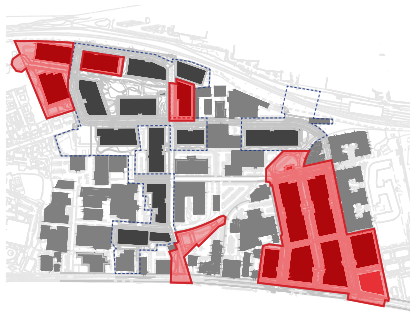




KEY PLAN



LEGEND

KEY	DESCRIPTION
	LIMIT OF WORK
	ROW / PARCEL LIMIT

PHASE 2 PROP. PRIVATE TREES

KEY	DESCRIPTION	QTY	TOTAL CALIPER (IN)
	PROPOSED PRIVATE TREES	233	699

City of Cambridge Tree Protection Ordinance (TPO), Title 8, Chapter 8.66, of the City's Municipal Code.



PHASE 2

Figure 2A.5d: Tree Study: Phase 2 Proposed Private Trees
 Healthpeak PUD Master Plan | Cambridge, MA



LEGEND	
KEY	DESCRIPTION
	LIMIT OF WORK
	ROW / PARCEL LIMIT
	PRIVATE PROPERTY: WORK IN THIS AREA REQUIRES RIGHTS FROM THIRD PARTY
	DEVELOPMENT PARCEL
	EXISTING CITY ROW

PROP. + TO RETAIN TREE SUMMARY			
KEY	DESCRIPTION	QTY	TOTAL CALIPER (IN)
	EXISTING PRIVATE TREES TO BE RETAINED	8	104.4
	EXISTING STREET TREES TO BE RETAINED	0	0.0
	PROPOSED PRIVATE TREES	447	1341
	PROPOSED STREET TREES	310	930
TOTAL MASTER PLAN TREES		765	2375.4

City of Cambridge Tree Protection Ordinance (TPO), Title 8, Chapter 8.66, of the City's Municipal Code.

