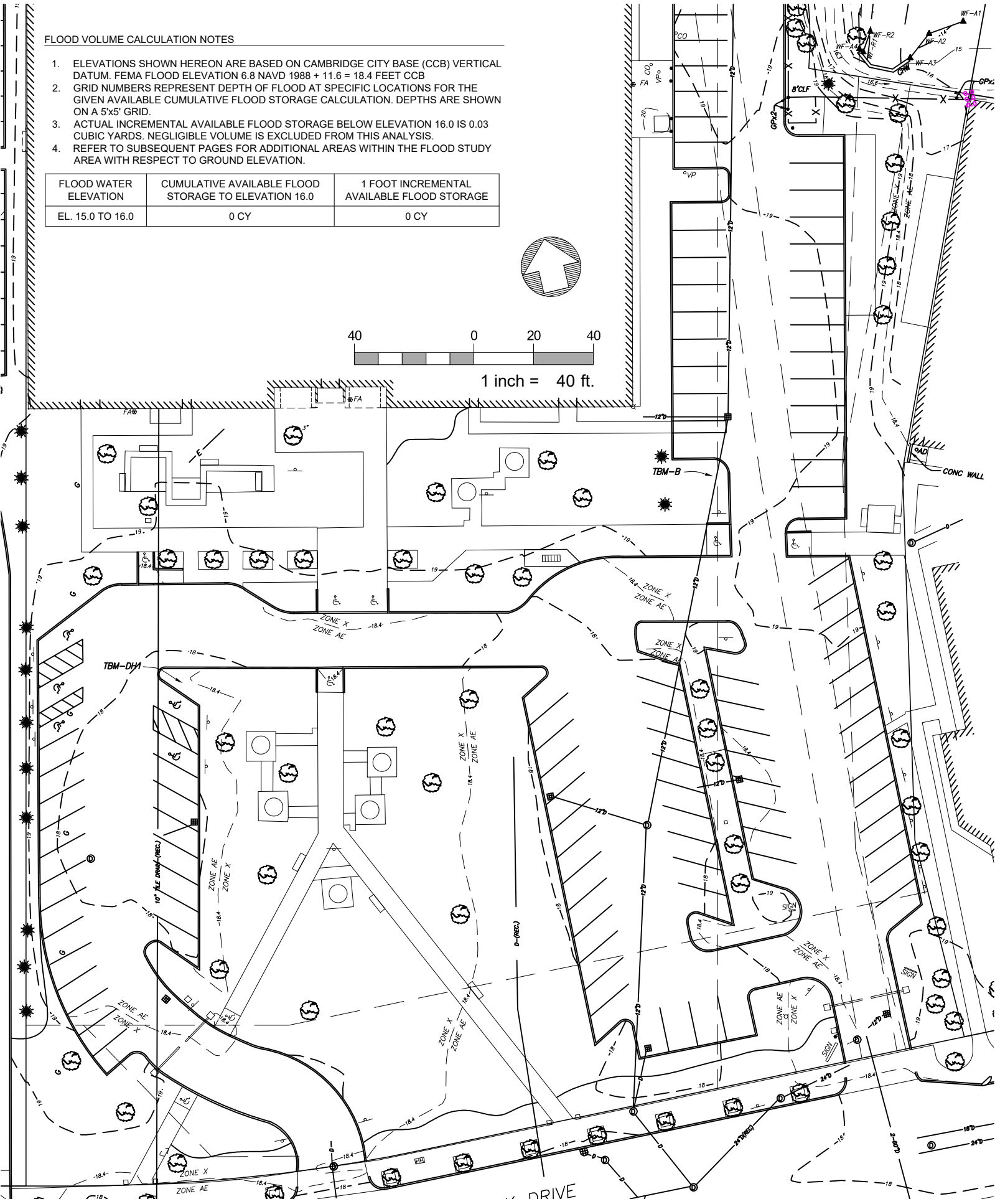
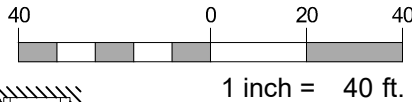
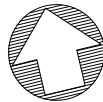
In accordance with the Wetlands Protection Act, the proposed Project incorporates site improvements provide the necessary flood storage provisions to compensate for flood storage displacement resulting from construction of the Project and provides connectivity of the on-site flood volumes to the overall Alewife Brook/Little River Flood Plain.

END

**FLOOD VOLUME CALCULATION NOTES**

1. ELEVATIONS SHOWN HEREON ARE BASED ON CAMBRIDGE CITY BASE (CCB) VERTICAL DATUM. FEMA FLOOD ELEVATION 6.8 NAVD 1988 + 11.6 = 18.4 FEET CCB
2. GRID NUMBERS REPRESENT DEPTH OF FLOOD AT SPECIFIC LOCATIONS FOR THE GIVEN AVAILABLE CUMULATIVE FLOOD STORAGE CALCULATION. DEPTHS ARE SHOWN ON A 5'x5' GRID.
3. ACTUAL INCREMENTAL AVAILABLE FLOOD STORAGE BELOW ELEVATION 16.0 IS 0.03 CUBIC YARDS. NEGLIGIBLE VOLUME IS EXCLUDED FROM THIS ANALYSIS.
4. REFER TO SUBSEQUENT PAGES FOR ADDITIONAL AREAS WITHIN THE FLOOD STUDY AREA WITH RESPECT TO GROUND ELEVATION.

FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 16.0	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 15.0 TO 16.0	0 CY	0 CY



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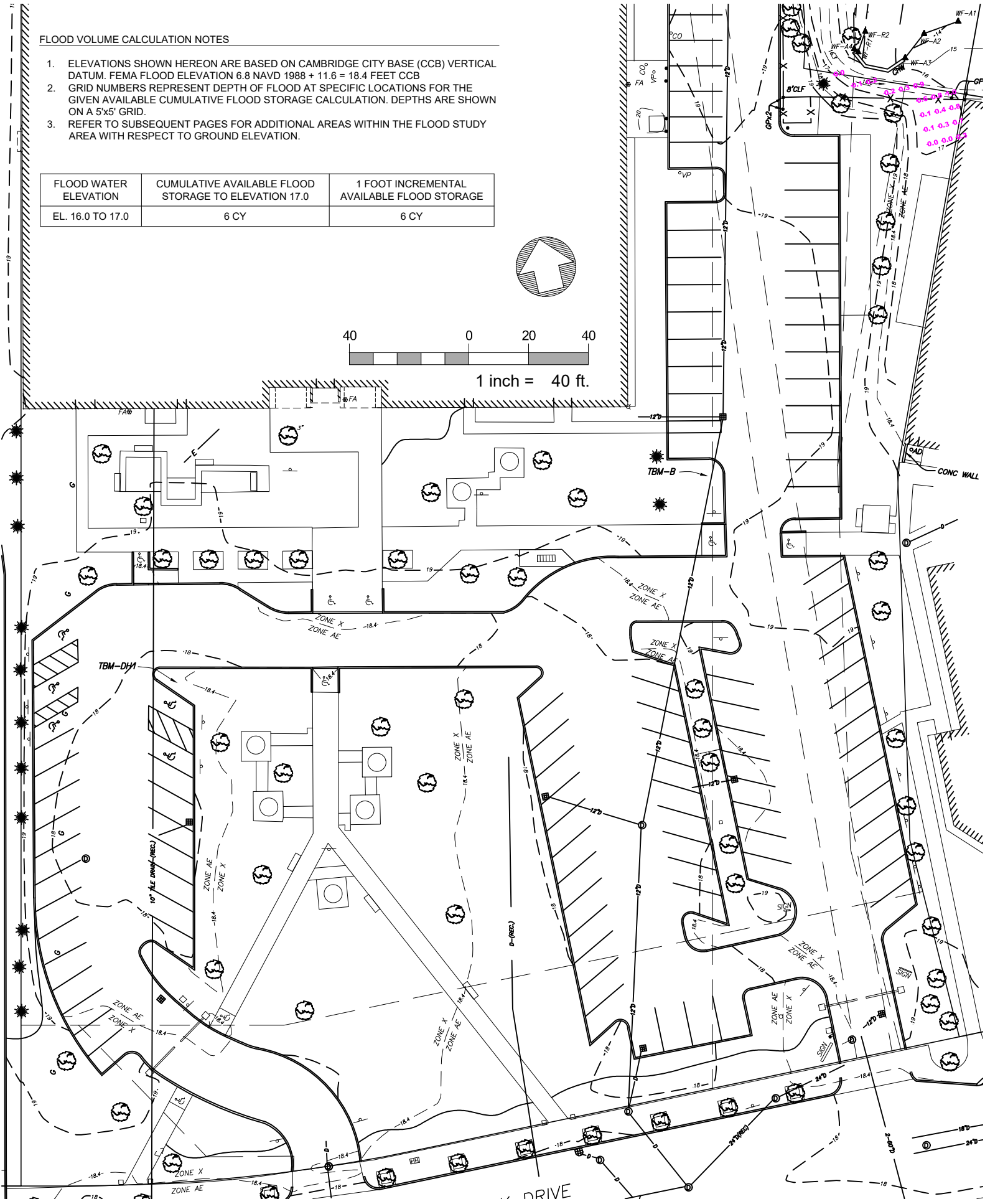
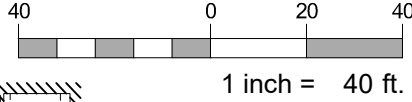
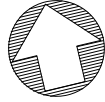
**EXISTING AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 16.0



**FLOOD VOLUME CALCULATION NOTES**

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FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 17.0	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 16.0 TO 17.0	6 CY	6 CY



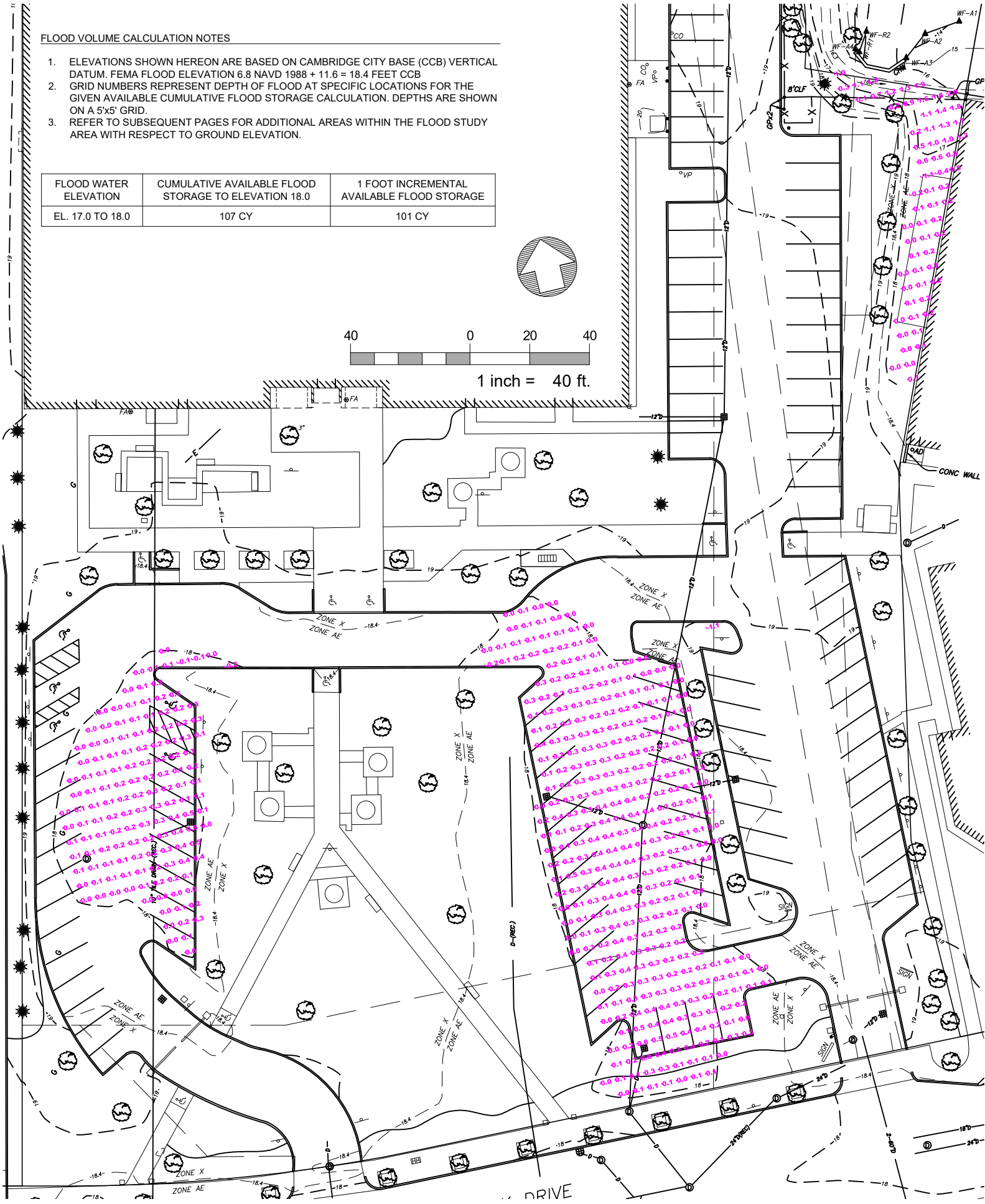
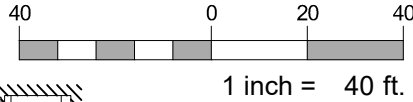
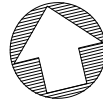
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**EXISTING AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 17.0

**FLOOD VOLUME CALCULATION NOTES**

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3. REFER TO SUBSEQUENT PAGES FOR ADDITIONAL AREAS WITHIN THE FLOOD STUDY AREA WITH RESPECT TO GROUND ELEVATION.

FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 18.0	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 17.0 TO 18.0	107 CY	101 CY



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87 - 101 Cambridgepark Drive

**EXISTING AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 18.0

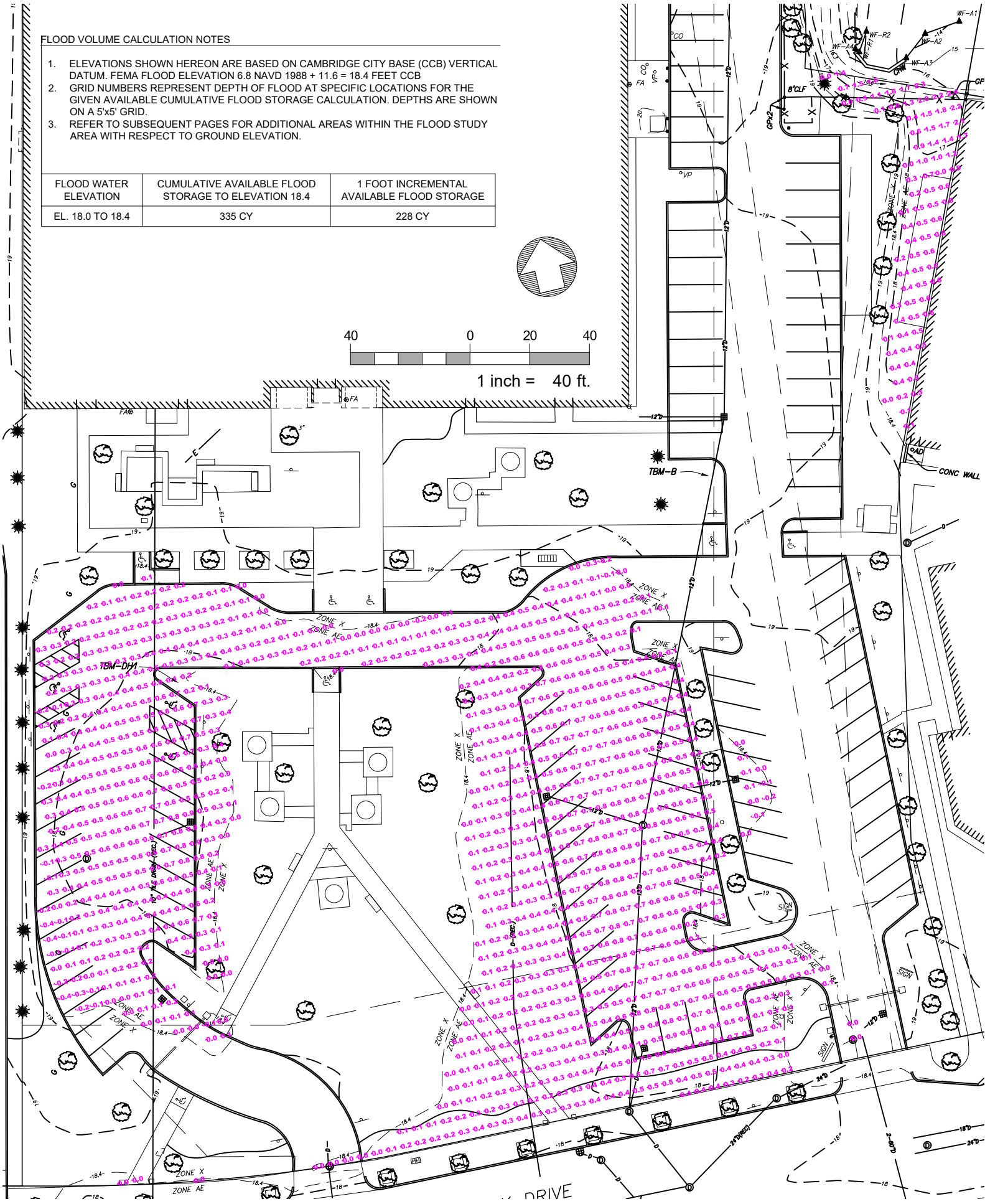
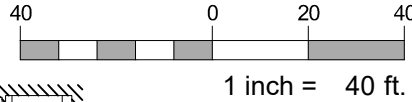
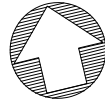
Special Permit Application (Volume 1)

87 / 101 CAMBRIDGEPARK DRIVE  
 CAMBRIDGE, MASSACHUSETTS  
 OCTOBER 4, 2019

FLOOD VOLUME CALCULATION NOTES

1. ELEVATIONS SHOWN HEREON ARE BASED ON CAMBRIDGE CITY BASE (CCB) VERTICAL DATUM. FEMA FLOOD ELEVATION 6.8 NAVD 1988 + 11.6 = 18.4 FEET CCB
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3. REFER TO SUBSEQUENT PAGES FOR ADDITIONAL AREAS WITHIN THE FLOOD STUDY AREA WITH RESPECT TO GROUND ELEVATION.

FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 18.4	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 18.0 TO 18.4	335 CY	228 CY



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**EXISTING AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 18.4

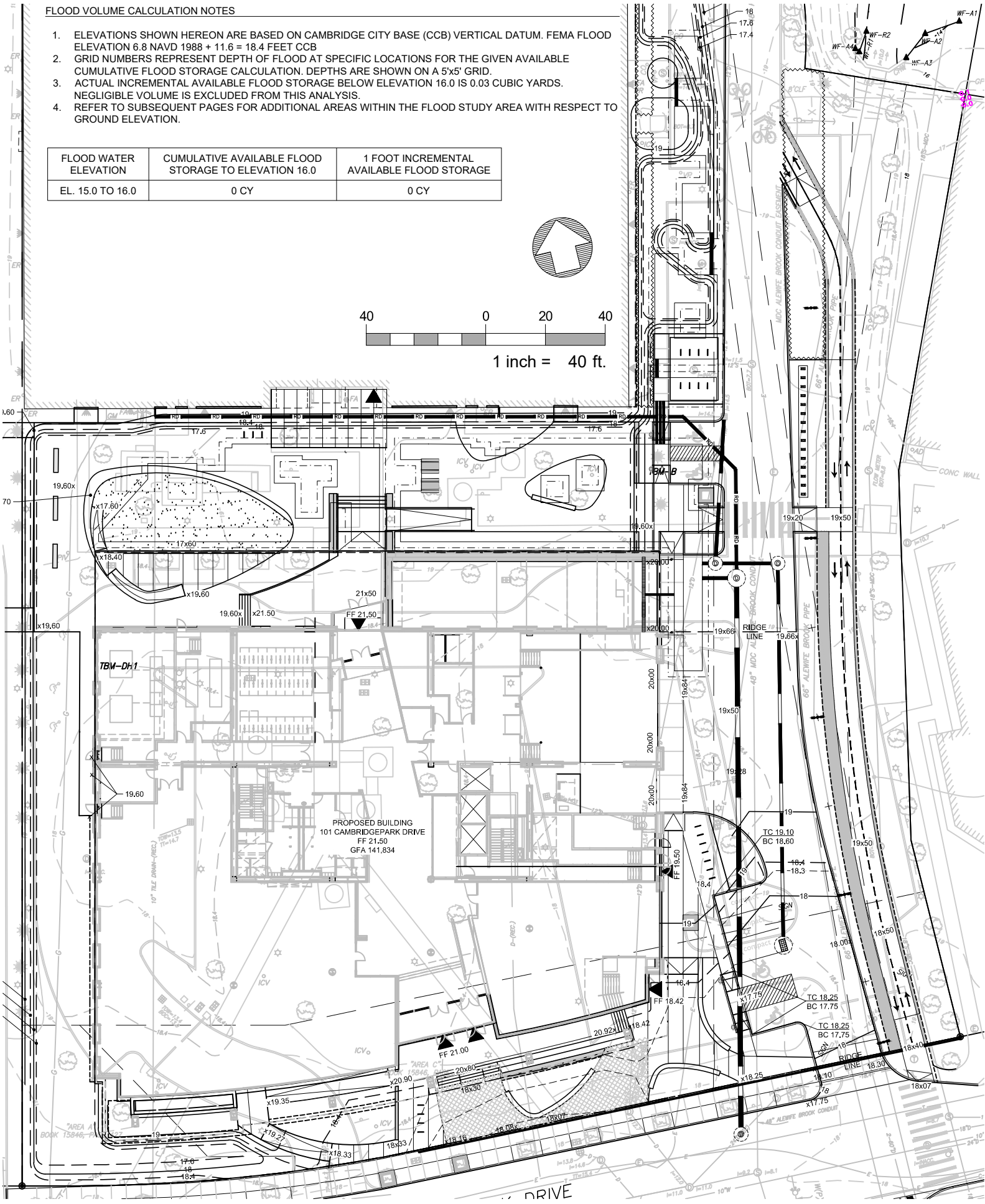
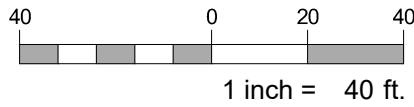
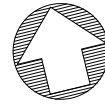
Special Permit Application (Volume 1)

87 / 101 CAMBRIDGE PARK DRIVE  
 CAMBRIDGE, MASSACHUSETTS  
 OCTOBER 4, 2019

FLOOD VOLUME CALCULATION NOTES

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4. REFER TO SUBSEQUENT PAGES FOR ADDITIONAL AREAS WITHIN THE FLOOD STUDY AREA WITH RESPECT TO GROUND ELEVATION.

FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 16.0	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 15.0 TO 16.0	0 CY	0 CY



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**PROPOSED AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 16.0

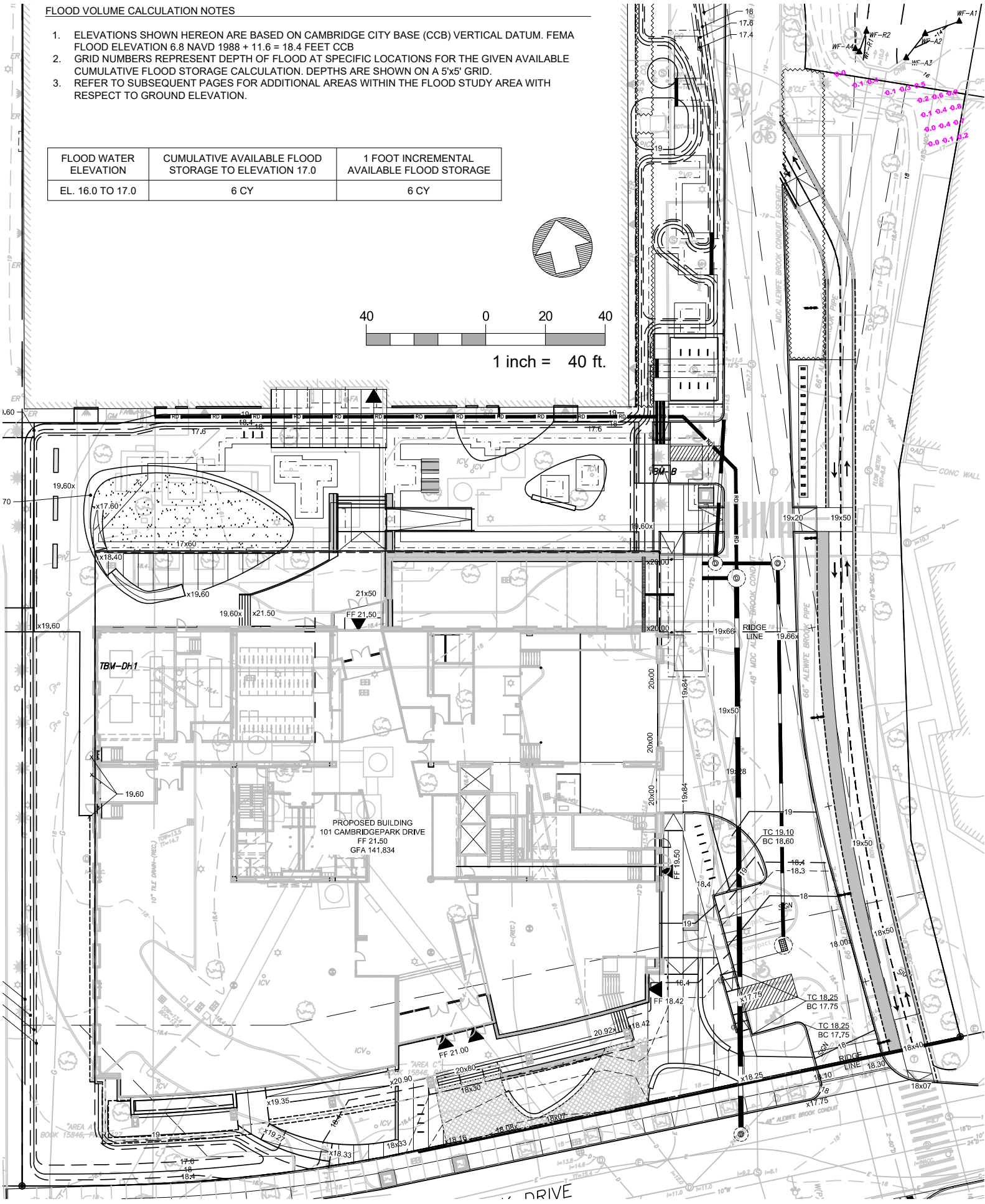
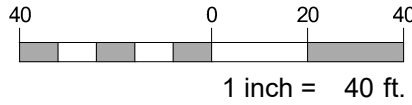
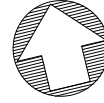
Special Permit Application (Volume 1)

87 / 101 CAMBRIDGEPARK DRIVE  
 CAMBRIDGE, MASSACHUSETTS  
 OCTOBER 4, 2019

**FLOOD VOLUME CALCULATION NOTES**

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FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 17.0	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 16.0 TO 17.0	6 CY	6 CY