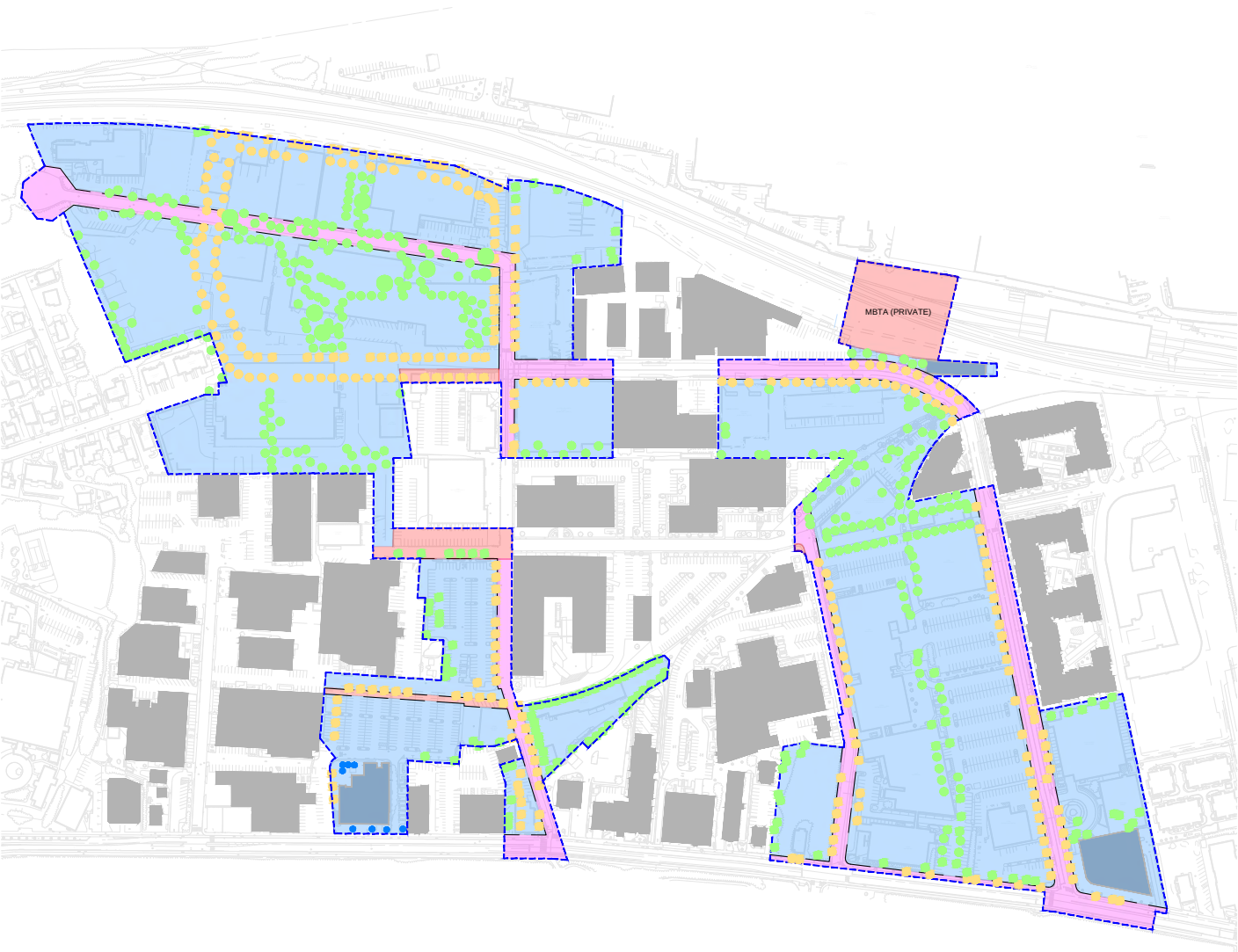


Figure 2A.6: Tree Study: Master Plan Tree Summary
 Healthpeak PUD Master Plan | Cambridge, MA



Figure 2A.7a: Site Proposed Tree Plan - Canopy Year One
Healthpeak PUD Master Plan | Cambridge, MA





Figure 2A.7b: Site Proposed Tree Plan - Canopy Year 10
Healthpeak PUD Master Plan | Cambridge, MA





Figure 2A.7c: Site Proposed Tree Plan - Canopy Year 25
Healthpeak PUD Master Plan | Cambridge, MA



2.2 Urban Design Objectives Narrative (19.24.4)

The Project embraces each of the four (4) Urban Design Objectives enumerated within the Alewife Design Guidelines and is consistent with the AOD-Q zoning requirements. The following documents collectively comprise the Alewife Design Guidelines and Principles:

- Section 20.1100 of the CZO
- Alewife Design Guidelines (2023)
- Envision Alewife District Plan (2019)
- Alewife Zoning Working Group Principles (2023)

Specific descriptions of the Project's consistency with CZO, the Alewife Design Guidelines and the Principles is covered elsewhere in **Volume I, Section 3—Consistency with Specific Permit Zoning Criteria, Volume I, Section 4—Consistency with Planning Documents, and Volume II, Section 1—Planned Unit Development Requirements of this Application**. The following is intended to document the consistency of the Project, as hereby submitted for Project Review Special Permit, with the Urban Design Objectives set forth in the AOD-Q zoning.

2.2.1 Responsiveness to the existing or anticipated pattern of development (19.31)

The overarching goal of the Project is to foster a welcoming and connected innovative environment, one that nurtures a vibrant, diverse, and inclusive community. This mixed-use Project is designed to offer meaningful opportunities for shared discovery, collaboration, and connection among people from all walks of life. The Project is a community-centered vision, where streets, parks, plazas, and passageways come together to form a civic framework that integrates seamlessly with surrounding neighborhoods.

What is today an isolated area will be transformed into a natural extension of the City's fabric, one where the boundaries between existing neighborhoods and new development are intentionally softened to promote inclusivity and cohesion. The Project's diverse and interconnected network of publicly accessible spaces is carefully positioned to welcome the broader community, drawing people into and through the Development Parcel.

Central to this transformation is the breaking up of the Development Parcel's existing superblock to create stronger physical and social connectivity. The Project includes significant public infrastructure

improvements, such as the creation of New Main Street to link Concord Avenue, an east-west plaza connection, the completion of Wilson Road and Adley Road, and the introduction of New Mooney Street. Together, these enhancements will deliver over 230,000 SF of new and improved public streetscape designed with walkability, safety, and multimodal mobility in mind. The finer grained street grid will make the area more permeable and pedestrian friendly, encouraging active transportation and supporting spontaneous social interactions.

2.2.2 Embrace and enhance a pedestrian and bicycle-friendly city (19.32)

The Development Parcel is located within the Alewife Quadrangle neighborhood, with access from Concord Avenue as it intersects with Wheeler Street, Fawcett Street, Moulton Street, and Smith Place.

The Applicant is committed to managing vehicular impacts and providing safer infrastructure for pedestrians and bicyclists traveling to/from the Development Parcel or other locations in the City.

As further described in **Volume II, Section 1.14.4**, the Applicant is committed to minimizing auto travel and encouraging alternative travel modes. The Applicant will support a program of proactive TDM actions to reduce

single occupancy vehicle automobile trips, support carpooling, and encourage the use of transit, biking, and walking. The Applicant will work with tenants of the new buildings to join the Alewife Transportation Management Association and implement effective TDM strategies that are incorporated in the PTDM. As further described in **Volume II, Section 1.5.2**, the Project will be supported by up to 4,477 parking spaces located within four (4) free standing parking garages (P1, P2, P3, and P4), and six (6) parking structures located within the following buildings: R1, R2, R3, R4, R5 and R8. Additionally, 14 spaces will be allocated for DPW Facility Project, and 51 on-street parking spaces will be provided on New Main Street, Wilson Extension, Adley Road and adjacent to the cul-de-sac.

The surrounding area has a significant network of existing and planned bicycle routes. As shown in **Figures 1D.7 and 1D.8**, the Project will extend that network into the Development Parcel with access to all Project streets, including separated bicycle lanes on Fawcett Street, Moulton Street, and Smith Place. An important element of the Project is enhancing the pedestrian and bicycle connections in the area. **Figures 1D.5 and 1D.8** illustrate the proposed access and circulation scheme for pedestrians and cyclists, respectively.

As further described in **Volume II, Section 1.6.1**, an essential element of the Project is the construction of a Proposed Bridge, a new pedestrian and bicycle connection over the MBTA commuter rail tracks that will provide a long-awaited connection between the Quad and the Alewife Triangle/Alewife MBTA train station to the north. The final design of the Proposed Bridge is subject to approval by the MBTA and local agencies with jurisdiction.

Under the existing conditions, most of the Quad, particularly sites located west of Wheeler Street, experience a walk time from the Quad to the Alewife MBTA Station of approximately 15-20 minutes (3/4 mile to 1 mile). With the Proposed Bridge in place, most of the Quad would experience a walk time from the Quad to the Alewife MBTA train station of about 8-15 minutes on average (1/2 mile to 3/4 mile). It is anticipated that the Proposed Bridge would result in a savings of approximately 5-7 minutes, depending on where in the Quad the pedestrian originates their trip.

2.2.3 Mitigation of adverse environmental impacts (19.33)

The Project integrates a coordinated set of resiliency measures designed to mitigate adverse environmental impacts associated with flooding, stormwater, and climate change. First floors are elevated relative to grade to exceed projected LTFEs, thereby reducing risk to occupied spaces and critical infrastructure, except as provided in **Volume I, Section 3.8**. Building systems are located or protected to ensure continuity of operations during flood events. Site-wide strategies incorporate green infrastructure, including stormwater detention, infiltration, and treatment systems that mitigate runoff volume and improve water quality prior to discharge. Landscape design reduces urban heat island effects through canopy coverage and permeable materials, while open spaces are structured as functional components of the stormwater management system. Together, these measures minimize environmental impacts, enhance climate adaptation capacity, and ensure compliance with applicable resiliency and sustainability standards.