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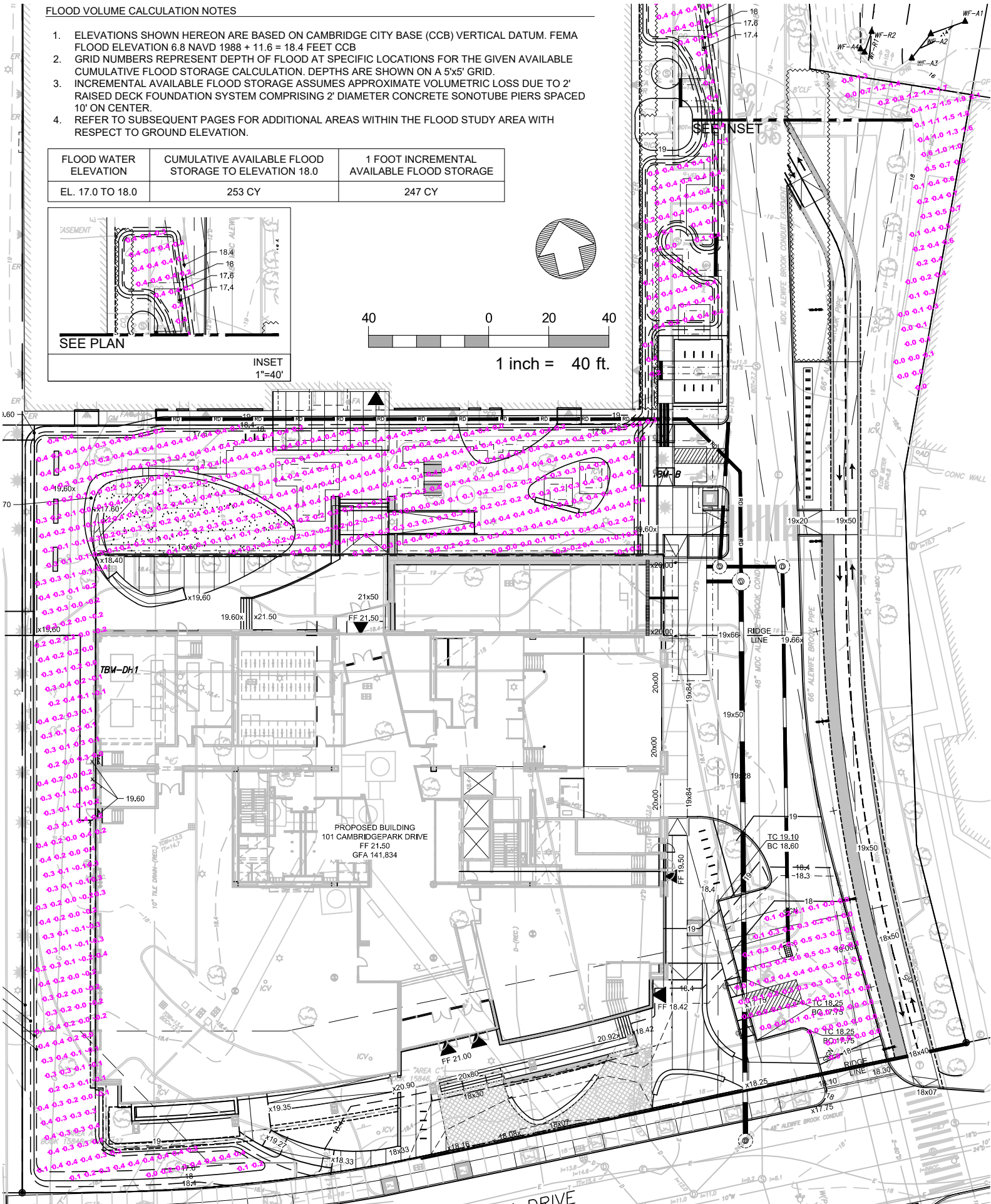
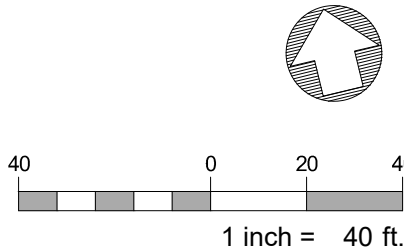
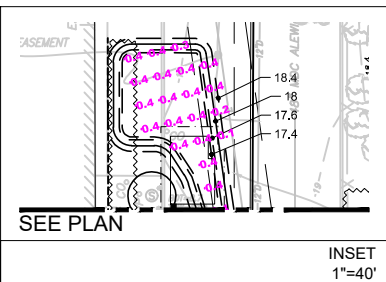
**PROPOSED AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 17.0

Special Permit Application (Volume 1)

FLOOD VOLUME CALCULATION NOTES

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3. INCREMENTAL AVAILABLE FLOOD STORAGE ASSUMES APPROXIMATE VOLUMETRIC LOSS DUE TO 2' RAISED DECK FOUNDATION SYSTEM COMPRISING 2' DIAMETER CONCRETE SONOTUBE PIERS SPACED 10' ON CENTER.
4. REFER TO SUBSEQUENT PAGES FOR ADDITIONAL AREAS WITHIN THE FLOOD STUDY AREA WITH RESPECT TO GROUND ELEVATION.

FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 18.0	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 17.0 TO 18.0	253 CY	247 CY



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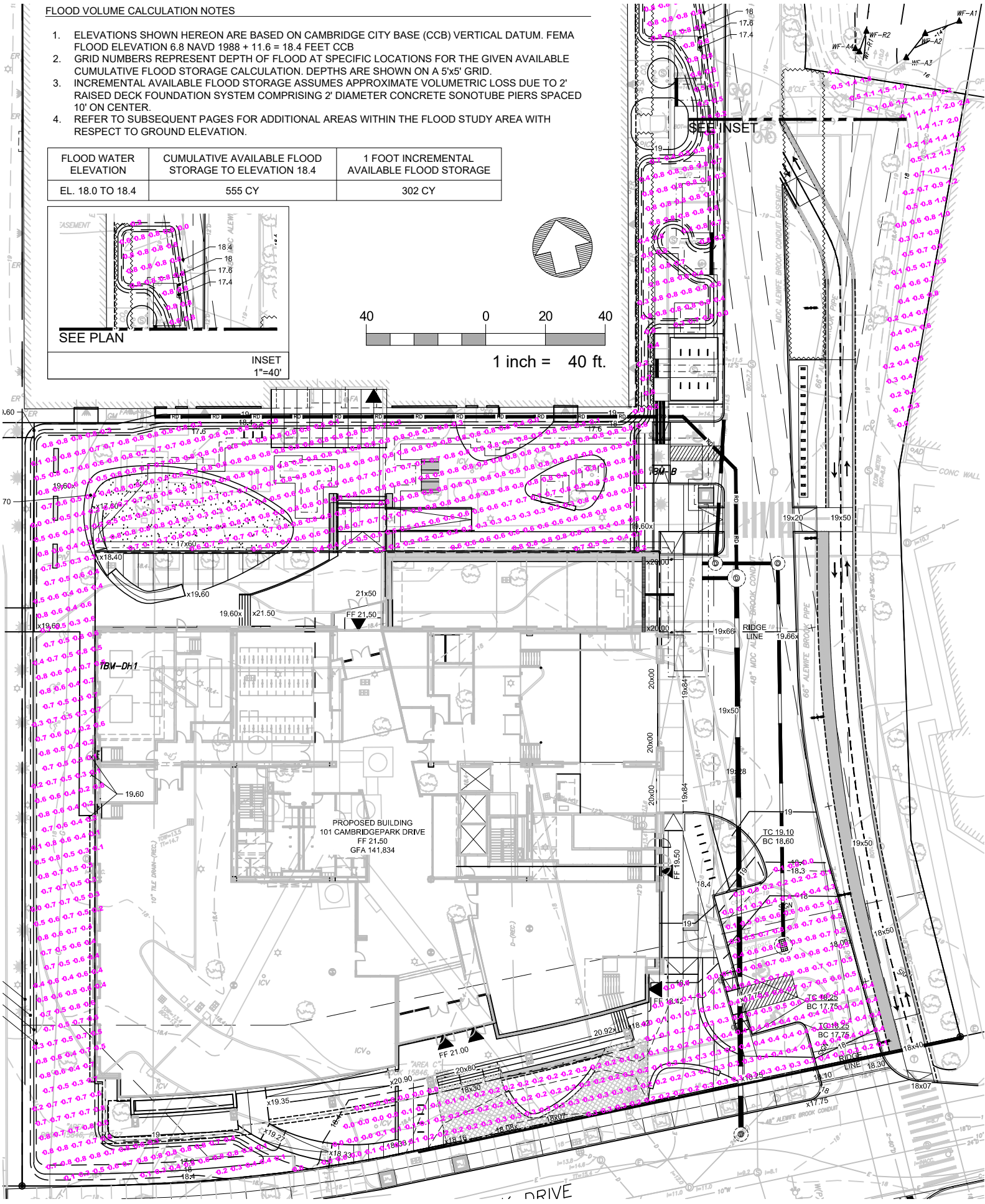
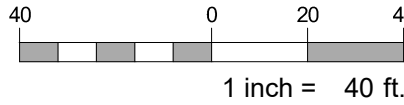
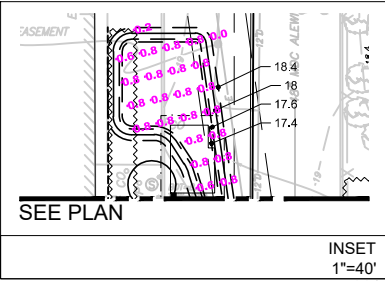
**PROPOSED AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 18.0

Special Permit Application (Volume 1)

FLOOD VOLUME CALCULATION NOTES

1. ELEVATIONS SHOWN HEREON ARE BASED ON CAMBRIDGE CITY BASE (CCB) VERTICAL DATUM. FEMA FLOOD ELEVATION 6.8 NAVD 1988 + 11.6 = 18.4 FEET CCB
2. GRID NUMBERS REPRESENT DEPTH OF FLOOD AT SPECIFIC LOCATIONS FOR THE GIVEN AVAILABLE CUMULATIVE FLOOD STORAGE CALCULATION. DEPTHS ARE SHOWN ON A 5'x5' GRID.
3. INCREMENTAL AVAILABLE FLOOD STORAGE ASSUMES APPROXIMATE VOLUMETRIC LOSS DUE TO 2' RAISED DECK FOUNDATION SYSTEM COMPRISING 2' DIAMETER CONCRETE SONOTUBE PIERS SPACED 10' ON CENTER.
4. REFER TO SUBSEQUENT PAGES FOR ADDITIONAL AREAS WITHIN THE FLOOD STUDY AREA WITH RESPECT TO GROUND ELEVATION.

FLOOD WATER ELEVATION	CUMULATIVE AVAILABLE FLOOD STORAGE TO ELEVATION 18.4	1 FOOT INCREMENTAL AVAILABLE FLOOD STORAGE
EL. 18.0 TO 18.4	555 CY	302 CY



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**PROPOSED AVAILABLE FLOOD STORAGE PLAN**  
 BELOW ELEVATION 18.4

Special Permit Application (Volume 1)

87 / 101 CAMBRIDGEPARK DRIVE  
 CAMBRIDGE, MASSACHUSETTS  
 OCTOBER 4, 2019



# SUSTAINABLE DESIGN AND DEVELOPMENT

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD



# 101 Cambridgepark Drive

Cambridge, MA

## Article 22 Sustainability Narrative

July 8, 2019



**Prepared for:** King Street Properties

**Prepared by:** enviENERGY Studio

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## Introduction

The 101 Cambridgepark Drive (101 CPD) project is being designed to be a first-class research and development facility in Cambridge, Massachusetts. The project is a 5-story core and shell building, approximately 165,000 SF including a mechanical penthouse, with three levels of underground parking. Sustainability is an important design and construction priority for King Street Properties and the project team, and therefore, they will evaluate and implement measures to reduce energy and water consumption to improve the efficiency and useful life of building systems and infrastructure, and to reduce the burdens imposed by buildings on city services, the environment, and the public health.

The Project team includes several LEED Accredited Professionals and the sustainability efforts will be overseen by Samira Ahmadi, BEMP, LEED AP, the project LEED and Energy Consultant. The project team participated in a sustainable design charrette early in the design process to identify the environmental design goals and discussed the LEED program impact on the design and build consensus.

A LEED checklist is provided at the end of this section to identify credits that are going to be pursued for this project, highlights of which are included below. The 101 Cambridgepark Drive project will be registered with USGBC and will follow the requirements of LEED v4 for Core and Shell program during the design and construction. The project team is currently targeting a minimum of LEED Silver certification with a total of 55 out of a possible 110 points in the LEED BD+C rating system. An additional 22 points are undergoing study to determine the feasibility of attainment.

LEED checklist summary:

Integrative Process	1 Point	
Location and Transportation	9 Points	4 Possible Points
Sustainable Site	7 Points	1 Possible Points
Water Efficiency	6 Points	1 Possible Points
Energy and Atmosphere	12 Points	8 Possible Points
Materials and Resources	7 Points	4 Possible Points
Indoor Environmental Quality	5 Points	2 Possible Points
Innovation and Design Process	5 Points	1 Possible Points
Regional Priority	3 Point	1 Possible Points
<b>Total Points</b>	<b>55 Points</b>	<b>22 Possible Points</b>

### Pathway to LEED Gold Certification

The current design is targeting LEED v4 Silver certification. The project team has identified 17 “Maybe+” and 5 “Maybe-” points that could help the project with achieving a Gold level certification. As design progresses, the proponent will investigate the financial feasibility of the targeted “Maybe” credits and whether a Gold level certification can be achieved for this project.

**Affidavit**

As the lead Sustainability Consultant overseeing the planning, design and construction of the 101 Cambridgepark Drive, I, Samira Ahmadi, certify that I am knowledgeable of the project’s green building strategies, designs, plans and details and to the best of my knowledge this project has been planned and designed so as to meet the prerequisites and earn the credits necessary to achieve Silver level at minimum (minimum for Silver level is 50 points) using the LEED BD+C for Core and Shell v4 Rating System. The referenced project has been designed to meet the Green Building requirements under Article 22 of the Cambridge Zoning Ordinance.



Samira Ahmadi, BEMP, LEED AP BD+C, ID+C, Homes  
LEED Administrator and Sustainability Consultant



## LEED Project Scope and Strategy

### General Project Information

<i>Building Area</i>	145,808 GSF + Mechanical Penthouse: 19,434 SF + Parking: 103,941 SF
<i>Occupancy - FTE (LEED v4 C&amp;S Default Occupancy)</i>	50% Laboratory + 50% Office 536 (Office: 250 SF/person, Lab: 400 SF/person)
<i>Parking Spaces</i>	247 spaces in underground garage + 22 surface 158 spaces are dedicated to 101 CPD
<i>Site Area</i>	132,745 SF
<i>Open Space</i>	45,597 SF
<i>Long-Term Bike Storage</i>	LEED Requirements: 48 spaces
<i>Short-Term Bike Storage</i>	LEED Requirements: 20
<i>Public Transportation</i>	Access to Alewife Station and Bus Routes 62, 76, 67, 79, 78, 350

### Integrative Process

The project team includes several LEED Accredited Professionals, who will lead the sustainability efforts and initiatives throughout the design and construction process. Sustainable design and energy efficiency goals were established early and strategies associated with the building envelope attributes, lighting design, thermal comfort ranges, plug and process loads, and operational parameters and their impact on the building energy performance will be explored and discussed throughout the design process. An early design energy model will be developed and used as an interactive and dynamic platform to evaluate systems synergies and the various pathways for achieving the targeted energy savings and required performance improvements in the most cost-effective manner.

### Location and Transportation

**Credit 2 – Sensitive Land Protection:**

**2 Yes Points**

The Project Site has been previously developed and is located in an urban area of filled land. This site is located in the flood plain but since it’s a previously developed land, it will meet the credit requirements.