2.2.4 Mitigation of burden on city infrastructure (19.34)

The Project will be designed to comply with the City's stormwater management directives and regulations. As designed, the Project will greatly reduce the rate and volume of runoff from the Development Parcel to the municipal systems. Stormwater will be managed by a combination of detention, retention, infiltration, green/purple roofs, and proprietary water quality structure that will improve stormwater quality with treatment to reduce pollutants, floatables, sediment and other contaminants in the stormwater runoff.

2.2.5 Reinforcement of the urban framework of Cambridge (19.35)

The introduction of neighborhood, focused uses along the proposed New Main Street, including vibrant retail, flexible community space, and a range of dining options, will serve as a dynamic activation within the Quad. This lively mix of uses is thoughtfully curated to reflect and connect to North Cambridge's Shopping Center District, fostering a strong sense of place and synergy with the surrounding neighborhood. By incorporating a diverse mix of residential, laboratory, office, retail uses, the Project aims to embed itself into the daily rhythms of the neighborhood, seamlessly integrating into the urban fabric of Cambridge.

In alignment with the City's broader goals, the Project is pursuing an Infrastructure PUD and a Large Land Conveyance under Section 20.1100.5 of the CZO, which will unlock transformative civic benefits. Chief among these is the creation of the Proposed Bridge, an essential piece of infrastructure that will dramatically enhance access to public transportation and stitch together the Alewife Quadrangle and Triangle. This new connection will weave disparate districts into a more cohesive, walkable, and interconnected Cambridge.

In addition, the conveyance of at least one (1) acre of land to the City will provide long-term support for DPW. Through this contribution, the City will be better equipped to maintain and enhance critical systems such as stormwater management, road maintenance, green infrastructure, and municipal utilities, foundational elements that sustain the health and functionality of urban life.

A minimum of 3% of the total new non-residential GFA within the Development Parcel will be dedicated to neighborhood uses, ensuring the street edges remain animated, community-oriented, and alive throughout the day and into the evening. These spaces will accommodate local enterprises and cultural initiatives, contributing to a sense of identity and place.

Finally, the Project will deliver approximately 600,257 SF of publicly beneficial open space, or approximately 38% of the land area in the Development Parcel, offering places for recreation, gathering, relaxation, and ecological enrichment. The publicly beneficial open spaces will provide essential breathing room within the urban environment, supporting mental and physical wellness, fostering community interaction, and reinforcing the City's commitment to environmental resilience and inclusive urban life.

2.2.6 Expansion of housing inventory (19.36)

As further described in **Volume II, Section 1.10**, in alignment with the Alewife Overlay District—Quadrangle requirements, the Project proudly dedicates over 40% of the non-exempt GFA within the Development Parcel to residential use, resulting in the creation of approximately 2,300 new homes thoughtfully distributed across eight (8) residential buildings. These homes will include a mix of unit types, including three-bedroom options, to support and attract families to the area, helping foster a more diverse and vibrant community. Housing will include a mix of market rate and inclusionary units in partnership with the City to support diverse households and family sizes.

Residential buildings are strategically located near Concord Avenue, the Proposed Bridge, and a reverse commute parking garage. These new homes will benefit from strong connections to regional transit and open space networks. The residential buildings are also thoughtfully positioned near neighborhood uses and adjacent to a network of publicly beneficial open spaces that link major green areas throughout the Quad, making it easy for residents to enjoy a healthy, active lifestyle close to home.

Housing plays a significant role in the overall vision of the Project, both in its scale and its urban presence. Through the City's Inclusionary Housing provisions, the Project will contribute meaningfully to the City's ongoing efforts to create a welcoming, diverse community that reflects the City's dynamic and inclusive character.