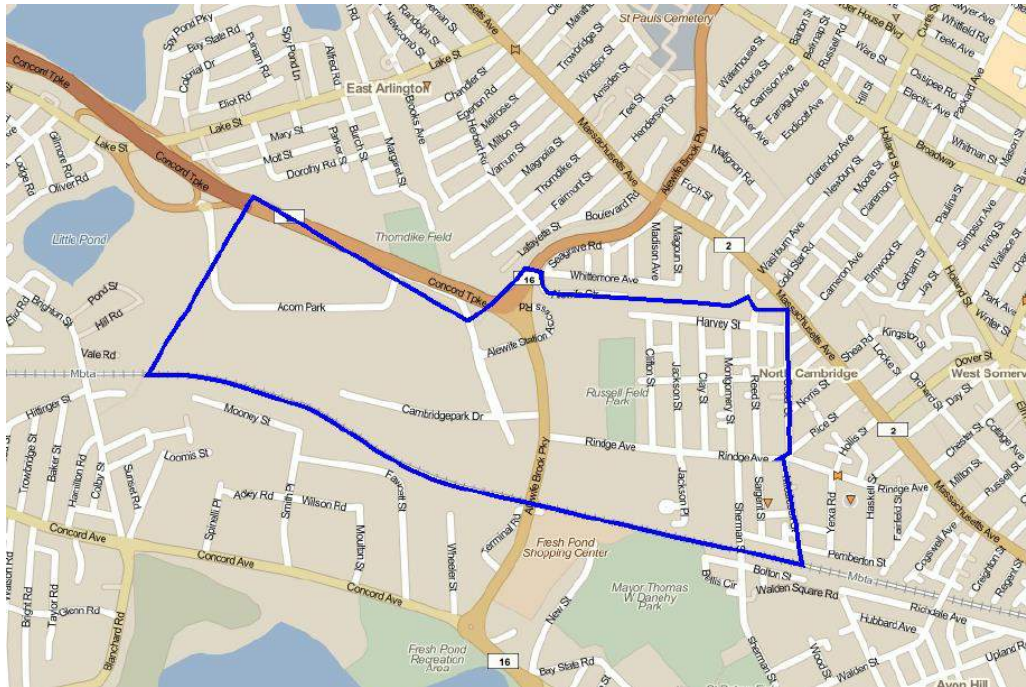
**Credit 3 – High Priority Site:**

**2 Yes Points**

The project site is not a brownfield and it is not located in any of the federally recognized high-priority sites. However, the land is within an Opportunity Zone, Census Tract 3549. The Opportunity Zones program was created by the Tax Cuts and Jobs Act (TCJA) to increase investment in economically distressed communities. The program provides preferential capital gains treatment for investments within designated low-income census tracts. Policymakers hope opportunity zones will unleash investment in low-income communities throughout the country.<sup>1</sup>

We believe that the project should be qualified for the possible 2 LEED points under this credit, but we are pursuing them as “Maybe” points until we receive a clarification and response from USGBC.

<sup>1</sup> <https://taxfoundation.org/opportunity-zones-what-we-know-and-what-we-dont/>



From: Enterprise Opportunity360 Measurement Report

What Does Opportunity Look Like for People Living in This Community?



101 Cambridgepark Drive | Article 22 Sustainability Narrative

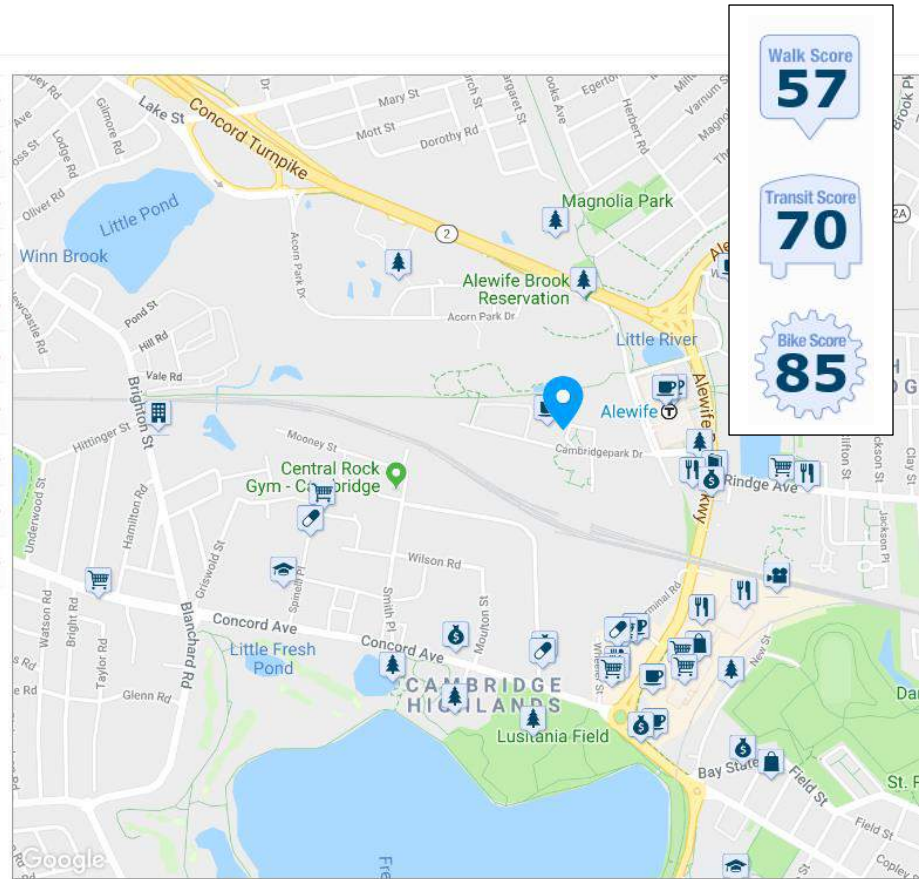
**Credit 4: Surrounding Density and Diverse Uses:**

**2 Yes Points, 2 Maybe Points**

The building is located in an area with an average density greater than 22,000 sf/acre (to be confirmed) and is within a ½ mile walking distance of at least 8 basic services.

**What's Nearby**

- Restaurants:**  
Bertucci's Italian Restaurant .2mi >
- Coffee:**  
Revival Cafe & Kitchen .06mi >
- Bars:**  
Menotomy Grill & Tavern .6mi >
- Groceries:**  
Trader Joe's .3mi >
- Parks:**  
Alewife Brook Parkway .2mi >
- Schools:**  
Fayerweather Street School .5mi >
- Shopping:**  
Newbury Comics .2mi >
- Entertainment:**  
Apple Cinemas Cambridge .4mi >
- Errands:**  
Eastern Bank .2mi >
- Search Nearby:** >



Category	Use Type	Business Name and Distance
<b>Food Retail</b>	Grocery	Foodtown Market - 0.3 mile
<b>Services</b>	Restaurant	Summer Shack – 0.2 mile
	Restaurant	Bertucci's - 0.2 mile
	Bank	Eastern Bank - 0.2 mile
<b>Community</b>	Other Retail	Newbury Comics – 0.2 mile
<b>Civic and Community Facilities</b>	Place of Worship	Church in Cambridge
	Public Park	Alewife Brook Parkway – 0.2 mile
	Child Care	Sunrise Learning Academy

8 Basic Services within ½ Walking Distance from the Project

**Credit 5 – Access to Quality Transit:**

**3 Yes Points**

The project location provides access to quality transit and encourages alternative transportation. The occupants of 101 CPD will have access to several nearby transit lines, including Alewife Station and bus routes 62, 76, 67, 79, 78, 350, which gives them the opportunity to travel through Cambridge, Boston, and close-by towns. These transit services provide more than 240 “weekday” and over 114 “weekend” trips.



Access to Quality Transit Map

**Credit 6 – Bicycle Facility:**

**1 Yes Point**

The bicycle storages and racks will be provided throughout the project and the development site; 48 long-term bike storage, 20 short-term bike storage, and 7 showers-changing rooms. with a Bike Score of 85, the immediate neighborhood provides a direct connection between the project site and a variety of basic services.

Credit Requirements	LEED v4 Requirements	Facilities in 101 CPD
Long-term Bike Storage	5% FTE = 27	48 Bicycle Parking
Short-term Bike Storage	At least 4	20 Bicycle Parking
Shower and Changing Rooms	1 per 100 + 1 per 150 occ. = 4	7 showers and changing rooms

**Credit 7 -Reduced Parking Footprint:**

The project does not meet the requirements.

**Credit 8 – Green Vehicles:**

**1 Yes Point**

Preferred parking will be provided with signage for green vehicles on the site. There are 269 parking spaces on the site, including the handicap accessible spaces; 14 spaces (5.2%) will be provided with signs reserving the space for green vehicles. Electrical vehicle supply equipment (EVSE), level-2 charging capacity, will be provided in 6 parking spaces (2.2%).



## Sustainable Site

### **Prerequisite 1 – Construction Activity Pollution Prevention:**

A management plan will enforce measures to protect adjacent areas from pollution from wind and water-borne soil and sedimentation. The civil design team prepared an erosion and sedimentation plan that meets the local codes and the EPA Construction General Permit of the National Pollution Discharge Elimination System (NPDES) program. The construction team will implement the erosion and sedimentation measures and will follow the requirements of stormwater pollution prevention plan during the construction.

### **Credit 1 – Site Assessment:**

**1 Yes Point**

The project team will conduct a comprehensive site assessment and will study topography, hydrology, climate, vegetation, soils, human use, and human health effects specific to 101 CPD project.

### **Credit 3 – Open Space:**

**2 Maybe Points**

Approximately 34% of the site area, including the building footprint, will be allocated to outdoor space, partially vegetated.

### **Credit 4 – Rainwater Management:**

**2 Yes Points, 1 Maybe Point**

The project will implement a stormwater management plan with a goal of decreasing the volume of stormwater runoff and managing 100% of stormwater for the 95<sup>th</sup> percentile of local rainfall events on-site and will capture and treat runoff using best management practices (BMP's). The project will comply with the Mass DEP Stormwater Management Policy, as well as reduce the peak rate and total volume of runoff for the 25-year design storm in the post-development condition to meet the requirements of Cambridge Department of Public Work (CDPW).

### **Credit 5 – Heat Island Reduction:**

**2 Yes Points**

More than 75% of parking spaces are located in an underground parking garage. The roof will be white TPO and the hardscape area consists of open-grid pavement system and paving materials with a three-year aged solar reflectance (SR) value of at least 0.28.

### **Credit 7 – Tenant Design and Construction Guidelines:**

**1 Yes Point**

The proponent and the design team are in the process of developing a Tenant Design and Construction Guidelines for this C&S development. The document explains the sustainable aspects of the Core and Shell building design and construction, and also explains what steps are needed for tenants to achieve LEED CI Certification for their space fit-out design and construction, if desired.

LEED-CI is a decision for individual tenants in the building. Tenants are encouraged to have their interior space constructed in an environmentally friendly manner. The rating system is designed to help guide and measure green strategies under the control of the tenants. These strategies can range from the selection of non-toxic paint to Energy Star Computers and office equipment. It is important to understand that the tenant is encouraged to play an active role in the fitting out of their new space.

## Water Efficiency

**Prerequisite 1 and Credit 1 – Outdoor Water Use Reduction:**

**1 Yes Point**

Landscape plantings will be selected to be climate appropriate, native and adapted and the irrigation system will be designed to target at least a 50% reduction in the potable water use.

**Prerequisite 2 and Credit 2 - Indoor Water Use Reduction:**

**3 Yes Points and 1 Maybe Point**

The project team anticipates reducing the use of potable water inside the building by at least 30% by installing low-flow and low-flush plumbing fixtures in core restrooms.

Flush Fixture Family	Baseline Flush Rate (GPF)	Design Flush Rate (GPF)	Baseline Annual Water Use (gal)	Design Annual Water Use (gal)	% Reduction
Water Closet	1.6	1.28	428,800	343,040	
Urinal	1.0	0.125	134,000	16,750	
Annual Flush Volume (gallons/ yr)			562,800	359,790	36.07%
Flow Fixture Family	Baseline Flow Rate (GPM)	Design Flow Rate (GPM)	Baseline Annual Water Use (gal)	Design Annual Water Use (gal)	% Reduction
Public Lavatory	0.5	0.35	100,500	70,350	
Showerhead	2.5	1.5	167,500	100,500	
Kitchen Faucet	2.2	2.2	73,700	73,700	
Annual Flow Volume (gallons/ yr)			341,700	244,500	28.4%
<b>Total Annual Water Use and Savings</b>			<b>904,500</b>	<b>604,340</b>	<b>33.19%</b>

Indoor Water Use Calculations

**Prerequisite 3 and Credit 4– Building-level Water Metering and Water Metering:**

**1 Yes Point**

The building will be equipped with a main water meter and the project team is planning to install additional water meters for at least two of water subsystems: irrigation and domestic hot water.

**Credit 3 – Cooling Tower Water Use:**

**2 Yes Points**

The project uses air-cooled chillers and meets the following requirements:

- Per ASHRAE 90.1-2010, Appendix G Table G3.1.1, the baseline system for the building is systems 7, which utilizes water-cooled chillers.
- There are no cooling towers in the design case.
- The project does not receive any cooling from a District System.

## Energy and Atmosphere

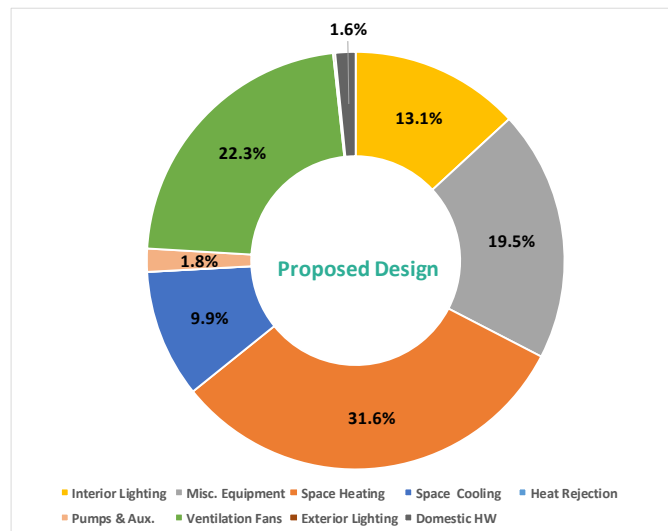
### **Prerequisite 1 – Fundamental Commissioning and Verification**

Commissioning of the Mechanical and Electric building systems is under contract and will be performed. The base building Core and Shell HVAC systems will be commissioned by a third-party commissioning agent to ensure correct operation. Commissioning activities include verification of system and equipment installation in accordance with the construction documents and manufacturer’s instructions, and confirmation that equipment start, test and check also meet manufacturer’s requirements.

### **Prerequisite 2 and Credit 2 – Minimum and Optimize Energy Performance: 7 Yes Points**

The project will be designed to comply with the Massachusetts Building Energy Code and to exceed the energy performance requirements of the Massachusetts Stretch Energy Code. Building energy models have been developed and used to evaluate various pathways for achieving the targeted energy savings and required performance improvements. The preliminary energy analysis shows that the project as designed – utilizing schematic design drawings and specifications – is anticipated to result in an annual energy cost savings of 15% to 19% compared to the ASHRAE 90.1-2010 baseline, depending on the energy conservation measures (ECMs) that are going to be incorporated into the final project design. Following LEED v4 Alternative Compliance Path, which looks at the annual source energy and GHG savings, the preliminary energy model shows a performance savings of up to 25%, due to a significant reduction in the source energy use. The following Energy Conservation Measures have been proposed:

- High-performance window system
- Increased roof insulation
- Increased wall insulation
- Reduced interior lighting power density in parking garage and core spaces
- High-efficiency gas-fired condensing boilers
- Energy recovery units
- High-efficiency air-cooled chillers
- Variable speed, premium efficiency pumping system
- Low-flow plumbing fixtures



### **Prerequisite 3 – Building-level Energy Metering:**

The project is equipped with permanent electricity and gas utility meters.

### **Prerequisite 4 and Credit 6 – Fundamental and Enhanced Refrigerant Management: 1 Maybe Point**

No CFC-based refrigerants will be utilized for the Project. The selected equipment will use only refrigerant that minimize or eliminate the emission of compounds that contribute to ozone depletion and climate change

**Credit 7 – Green Power and Carbon Offset:**

**2 Maybe Points**

The owner will investigate the feasibility of purchasing carbon offset through a 5-year contract to offset a minimum of 100% of the building’s energy use with renewable source.

**Material and Resources**

The materials selected for the building will be evaluated using a variety of criteria including a preference for materials extracted, processed and manufactured locally. This reduces the energy consumption and emissions associated with transportation and helps local economies.

**Prerequisite 1 – Storage and Collection of Recyclables**

A central area for sorting and collection of recyclables before removal from the site will be provided. Recyclable materials collected will include mixed paper, corrugated cardboard, glass, plastics, and metals, and the disposal of batteries and electronic waste.

**Prerequisite 2 – Construction and Demolition Waste Management Planning**

The project will have a Construction and Demolition Waste Management plan and will meet the requirements of this prerequisite by establishing waste diversion goals and identifying at least five material streams to be diverted.

**Credit 1 – Building Life-Cycle Impact Reduction:**

**3 Yes Points**

The project team is planning to conduct a whole-building life-cycle assessment of the building structure and enclosure. The target is at least a 10% reduction in the global warming potential, acidification of land and water sources, and depletion of nonrenewable energy sources when compared with a baseline building.

**Credit 2, 3, and 4 – Building Product Disclosure and Optimization:**

**2-3 Yes Points**

The project team, including the construction manager and their sub-contractors, will target the specification and use of at least 20 different permanently installed products and materials that have lower environmental impacts and comply with Environmental Product Declaration (EDP), and that conform to ISO 14025, 14040, 14044, and EN 15804 or ISO 21930. The project team is also targeting the Material Ingredients credit and will specify materials and products with known chemical make-up. Documentation for at least 20 different permanently installed products will be provided, confirming the applicable certification which may be the Health Product Declaration (HPD), Cradle-to-Cradle or Declare.

**Credit 5 – Construction and Demolition Waste Management:**

**2 Yes Points**

The waste generated by the construction and demolition process will be recycled, rather than land-filled, and the ultimate goal is for more than 75% (by weight) of the construction waste, targeting at least 4 waste streams, to be recycled. The project team will most likely use the ReEnergy facility, which is the only certified comingling facility in Massachusetts, and will track comingled waste and 2 material streams for a 75% diversion rate.

## Indoor Environmental Quality

### ***Prerequisite 1 – Minimum Indoor Air Quality Performance***

The mechanical systems will be designed to comply with the ASHRAE 55-2010, the indoor temperature, and humidity conditions standard, and to provide superior ventilation throughout the building, following the requirements of ASHRAE 62.1-2010 sections 4 through 7. The future lab spaces will be served by 100% OA air-handling units, which will provide OA to office fan coil unit systems. The current design meets and exceeds the minimum requirements of ASHRAE 62.1-2010.

### ***Prerequisite 2 – Environmental Tobacco Smoke Control***

The building will have a no-smoking policy to comply with the Massachusetts Workplace Smoking law, and smoking will be prohibited outside within 25 feet of doors and outside air intakes.

### ***Credit 1 – Enhanced Indoor Air Quality Strategies:***

***1 Yes Point & 1 Maybe Point***

Building entrances will be provided with walk-off mats to remove dirt and debris from the shoes of people entering the building and will be cleaned and maintained by house-keeping weekly while space is vacant. High-efficiency MERV 13 filters will be provided in the main outside air handling unit for superior air particulate filtration. All spaces where hazardous gases or chemicals may be present or used, i.e. housekeeping closets, will be designed with full height walls, exhaust ventilation and door closer. The project may target an increased ventilation strategy for one more additional point.

### ***Credit 2 – Low-emitting Materials:***

***2 Yes Points & 1 Maybe Point***

The project will target low-emitting materials for 4 categories: Adhesives, sealants, and paints used inside the building will be selected to be low-VOC (Volatile Organic Compound) products and will meet the emission testing requirements; specified wood products will have no added urea-formaldehyde; the flooring systems in the lobby and core areas will meet the credit requirements.

### ***Credit 3 – Construction Indoor Air Quality Management Plan:***

***1 Yes Point***

The base building will be constructed in accordance with the SMACNA Indoor Air Quality for Buildings under Construction Guideline. This guideline defines procedures for maintaining good indoor air quality inside the building during construction and also addresses construction practices to allow the best possible indoor environment after occupancy. These practices include cleaning during construction, interrupting paths of odor and dust travel within the building, segregating odor and dust producing activities from absorbent materials, and scheduling similar odor or dust producing activities to occur at the same time.

### ***Credit 5 – Quality Views:***

***1 Yes Point***

At least 75% of the regularly occupied area will have a direct line of sight and quality views to the outdoors, which includes landscaped area, sky, pedestrian walkways and bike lanes, and streetscape. The project team will use the tenant test fit drawings to demonstrate compliance with this credit.

### **Innovation and Design LEED Strategy**

The project team will evaluate and implement measures and strategies in the design and construction of 101 CPD to exceed the performance criteria of some of the base credits and will introduce innovative building features, technologies, and policies that are not addressed by existing prerequisites and credits in the BD+C rating system. The innovative strategies may include development and implementation of OM Starter Kit, including green cleaning policies, establishing a purchasing policy for low-mercury lamps, and integrative analysis of building materials.

### **Regional Priority**

Regional Priority credits were established with a focus on environmental issues and priorities at a local level. There are six (6) possibilities specific to the project location and the project team has targeted 3 points related to the following strategies: Building Life-Cycle Impact Reduction, Rainwater Management, and Cooling Tower Water Use.

END OF ARTICLE 22 SUSTAINABILITY NARRATIVE

**Project:** 101 Cambridgepark Drive, Cambridge, MA

**Subject:** **Resiliency Narrative**

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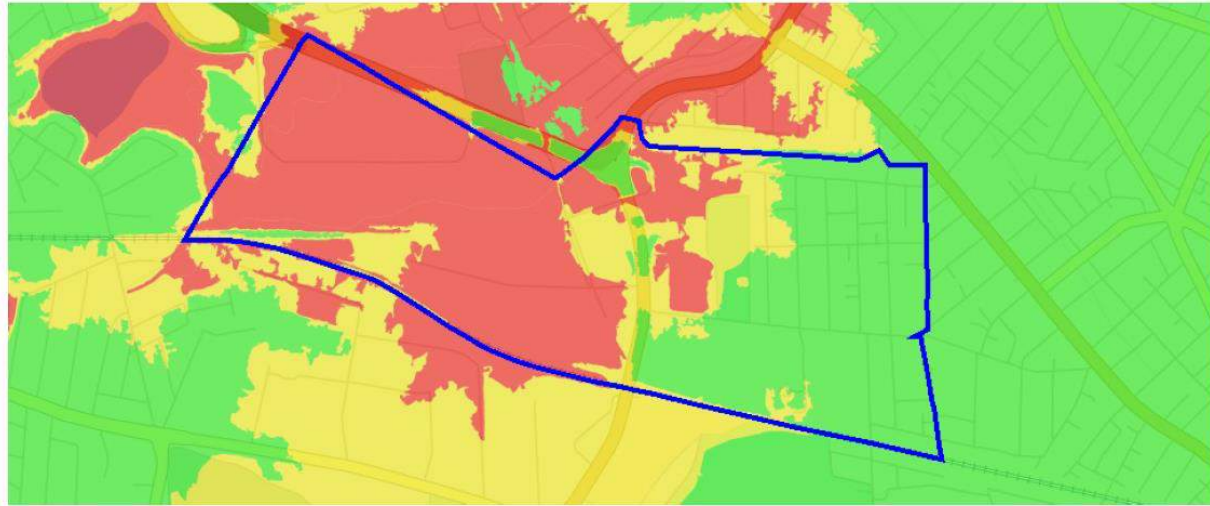
This document outlines the project team efforts in considering and implementing sustainable and resilient measures to reduce or eliminate greenhouse gas emissions and mitigate the impacts related to climate change in the design, construction, and operation of the building.

**Mitigation Measures:**

The Proposed Building and site design addresses climate change impacts via the following:

- The Project is designed to recover from flooding effects associated with the 2070 100-year Sea Level Rise / Storm Surge (SLR/SS) event.
- The Project is designed to accommodate present-day 100-year flood storage within depressed landscape areas and below free-standing raised deck areas adjacent to both buildings. The flood storage areas are designed to be contiguous to each other via accommodation of free and unobstructed flow between open and below-deck depression areas, as well as to the existing non-displaced floodplain in Cambridgepark Drive. The 100-year flood storage areas do not extend into the building and are designed to draw down into the underlying stormwater detention system.
- The select elevations of the Proposed Building set above the 2070 10-year precipitation flood elevation of 20.0 feet, as follows: Bicycle Storage & Rear vestibule is at elevation 21.5 feet, Front vestibule at elevation 21.0 feet, Loading & Trash Docks at elevation 20.0 feet. Only the retail entry and egress vestibule are at elevation 18.42' (sidewalk grade).
- The ground floor elevations of the main core and lobby, retail and tenant spaces, loading and trash management platform, and electrical and mechanical spaces are set above the 2070 100-year SLR/SS flood elevation of 22.5 feet. Furthermore, the electrical and mechanical equipment pad elevations are set above the ground floor elevations of their respective rooms.
- The underground parking garage access is protected by a Floodbreak™ passively deployed, hydraulically activated flood prevention barrier system at the garage entrance. The system is designed such that the top of barrier elevation at full deployment to be set at the 2070 100-year SLR/SS elevation of 22.5 feet.
- Regular monitoring and management of the Floodbreak™ system will be incorporated into the Long-Term Operation and Maintenance Plan for the stormwater management system.
- The intake and exhaust louvers for the Proposed Building are set above the 2070 100-year SLR/SS flood elevation of 22.5 feet.
- The Project Incorporates shut-off valving and backflow prevention devices into loading area floor drain system to enable drawdown of water accumulated in the loading area into on-site drainage system in the event of flood waters exceeding the 2070 10-year precipitation flood elevation of 20.0 feet. The loading area floor drain system shall discharge to sanitary collection system under normal operations.





FEMA Flood Zones



High risk (>1% annual chance) Moderate risk (>.2% annual chance) Low risk (<.2% annual chance) Undetermined risk

Source: FEMA

Resilient Solutions:

 COOL	 ABSORB	 PROTECT	 CONNECT
<ul style="list-style-type: none"> <li>• High-reflective hardscape</li> <li>• Low-albedo roof</li> <li>• Planted areas</li> </ul>	<ul style="list-style-type: none"> <li>• Permeable pavers and bioinfiltration</li> <li>• Stormwater management</li> </ul>	<ul style="list-style-type: none"> <li>• Elevating and protecting mechanical and electrical equipment</li> <li>• Floodproof rooms</li> </ul>	<ul style="list-style-type: none"> <li>• Multi-modal transportation network</li> <li>• Access to bike network</li> </ul>



**Energy and Water Conservation Measures:**

- High-performance HVAC systems, including high-efficiency chillers, condensing boilers, heat recovery, and variable frequency drives.
- High-performance envelope system
- Reduced interior lighting power density
- Low-flow and low-flush plumbing fixtures
- High-performance irrigation system

**Social Resiliency:**

- Commitment to partnering with neighbors to look for ways to improve the health and wellness of tenants and building occupants.

END OF RESILIENCY NARRATIVE

June 28, 2019

**Project:** 101 Cambridgepark Drive, Cambridge, MA  
**Subject:** Pathway to Net Zero Ready

101 Cambridgepark Drive is a 5-story core and shell building, which is being designed as a first-class speculative research and development facility. Approximately 50% of the building will be allocated to laboratory spaces which results in a much higher energy demand and consumption when compared to a typical office building. Per the preliminary energy modeling results, the current design creates a lower than average site and source energy use intensity (EUI); however, the space heating relies on natural gas which represents approximately 40% of the building annual energy use. In order to bring the building to net zero status, it should be converted to all electric first. The current building electric service consists of two 3,000 Amp switchboards at 480 volts with a gas-heating plant. If the 100% of the heating plant capacity gets converted to all electric, the electric service needs to be increased by an additional 8,000 Amps at 480 volts. We believe that the electric utility infrastructure cannot support this load increase and event if it does, the premium cost for upgrading the utility infrastructure is significant. Also, the heating energy makes approximately 40% of the building annual energy use and if that gets converted to all electric, per our preliminary analysis, the building annual operating cost would increase by 4.5 times.

enviENERGY Studio has developed building energy models, which will be used throughout the design process to evaluate various pathways for achieving targeted energy performance improvements. The preliminary energy analysis shows that the project as designed – utilizing the conceptual design drawings and system narratives – is anticipated to result in an annual energy savings of 28.7% compared to the ASHRAE 90.1-2013 baseline.

Energy Modeling Run Options	Interior Lighting	Misc. Equipment	Space Heating	Space Cooling	Heat Rejection	Pumps & Aux.	Ventilation Fans	Exterior Lighting	Domestic HW	Space Heating Therms
	kWh	kWh	kWh	kWh	kWh	kWh	kWh	kWh	kWh	
<b>Baselien: MA Energy Code Baseline</b>	693,819	1,055,118	0	353,142	4,417	165,356	1,055,250	8,786	85,106	164,561
<b>% of Total</b>	8.4%	12.8%	0.0%	4.3%	0.1%	2.0%	12.8%	0.1%	1.0%	58.5%
<b>Proposed Design</b>	712,239	1,055,118	7,436	393,387	0	97,004	1,211,258	8,786	85,105	78,639
<b>% of Total</b>	12.1%	18.0%	0.1%	6.7%	0.0%	1.7%	20.6%	0.1%	1.4%	39.2%
<b>% Savings vs Baseline</b>	-2.7%	0.0%	-	-11.4%	100.0%	41.3%	-14.8%	0.0%	0.0%	52.2%

MA Stretch Energy Code					
Energy Modeling Run Options	Total Site Energy	Site EUI	Energy Savings Compared to Baseline	Total Source Energy	Source EUI
	MBTU	kBTU/SF		MBTU	kBTU/SF
<b>Baselien: MA Energy Code Baseline</b>	28,132	168	Compared to ASHRAE 2013+ two ECMs required by Mass. Amendments	49,971	298
<b>% of Total</b>					
<b>Proposed Design</b>	20,049	120		42,377	253
<b>% of Total</b>					
<b>% Savings vs Baseline</b>				<b>28.7%</b>	<b>15.2%</b>

The proposed design incorporates the following energy conservation measures:

- High-performance window system
- Increased roof insulation – R-40 c.i.
- Increased wall insulation – R-14 c.i + R-10 batt; approximately 40% of the exterior walls are insulated spandrel panels.
- Reduced interior lighting power density in parking garage and core spaces
- High-efficiency gas-fired condensing boilers
- Energy recovery units
- High-efficiency air-cooled chillers
- Variable speed, premium efficiency pumping system
- Low-flow plumbing fixtures

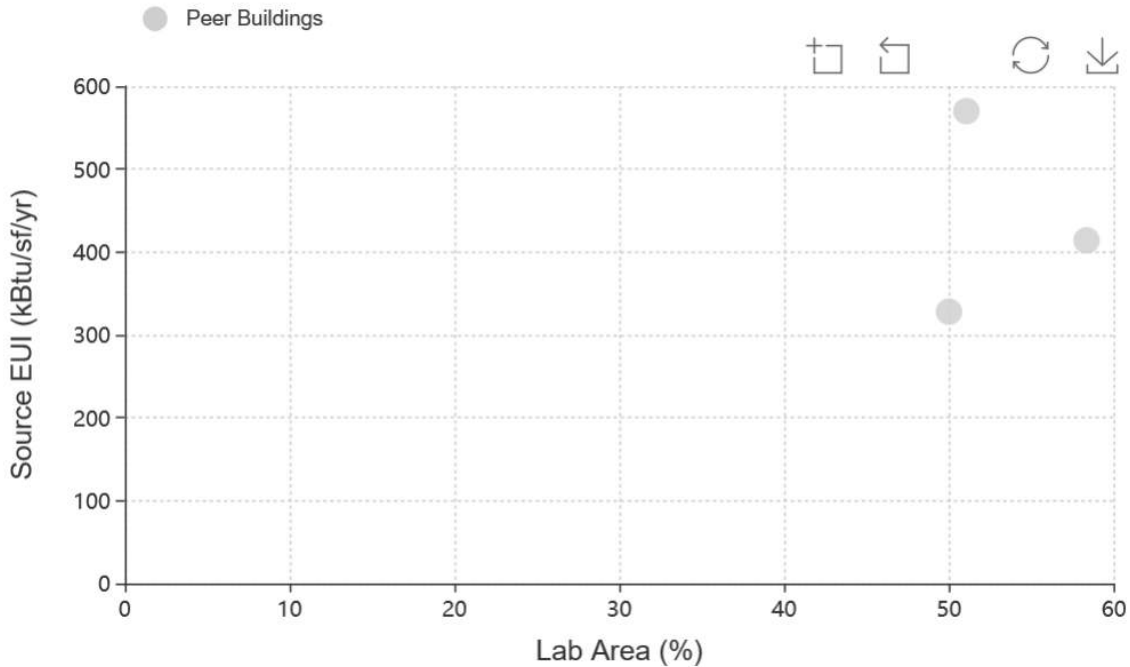
The design team has divided the building elements into passive – building envelope - and active – MEP systems – and implemented measures so that the overall building envelope meets and exceeds the energy Code requirements before introducing any active energy efficiency measures. The following tables show that the current design meets the envelope performance requirements of the upcoming energy Code – IECC 2018:

<b>(REQUIRED) C402.1.5 Component Performance Alternative</b>					
	Proposed Design			IECC 2018 Baseline	
	Area (SF)	U-Value	WWR	Area (SF)	U-Value
<b>Window + Wall</b>	51,776.8		42%	51,776.8	from Tables
<b>Window</b>	21,746	0.35	UV (Glass+Frame)	20,711	0.38
<b>Wall</b>	30,031	0.08	U Wall	31,066	0.064
<b>Roof</b>	36,804	0.025		36,804	0.032
<b>A Calculations</b>					
A = Sum of the (UA Dif) values for each distinct assembly type of the building thermal envelope, other than slabs on grade and below-grade walls.					
	UA Proposed	UA Table			
<b>Window</b>	7,611	8,264			
<b>Wall</b>	2,252	1,922			
<b>Roof</b>	920	1,178			
	10,784	11,363			
<b>A</b>		<b>-580</b>			
<b>D Calculations</b>					
D = (DA * UV) – (DA * U Wall), but not less than zero					
DA	1,036				
<b>D</b>		<b>285</b>			
<b>A + B + C + D + E ≤ Zero</b>					
<b>-295</b>			<b>Passed</b>		

*\*Please note that the project team is evaluating additional building envelope improvements which will be reflected in the future submissions. Also, the predicted space cooling energy penalty is due to the use of air-cooled chillers in*

the design case vs the water-cooled chillers in the baseline case; however, the significant pumping energy savings and the heat rejection energy savings offset the space cooling penalty. The design team will investigate the financial and environmental feasibility of utilizing higher-efficiency chillers as design progresses.

We used the Lab21 Benchmarking tool to compare the current proposed design to a range of laboratory buildings in the climate zone 5A. After narrowing down the building parameters in the benchmarking tool to reflect the current design, the outcomes are three peer buildings with an average source EUI of 414 kBtu/SF. This comparison shows that the current design with a source EUI of 253 kBtu/SF is low energy when compared to the benchmarking data.



### Summary Statistics for Selected Peer Group Buildings

**Lab Area:** mean 53 % | median 51 %  
**Source EUI:** mean 437 kBtu/sf/yr | median 414 kBtu/sf/yr  
**Number of Matching Buildings:** 3/757

### Future Opportunities:

As design progresses, the project team will investigate opportunities for further improvements, including but not limited to, higher efficiency air-cooled chillers, improved thermal properties for the spandrel panels, and additional control strategies.

Since the project is a spec office/ lab building, future improvements might be beyond the control of the landlord; however, we identify the following opportunities for further carbon emission reductions:

- The current proposed energy model uses the IECC 2015 lighting power densities in the future office and lab spaces. King Street Properties will encourage the future tenants to install high-efficiency fixtures and it is anticipated that the tenants will design their spaces to be at least 20% below code allowance LPDs. With

future improvements in lighting system and control technologies, we believe that a 50% reduction in the interior lighting power consumption would be achievable in the future.

- Ventilation fans energy represents a significant portion of the annual energy use and that is due to a high ventilation load in the laboratory spaces. The current energy model assumes the ASHRAE 90.1-2013 minimum turndown requirements during the unoccupied hours. Since the application of the future lab spaces is unknown, we cannot predict the actual control strategies. The future tenants have the opportunity to reduce their ventilation and heating loads by approximately 20% if they install advanced control equipment such as AirCuity.
- Due to the high equipment load density in the lab area, the receptacle loads represent a significant portion of the building annual energy use and that includes the office equipment. Plug loads in the office spaces can be reduced significantly during the unoccupied hours if active measures are being implemented. The current model assumes only the Code turndown requirements; the future advanced controls can reduce the loads by more than 50% during the unoccupied hours. This measure will reduce the cooling loads while increasing the heating loads.
- The office HVAC system could eventually be converted to air source heat pump technology, even though it is not currently economically feasible. This improvement is expected to occur at the end of life of the current proposed HVAC system.

We estimate a minimum of 21% reduction in the source EUI by incorporating these improvements:

Current Source EUI:	253 kBTU/SF
Potential Future Source EUI:	199.5 kBTU/SF

We believe that further improvements will be possible with future advances in technology; however, due to the high energy demand in lab buildings and limited opportunities for onsite renewables, to achieve carbon neutrality, greening of the grid electricity and purchase of carbon offsets are the only feasible options if the building gets converted to all electric in the future. As noted earlier, since the cost of electricity is currently much higher than natural gas, operating an all-electric large laboratory building is not financially feasible.

END OF NARRATIVE

# Greenhouse Gas Emissions

Energy Consumption	Area Light (kWh)	Misc. Equipment (kWh)	Misc. Equipment (Therm)	Space Heating (kWh)	Space Heating (Therm)	Space Heating (Therm)	Space Cooling (kWh)	Pump & Aux (kWh)	Heat Rejection (kWh)	Ventilation Fans (kWh)	DHW (kWh)	Exterior Usage (kWh)	Total Electricity (kWh)	Total Natural Gas (Therm)	Total Energy (MBTU)
IMA Energy Code Baseline	693,819	1,055,118	0	0	164,561	353,142	353,142	165,356	4,417	1,055,250	85,106	8,786	3,420,994	164,561	28,132
Proposed Design	712,239	1,055,118	0	7,436	78,639	393,387	393,387	97,004	0	1,211,258	85,105	8,786	3,570,333	78,639	20,049
Savings	-18,420	0	0	-7,436	85,922	-40,245	-40,245	68,352	4,417	-156,008	1	0	-149,339	85,922	8,083
% Savings													-4%	52%	29%

Greenhouse Gas Emissions	Area Light (tons of CO2)	Electric Misc. Equipment (tons of CO2)	Gas Misc. Equipment (tons of CO2)	Electric Space Heating (tons of CO2)	Gas Space Heating (tons of CO2)	Space Cooling (tons of CO2)	Space Cooling (tons of CO2)	Pump & Aux (tons of CO2)	Heat Rejection (tons of CO2)	Ventilation Fans (tons of CO2)	DHW (tons of CO2)	Exterior Usage (tons of CO2)	Electricity GHG Emission (tons)	Natural Gas GHG Emission (tons)	Total GHG Emissions (tons)
IMA Energy Code Baseline	246	375	0	0	963	125	125	59	2	375	30	3	1,214	963	2,178
Proposed Design	253	375	0	3	460	140	140	34	0	430	30	3	1,267	460	1,728
Savings	-7	0	0	-3	503	-14	-14	24	2	-55	0	0	-53	503	450
% Savings															21%

Conversion: 710 MWh to lbs of CO2 (Electricity)  
 117.08 MBTU to lbs of CO2 (Natural Gas)  
 0.0005 lbs to Short Tons


ISO New England CO2 Emission factor: 7.10 lb of CO2 per MWh reduction in electricity use  
 Direct GHG Emissions Factor for the US from EPA

**518 tons of GHG Emissions Savings is equivalent to:**


**1,100,244** Miles driven by an average passenger vehicle



**53.9** homes' energy use for one year



**491,952** Pounds of coal burned



# Combined Heat and Power

CHP System Information\*

1	CHP System Type	Microturbine
2	CHP System Capacity, kW	303
3	CHP Electric Efficiency	26.7%
4	CHP Heat Output, Btu/kWh	4,632
5	CHP Heat Output, MMBtu/hour	1.4
6	CHP System Fuel Cost (Natural Gas), \$/MMBtu	\$11.60
7	CHP O&M Cost, cents/kWh	\$0.0120

- 1 The CHP system type identified by the calculator to best meet the energy needs of the Baseline Building
- 2 The CHP system size identified by the calculator to best meet the energy needs of the Baseline Building. In the absence of a load profile that shows the Baseline Building's electric and thermal demands over time, the CHP system is sized using average building electric and heating demands.
- 3 The electric efficiency of the specified CHP system
- 4 The thermal output of the CHP system on a Btu/kWh basis
- 5 The thermal output of the CHP system on an MMBtu/hr basis
- 6 The price of fuel for the CHP system
- 7 The non-fuel operating and maintenance cost of the CHP system in \$/kWh. Note: O&M charges are not included in the annual energy cost calculations presented below since the "Optimize Energy Performance" credit calculations only include the cost of purchased utility electricity and fuel required for the CHP system and other on-site thermal needs.

## Executive Summary

This study presents the results of a preliminary Combined Heat and Power (CHP) analysis for the 101 Cambridgepark Drive project located in Cambridge, Massachusetts. While there is a reduction in the building operating cost due to the shared heating/ electric generation, the initial analysis seems to indicate a negative environmental impact associated with the building annual GHG emissions. Utilizing the ISO 2016 New England Average System Emission Rates<sup>2</sup>, the analysis shows a small increase in the building annual GHG generation which is due to the relatively low heating demand in an office/ lab building and the higher GHG emissions associated with the natural gas used in the CHP. Therefore, utilizing a CHP plant for this building may not be environmentally beneficial.

## Analysis

The potential installation of an individual CHP plant has been investigated based on the site path energy modeling for heating energy, utilizing the EPA LEED CHP calculator, and the results are presented in this report. The LEED CHP calculator is a tool to help LEED project teams estimate the energy and energy cost savings associated with utilization of CHP systems, and is intended to be used at the very early stages of building design so that CHP is given consideration as an energy option. Eight inputs are required for the worksheet to perform the calculations. There are several default values, such as fuel price, which can be supplied as an average value for the state where the project is located. We obtained the annual (2018-2019) Massachusetts average utility rates for the commercial sector from the US Energy Information Administration website.

Other inputs include the average monthly electric and heating demand, which were obtained from the current energy simulation. The worksheet contains the performance characteristics of various CHP systems as the basis for estimating energy costs. The calculator selects one of these CHP systems based on the inputs entered by the user. We assumed a thermal efficiency of 78% for the CHP system in this application.

Utilizing the average system emission rates, the building annual GHG generation slightly increases and that is due to the higher GHG emissions associated with the natural gas used in the CHP and the relatively low heating demand in an office/ lab building; Residential uses generally do better with co-generation than commercial/office buildings because a residential use has both heating and domestic hot water requirements. As shown in the following tables, while there is a reduction in the building operating cost due to the shared heating/ electric generation, the building annual GHG emission increases by 144 tons per year.

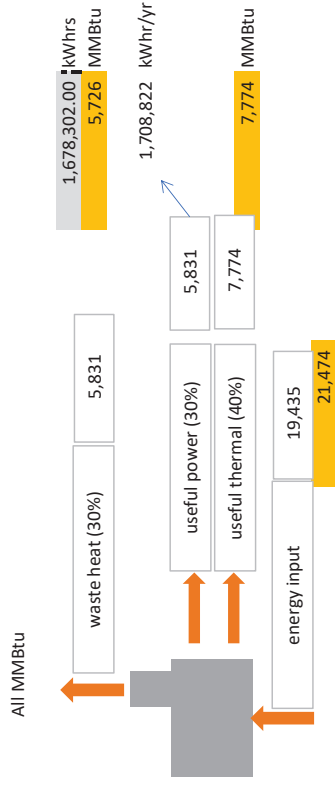
<sup>2</sup> [https://www.iso-ne.com/static-assets/documents/2018/01/2016\\_emissions\\_report.pdf](https://www.iso-ne.com/static-assets/documents/2018/01/2016_emissions_report.pdf)

# Combined Heat and Power

Estimate of Annual Energy Costs of the Baseline Building with and without CHP

	Baseline Building: No CHP	Baseline Building: With CHP	Difference
<b>Energy Use</b>			
<b>Annual Electricity Use</b>			
Annual Purchased Power, kWh	3,570,336	1,892,034	(1,678,302)
Annual CHP Power Generation, kWh	0	1,678,302	1,678,302
Total Annual Electricity Use, kWh	3,570,336	3,570,336	0
<b>Annual Thermal Energy Use</b>			
Non-CHP Thermal Use*, MMBtu/yr	8,148	374	(7,774)
CHP Thermal Used, MMBtu/yr	0	7,774	7,774
Total Thermal Energy Use, MMBtu/yr	8,148	8,148	0
<b>Annual Fuel Use</b>			
Non-CHP Thermal Fuel Use*, MMBtu/yr	10,446	480	(9,967)
CHP Fuel Use, MMBtu/yr	0	21,474	21,474
Annual Total Fuel Use, MMBtu	10,446	21,953	11,507
<b>Energy Costs</b>			
Purchased Electricity	\$645,874	\$372,629	(\$273,244)
Purchased Fuel	\$121,175	\$254,661	\$133,485
Annual Energy Costs	\$767,049	\$627,290	(\$139,759)
<b>Energy Cost Savings</b>			<b>\$139,759</b>
			<b>18.22%</b>

\*Non-CHP Thermal Use is from on-site boilers or heaters that are not part of the CHP system. The CHP system is assumed to have a 95% availability, so an auxiliary boiler would be used when the CHP system is down for maintenance, or for times when the site thermal demand exceeds the thermal output of the CHP system.



Simple CHP Calculator - DOER

Individual CHP Greenhouse Gas Emission Calculations	CHP Electricity Savings & Natural Gas Consumption			Annual Emissions Savings (with Average Emission Rate for Electricity)			with Peak Emission Rate for Electricity	
	Electric Offset kWh	Energy Input Offset MMBTU	Gas Consumed in CHP MMBTU	Electricity (Note 1) a tons per year	Gas Saved (Note 3) b tons per year	Gas Used c tons per year	Electricity (Note 2) a* tons per year	Total a* + b + c tons per year
101 Cambridgepark Drive	1,678,302	8,834	21,474	596	517	-1,256	1,117	377

Note (1): ISO New England AVERAGE CO2 Emission factor: 710 lb of CO2 per MWh reduction in electricity use

Note (2): ISO New England PEAK CO2 Emission factor: 1,331 lb of CO2 per MWh reduction in electricity use

Note (3): CO2 Emission factor for Natural Gas: 117 lb of CO2 per MMBTU of natural gas

Energy Input Offset = Total Thermal Energy Use (from the CHP table) / Boiler Average Efficiency (88%)  
 Gas Consumed in CHP = Annual Total Fuel Use with CHP





# LEED v4 for BD+C: Core and Shell Project Checklist



Project Name: 101 Cambridgepark Drive  
Date: 6/28/2019

Y	?	N	Credit	Integrative Process	1
9	4	7	Credit	LEED for Neighborhood Development Location	20
2			Credit	Sensitive Land Protection	2
2	2	1	Credit	High Priority Site	3
2	2	2	Credit	Surrounding Density and Diverse Uses	6
3	3	3	Credit	Access to Quality Transit	6
1			Credit	Bicycle Facilities	1
			Credit	Reduced Parking Footprint	1
1			Credit	Green Vehicles	1
<b>7 1 3 Sustainable Sites</b>					
Y			Prereq	Construction Activity Pollution Prevention	Required
1			Credit	Site Assessment	1
2			Credit	Site Development - Protect or Restore Habitat	2
1			Credit	Open Space	1
2	1		Credit	Rainwater Management	3
2			Credit	Heat Island Reduction	2
			Credit	Light Pollution Reduction	1
1			Credit	Tenant Design and Construction Guidelines	1
<b>6 1 4 Water Efficiency</b>					
Y			Prereq	Outdoor Water Use Reduction	Required
Y			Prereq	Indoor Water Use Reduction	Required
			Prereq	Building-Level Water Metering	Required
1			Credit	Outdoor Water Use Reduction	2
2	1	3	Credit	Indoor Water Use Reduction	6
2			Credit	Cooling Tower Water Use	2
1			Credit	Water Metering	1
<b>12 8 13 Energy and Atmosphere</b>					
Y			Prereq	Fundamental Commissioning and Verification	Required
Y			Prereq	Minimum Energy Performance	Required
Y			Prereq	Building-Level Energy Metering	Required
Y			Prereq	Fundamental Refrigerant Management	Required
5	1		Credit	Enhanced Commissioning	6
7	3	8	Credit	Optimize Energy Performance	18
			Credit	Advanced Energy Metering	1
			Credit	Demand Response	2
			Credit	Renewable Energy Production	3
1			Credit	Enhanced Refrigerant Management	1
2			Credit	Green Power and Carbon Offsets	2
<b>7 4 3 Materials and Resources</b>					
Y			Prereq	Storage and Collection of Recyclables	Required
Y			Prereq	Construction and Demolition Waste Management Planning	Required
3			Credit	Building Life-Cycle Impact Reduction	6
1	1		Credit	Building Product Disclosure and Optimization - Environmental Product Declarations	2
2			Credit	Building Product Disclosure and Optimization - Sourcing of Raw Materials	2
1	1		Credit	Building Product Disclosure and Optimization - Material Ingredients	2
2			Credit	Construction and Demolition Waste Management	2
<b>5 2 3 Indoor Environmental Quality</b>					
Y			Prereq	Minimum Indoor Air Quality Performance	Required
Y			Prereq	Environmental Tobacco Smoke Control	Required
1	1		Credit	Enhanced Indoor Air Quality Strategies	2
2	1		Credit	Low-Emitting Materials	3
1			Credit	Construction Indoor Air Quality Management Plan	1
			Credit	Daylight	3
1			Credit	Quality Views	1
<b>5 1 0 Innovation</b>					
4	1		Credit	Innovation	5
1			Credit	LEED Accredited Professional	1
<b>3 1 0 Regional Priority</b>					
1			Credit	Regional Priority: High priority Site/ Rainwater Management	1
1			Credit	Regional Priority: Cooling tower water use	1
1			Credit	Regional Priority: Renewable Energy/ Optimize Energy performance	1
1			Credit	Regional Priority: Building Life-Cycle impact reduction	1
<b>55 22 33 TOTALS</b>					
Certified: 40 to 49 points, Silver: 50 to 59 points, Gold: 60 to 79 points, Platinum: 80 to 110					<b>Possible Points: 110</b>



### LEED BD + C: Core and Shell v4

**Project Name:** 101 Cambridgepark Drive  
**Project Address:** 101 Cambridgepark Drive, Cambridge, MA 02140  
**Owner:** King Street Properties

**June 28, 2019**

50% Office and 50% Lab  
 FTE: 536(250/ 400 GSF/person in office/lab)  
 GSF: 165,000  
 # Parking Spaces: 247 in garage + 22 surface parking. 158 allocated to 101 CPD

**OPTION TO PURSUE LEED v4.1: Blue Text**

Yes	?+	?-	No
1	0	0	0



#### Integrative Process (IP)

#### Primary Responsibility

#### Points

#### Notes & Required Documentation

Phase	Credit	Integrative Process	Points	Primary Responsibility	Notes & Required Documentation
D			1	Design Team	Beginning in pre-design and continuing throughout the design phases, identify and use opportunities to achieve synergies across disciplines and building systems: Energy and Water.

Yes	?+	?-	No
9	4	0	7



#### Location & Transportation (LT)

#### Primary Responsibility

#### Points

#### Notes & Required Documentation

Phase	Credit	Location & Transportation (LT)	Points	Primary Responsibility	Notes & Required Documentation
D	Credit 1	LEED for Neighborhood Development Location (Up to 20 Points)			
D	Credit 2	Sensitive Land Protection	2	envi	Choose a previously developed land or a land which is not a prime farmland, on floodplains, considered habitat for endangered species, or wetland. <b>The selected site has been previously developed.</b>
D	Credit 3	High Priority Site	3		Locate the project in historic district, or on priority designation by federal or local entity (2 p), or brownfield remediation (3 p). It is not an empowerment zone. <b>The site is in an opportunity zone; qualification should be confirmed with USGBC.</b>
D	Credit 4	Surrounding Density and Diverse Uses	6	envi	Surrounding Density (2-4 points): Will be investigated. Diverse Uses: Locate the project within 1/2 mile walking distance of publicly available diverse uses; 4-7 services (1 point), more than 8 services (2 points). <b>Church in Cambridge, Summer Shack restaurant, Ferro's Foodtown, Laundry Town. The Fresh Pond Mall is within 0.6 miles. Should be reevaluated.</b>
D	Credit 5	Access to Quality Transit	6	envi	Multiple transit stops within 1/4 and 1/2 mile of building entry: 72 WD/40 WEH trips (1 point); 144 WD/108 WEH trips (3 points); 360 WD/216 WEH trips (6 points). <b>Within 1/4 mile of Alewife Station: 240 WD &amp; 114 WEH</b>
D	Credit 6	Bicycle Facilities	1	envi/ DiMella Shaffer	<b>Bicycle Network connecting the building entry or the bike storage to the bus stop and 10 basic services within 3 miles.</b> Bicycle Storage needs: <b>5% of building occupants = 27 bikes + 4 racks outside</b> Shower needs: 1 per 100 occupants + 1 per each 150 afterward = 4
D	Credit 7	Reduced Parking Footprint	1		40% reduction in parking capacity from the minimum local code
D	Credit 8	Green Vehicles	1		5% of all parking capacity for preferred green vehicle parking + Electric vehicle supply equipment for 2% of all parking spaces: 14 preferred spots + charging for 6 vehicles



**Sustainable Site (ST)**

Yes ?+ ?- No  
7 1 0 3

Phase	Points	Primary Responsibility	Notes & Required Documentation
C	P	Highpoint/ Consigli	Civil: Create and implement an erosion and sedimentation control plan for all construction activities associated with the project. Plan should be based on 2012 EPA Construction General Permit (CGP) or stringent local program. CM: Implement and document.
D	1	Highpoint	Submit a site survey or assessment which includes: topography, Hydrology, Climate, vegetation, soils, human use, and human health.
D	2	DiMella Shaffer	Option 1: Preserve and protect from all development and construction activity 40% of the greenfield area on the site AND Using native or adapted vegetation, restore 30% (including the building footprint) of all portions of the site identified as previously disturbed. Option2: financial support equivalent to \$0.40 per Sft of total site area, to land trust or conservation organization.
D	1	DiMella Shaffer	Provide outdoor space greater than or equal to 30% of the total site area (including building footprint). A minimum of 25% of that outdoor space must be vegetated (turf grass does not count as vegetation) or have overhead vegetated canopy.
D	3	Highpoint	Manage on site runoff from the developed site for the 95th percentile of regional or local rainfall events using low-impact development (LID) and green infrastructure. (2 points); 98th percentile (3 points); 85th percentile for zero lot line project (3 points)
D	2	DiMella Shaffer	Roof + Non-roof (2 points): weighted SRI; use of open-grid pavement. OR Covered parking: at least 75% of spaces should be covered. (1 points)
D	1	Lighting Designer	
D	1	envi/ KSP	



**Water Efficiency (WE)**

Yes ?+ ?- No  
6 1 0 4

Phase	Points	Primary Responsibility	Notes & Required Documentation
D	P	LA	No irrigation or reduce the water use by 30%.
D	P	MEP	20% water use reduction is required: 1- select WaterSense-labeled products for WC, Urinal, and showerheads; 2- Select 1.28 GPF toilet, 0.125 GPF urinal, 0.35 GPM public lav., 1.5 GPM kitchen faucet, 1.5 showerheads; 3- Install Energy Star or equivalent ice-machine; 4- No once-through cooling with potable water for any equipment or appliances that reject heat; 5- equip cooling towers and evaporative condensers with makeup water meters, conductivity controllers and overflow alarms, and efficient drift eliminators.
D	P	MEP	Install permanent water meters that measure the total potable water use for the building and associated grounds.
D	2	LA	No irrigation or 100% water use reduction (2 points); 50% water use reduction (1 point)
D	6	MEP/envi	Water use reduction threshold: 25%, 30%, 35%, 40%, 45%, 50%

2				<b>Cooling Tower Water Use</b>		2	MEP	<p><b>Projects without Cooling Towers or Evaporative Condensers:</b></p> <p>Projects may earn full credit if all conditions are met:</p> <ul style="list-style-type: none"> <li>- The baseline system designated for the building using ASHRAE 90.1-2010 Appendix G Table G3.1.1 includes a cooling tower (systems 7 &amp; 8)</li> <li>- The project design case does not include a cooling tower</li> <li>- The design case mechanical system does not use the latent heat of the evaporative cooling of water.</li> <li>- The project does not receive any cooling from a District cooling system</li> </ul>
1				<b>Water Metering</b>		1	MEP	<ul style="list-style-type: none"> <li>- Install permanent water meters for two or more water subsystems: Irrigation, indoor plumbing, DHW, boilers, reclaimed and process water.</li> </ul>

Yes	?	+	?	No
12	5	3		13



**Energy & Atmosphere (EA)**

**Primary Responsibility**

**Points**

**Notes & Required Documentation**

C	Prerequisite 1			<b>Fundamental Commissioning and Verification</b>		P	CxA	<p>Changes from LEED v2.009:  <b>LEED v4 now requires the CxA to be engaged before the design development phase is complete.</b>  <b>Elements of envelope commissioning are now incorporated in the OPR and BOD.</b>            One design review and one operations and maintenance plan are now required.</p>
D	Prerequisite 2			<b>Minimum Energy Performance</b>		P	envi	ASHRAE 90.1-2010 baseline; 2% energy cost reduction for Core and Shell.
D	Prerequisite 3			<b>Building-level Energy Metering</b>		P	MEP	Install permanent electricity and gas utility meters.
D	Prerequisite 4			<b>Fundamental Refrigerant Management</b>		P	MEP	No CFC type refrigerant
C	Credit 1			<b>Enhanced Commissioning</b>		6	CxA	<b>Enhanced Commissioning</b> (3 points); OR Enhanced and Monitoring-based Commissioning (4 Points); AND/OR Envelope Commissioning (2 Points)
D	Credit 2			<b>Optimize Energy Performance</b>		18	envi	15% for 7 point; 21% for 10 points.
D	Credit 3			<b>Advanced Energy Metering</b>		1	MEP	<p>Install advanced energy metering for all whole-building energy sources, and any individual energy end uses that represent 10% or more of the total annual energy use.</p> <p>Electric meters must record consumption and demand, data collection connected to BAS, capable of storing data for at least 36 hours, all meters must be capable of reporting hourly, daily, monthly and annual energy use.</p>
D	Credit 4			<b>Demand Response</b>		2		
D	Credit 5			<b>Renewable Energy Production</b>		3		
D	Credit 6			<b>Enhanced Refrigerant Management</b>		1	MEP	
C	Credit 7			<b>Green Power and Carbon Offset</b>		2	envi/ KSP	enVIENERGY will estimate the cost: 50% or 100% of the annual energy use.

Yes	?	+	?	No
7	3	1		3



**Materials and Resources (MR)**

**Primary Responsibility**

**Points**

**Notes & Required Documentation**

YES	P+	P-	NO
3		3	
1	1		
1	1		
2			

Phase	Indoor Environmental Quality (IEQ)	Points	Primary Responsibility	Notes & Required Documentation
D	Storage and Collection of Recyclables	P	DiMella Shaffer	Changes from LEED v2009: Materials that require dedicated storage now include batteries, mercury-containing lamps, and e-waste; project teams may choose two of the three.
C	Construction and Demolition Waste Management Planning	P	Consigli	Develop and implement a construction and demolition waste management plan: <b>Establish waste diversion goals for the project by identifying at least five materials</b> (both structural and nonstructural) targeted for diversion. Specify whether materials will be separated or commingled and describe the diversion strategies planned for the project. Describe where the materials will be taken and how the recycling facility will process the material.
C	Building Life-Cycle Impact Reduction	6	DiMella Shaffer?	Building or material reuse (2-5 points) Whole-building LCA (3 points) <b>Can DiMella Shaffer use Tally in Revit and perform LCA?</b>
C	Building product disclosure and optimization - environmental product declarations	2	Consigli/ DiMella Shaffer	Use at least 20 different permanently installed products sourced from at least five different manufacturers that meet one of the disclosure criteria: Product-specific declaration OR Environmental Product Declarations OR USGBC approved program. <b>LEED v4.1 changes: 10 different permanently installed products from three different manufacturers for CS and Warehouses &amp; Distribution Centers).</b>
C	Building product disclosure and optimization - sourcing of raw materials	2	Consigli/ DiMella Shaffer	<b>LEED v4.1 changes: 20% compliant criteria (1 pt); 40% compliant criteria (2pts)</b>
C	Building product disclosure and optimization - material ingredients	2	Consigli/ DiMella Shaffer	<b>LEED v4.1 changes: 10 different permanently installed products from three different manufacturers for CS and Warehouses &amp; Distribution Centers).</b>
C	Construction and Demolition Waste Management	2	Consigli	<b>Implement the CWM plan for 3 waste streams. Target 75% diversion.</b> OR Option 2: Do not generate more than 2.5 pounds of construction waste per square foot of the building's floor area. <b>LEED v4.1: The number of waste streams can be reduced if a certified commingling facility is used.</b> 1a: 50% diversion and 3 material streams (1pt); 1b: 50% diversion using Certified Commingled Recycling Facility and one more material stream (1pt); 2a: Divert 75% and 4 streams (2pts); 2b: Divert 75% using Certified Commingled Facility and 2 more streams (2pt)



Phase	Indoor Environmental Quality (IEQ)	Points	Primary Responsibility	Notes & Required Documentation
D	Minimum Indoor Air Quality Performance	P	MEP	Meet the requirements of ASHRAE 62.1-2010: <b>install air-flow monitoring station with an accuracy of +/-10%; an alarm should be generated when the OA value varies by 15% or more from the OA setpoint.</b>
D	Environmental tobacco smoke control	P	KSP/ envi	No Smoking inside the building and within 25 feet of the building + No Smoking Signs. <b>LEED v4.1: Communicate the no-smoking policy to occupants. Have in place provisions for enforcement or no-smoking signage.</b>

Phase	Credit	Innovation (IN)	Points	Primary Responsibility	Notes & Required Documentation
D	Credit 1	Enhanced indoor air quality strategies	2	DiMella Shaffer/ MEP	Entryway systems; interior cross-contamination prevention; and MERV 13 filtration (1 point) Additional Strategies (one strategy for 1 point): exterior contamination prevention; increased ventilation; carbon dioxide monitoring; or additional source control and monitoring.
C	Credit 2	Low-emitting Materials	3	DiMella Shaffer/ Consigli	Low VOC materials: paint and coating; adhesive and sealant; flooring; composite wood; ceiling, walls, thermal and acoustic insulations. 2 points for 4 categories and 3 points for 5 categories.
C	Credit 3	Construction indoor air quality management plan	1	Consigli	Changes from LEED v2009: The use of tobacco products during construction is now explicitly prohibited inside the building and within 25 feet of the building entrance.
D	Credit 5	Daylight	3		
D	Credit 6	Quality Views	1	DiMella Shaffer	Changes from LEED v2009: The exemplary performance requirements from LEED 2009 are now the basis for the credit requirements. Glazing must provide a clear view to the outdoors. The glazing does not have to be located between 30 and 90 inches above the finished floor. Atriums now qualify for up to 30% of the total area.

Yes	?+	?-	No
1	1		
2	1		
1			3
1			

Yes	?+	?-	No
5	0	1	0

1			
1	1		
1			
1			
1			
1			

Yes	?+	?-	No
3	1	0	0

1			
1			
1	1		
1			

Yes	?+	?-	No
55	17	5	33



**Innovation (IN)**

**Points**

**Primary Responsibility**

**Notes & Required Documentation**

Phase	Credit	Innovation (IN)	Points	Primary Responsibility	Notes & Required Documentation
D/C	Credit 1	IN: Green Building Education	1		
D/C	Credit 2	Ex. Performance: BPD or CWD Management	1		
D/C	Credit 3	Other IN or Pilot	1		
D/C	Credit 4	IN: LEED O+M Starter Kit or Other IN	1		
D/C	Credit 5	IN: Walkable Site or other IN	1		
C	Credit 6	LEED Accredited Professional	1		



**Regional Priority (RP)**

**Points**

**Primary Responsibility**

**Notes & Required Documentation**

Phase	Credit	Regional Priority (RP)	Points	Primary Responsibility	Notes & Required Documentation
D	Credit 1	Regional Priority: High priority Site/ Rainwater Management	1		Rainwater Management requires 3 points.
D	Credit 2	Regional Priority: Cooling tower water use	1		
D	Credit 3	Regional Priority: Renewable Energy/ Optimize Energy performance	1		8 points from the energy model is required
C	Credit 4	Regional Priority: Building Life-Cycle impact reduction	1		2 points from LCA.

**Project Total (Pre-certification estimate)**

110

# NOISE MITIGATION

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD

# 101 CAMBRIDGEPARK DRIVE - SPECIAL PERMIT APPLICATION

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## Noise Mitigation Summary

Careful attention has been given to the location and placement of mechanical equipment in order to mitigate its visual and acoustical impact. Noise attenuation strategies to be employed in order to satisfy the requirements of the Cambridge Noise Ordinance will include the following:

- The rooftop mechanical equipment is set back from the edge of the building which provides useful screening. Full enclosure of some equipment will be employed to reduce noise and vibration transmittance.
- The high velocity fans have integral sound attenuators built in them to reduce the external noise emission.
- The generators will have packaged sound attenuator enclosures to reduce their external noise emission.





# EARLY COMMUNITY ENGAGEMENT

87 CAMBRIDGE PARK DRIVE

101 CAMBRIDGE PARK DRIVE

35 CPD

## **101 CAMBRIDGEPARK DRIVE – SPECIAL PERMIT APPLICATION**

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### **Early Community Engagement Meeting Summary**

In accordance with Section 5 of the Rules of the Cambridge Planning Board, HCP/King 101 CPD, LLC, hosted an Early Community Engagement meeting to share their plans with area residents. A meeting was hosted at 200 Cambridgepark Drive on Wednesday, June 12 at 7:00pm. Invitations were mailed two weeks prior to the event. Copies of the invitation are attached hereto.

After consultation with the Community Development Department, invitations were sent to property owners along Cambridgepark Drive. Also notified were Michael Brandon and Richard Clarey of the North Cambridge Stabilization Committee and Doug Brown and Allison Field-Juma of the Fresh Pond Residents Alliance. Attached is a complete list of invitees.

Present at the Community Meeting were representatives of King Street Properties, the project architect, Randy Kreie of Dimella Shaffer, Civil Engineer Doug Hartnett of High Point Engineering, David Black, Traffic Engineer of VHB, and local land use counsel. The meeting began with a welcome and introduction by Tyson Reynoso, Senior Director of King Street Properties. The development team outlined the specific nature of the application to the attendees and shared copies of the proposed plans. At the conclusion of the presentation, questions and comments were solicited from those in attendance.

Six members of the public attended, including Michael Brandon, Clerk of the North Cambridge Stabilization Committee. Questions from attendees focused on the size of the building, conformity with the flood plain guidelines, and anticipated ground floor retail uses. No modifications were made to the design based on comments made at the meeting.

In addition to this meeting, the Project Team presented the proposal at a meeting of the North Cambridge Stabilization Committee on June 26, 2019.

# 101 CAMBRIDGEPARK DRIVE - SPECIAL PERMIT APPLICATION

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## Early Community Engagement Meeting Notification

### ABUTTERS

1. COMMONWEALTH OF MASSACHUSETTS  
STATE HOUSE  
BOSTON, MA 02133
2. PPF OFF 125 CAMBRIDGE PARK DR, LLC  
1585 BROADWAY 37TH FLR  
NEW YORK, NY 10036
3. HINES MIP CAMBRIDGEPARK DRIVE LLC,  
C/O CAMBRIDGE GF DEAL LP  
599 LEXINGTON AVENUE  
NEW YORK, NY 10022-6069
4. PPF OFF 200 CAMBRIDGE PARK DRIVE, LLC  
C/O MORGAN STANLEY REAL ESTATE ADVISOR  
1585 BROADWAY, 37TH FLOOR  
NEW YORK, NY 10036
5. IMP WINDSOR AT CAMBRIDGE PARK LLC  
C/O GID INVESTMENT ADVISERS LLC  
125 HIGH ST., HIGH ST TOWER 27TH FL  
BOSTON, MA 02110
6. PPF OFF 150 CAMBRIDGE PARK DR, LLC  
1585 BROADWAY, 37TH FLR  
NEW YORK, NY 10036
7. PPF OFF 100 CAMBRIDGE PARK DR LLC  
MORGAN STANLEY REAL ESTATE ADVISOR INC  
1585 BROADWAY 37<sup>TH</sup> FLR  
NEW YORK, NY 02140
8. 130 CPD APARTMENTS LIMITED PARTNESHIP  
C/O THE HANOVER COMPANY  
ATTN: EARL SMALLEY  
5847 SAN FELIPE, SUITE 3600  
HOUSTON, TX 77057

## 101 CAMBRIDGEPARK DRIVE - SPECIAL PERMIT APPLICATION

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9. PROPERTIES AT CAMBRIDGE PARK, LLC,  
36 CAMBRIDGEPARK DRIVE  
CAMBRIDGE, MA 02140
  
10. HART CAMBRIDGE LLC  
C/O HEITMAN CAPITAL MANAGEMENT LLC,  
191 NORTH WACKER DRIVE. SUITE 2500  
CHICAGO, IL 60606
  
11. 88 CAMBRIDGE PARK LIMITED PARTNERSHIP  
5847 SAN FELIPE, SUITE 3600  
HOUSTON, TX 77057
  
12. DIV 35 CPD, LLC  
125 HIGH ST. 21ST FLOOR  
BOSTON, MA 02110
  
13. MASSACHUSETTS BAY TRANSPORTATION  
AUTHORITY  
10 PARK PLAZA  
BOSTON, MA 02116

### NEIGHBORHOOD ORGANIZATIONS

#### West Cambridge - Neighborhood 10

##### **Fresh Pond Residents Alliance**

Doug Brown, co-Chair  
[douglas\\_p\\_brown@yahoo.com](mailto:douglas_p_brown@yahoo.com)

Web: <https://freshpondresidents.org/>  
Facebook: [Fresh Pond Residents Alliance](#)

Allison Field-Juma, co-Chair  
[fieldjuma@gmail.com](mailto:fieldjuma@gmail.com)

#### North Cambridge - Neighborhood 11

##### **North Cambridge Stabilization Committee**

Michael Brandon, Clerk  
[NCSC-mail-  
owner@yahoogroups.com](mailto:NCSC-mail-owner@yahoogroups.com)  
617/864-3520 (phone)  
617/948-5971 (fax)

Meeting Notices & Announcements:  
<http://groups.yahoo.com/group/NCSC-mail/>

Richard Clarey, Chairman  
[rclarey@aol.com](mailto:rclarey@aol.com)  
15 Brookford Street  
Cambridge, MA 02140  
617/876-0191 (phone)

## **EARLY COMMUNITY ENGAGEMENT MEETING**

### **OPEN HOUSE**

**Wednesday June 12, 2019  
7:00PM**

You are invited to attend an Open House at The Park Café at 200 Cambridgepark Drive hosted by King Street Properties to learn about their proposal to construct a new 145,000 sf office and laboratory building at 87-101 Cambridgepark Drive.

In addition to representatives from King Street Properties, the project architect will be in attendance to present the proposed plans for this building and answer questions.

This proposal will require a Special Permit from the Cambridge Planning Board and approval from the Cambridge Conservation Commission.

For additional information, please contact Tyson Reynoso at 617-910-5504.