2.2.7 Enhancement and expansion of open space (19.37)

The Project aims to deliver essential publicly accessible open spaces to support the new development, as well as address the significant shortage currently faced by the neighborhood. The over 13-acre open space network will be thoughtfully designed to link amenities within the Development Parcel, while also extending and connecting to adjacent neighborhoods and the City's wider existing open space system.

Plazas

Typically located adjacent to active streets and ground floor building amenities, plazas serve as gateways to larger neighborhood parks. These vibrant multiuse spaces can host farmers' markets and pop-up vendors, as well as outdoor performances and music events that bring the community together. Plazas are ideal for public art installations and seasonal decorations, creating dynamic and attractive environments throughout the year. They also facilitate social gatherings and informal meetings, with food trucks and café seating providing options for daily use.

Larger Neighborhood Parks

Larger neighborhood parks are expansive open spaces designed to meet the diverse needs of the broader community. These parks often feature active play activities, along with walking, running, and biking trails for fitness and leisure. Integrated nodes encourage gatherings among families and friends, while children's playgrounds and splash pads provide safe play environments. Additionally, group exercise spaces promote health and wellness, and the parks can accommodate community festivals and outdoor movie nights, serving as a hub for recreation and celebration.

Passages

Passages are pedestrian corridors and greenways that connect various elements within the Project, enhancing both mobility and accessibility. These routes may also include small seating nooks, offering quiet spots for casual conversation and reflection.

Streetscapes

Streetscapes represent the enhanced public realm along the neighborhood streets, designed to blend mobility with thoughtful landscape features. These areas support walking, jogging, and cycling along buffered paths, with street trees and plantings providing shade and visual appeal. Outdoor dining areas adjacent to local businesses encourage social interaction and economic activity, while site furnishings create pedestrian scale and areas for pause. Streetscapes are also adaptable for seasonal events such as community events and street fairs, contributing to a lively and connected urban environment.

2.2.8 Resiliency to climate change impacts as anticipated in the Resilient Cambridge plan published by the City (19.38)

The Project aligns with the City's Resilient Cambridge Plan by implementing climate resilience strategies that address projected increases in temperature, precipitation, and flood risk over the anticipated lifespan of the Project. The Resilient Cambridge Plan emphasizes the need for "better buildings" and "stronger infrastructure" to mitigate climate impacts, and the Project incorporates these principles by elevating critical equipment and residential units above projected flood elevations, integrating stormwater mitigation measures, and providing standby power for critical equipment. As described in detail in **Volume II, Section 1.13**, the Project meets or exceeds the Flood Resilience Standard in Section 22.80 (except where noted) and the Green Factor Standard in Section 22.90 of the CZO, employing passive building envelope designs and extensive vegetation to manage heat and stormwater, thereby reducing energy use and greenhouse gas emissions. These design strategies not only enhance resilience, but also offer environmental co-benefits, such as improved occupant comfort during extreme heat and power outages. By taking an integrative approach that considers the existing context and promotes the City's broader design objectives, the

Project demonstrates a commitment to the resilience objectives outlined in Section 19.38 of the CZO and contributes to the overarching goals of the Resilient Cambridge Plan.

2.3 Infrastructure Plan and Narrative (19.24.5 and 19.24.6)

The Project will provide new domestic water and sanitary sewer services for all buildings that will connect to the municipal water distribution system and nearby municipal gravity sewer and drain systems serving the Development Parcel. It will be designed to comply with all applicable local, state, and federal regulations. Building systems will be primarily all-electric, with fossil fuels reserved only for backup power. Eversource is anticipated to be the local service provider for electrical utilities. **Figures 2C.1a-f** and **Figures 2C.2a-f** illustrate existing and proposed utilities, including sanitary sewer, storm drain, domestic water, electric and telecommunications.

2.3.1 Sewer Infrastructure

The Development Parcel currently has sanitary sewer connections from multiple buildings to the municipal sanitary system located in the abutting City streets —Mooney Street, Smith Place, Fawcett Street and Moulton Street. The sanitary sewer in these roadways eventually drain to a sewer manhole located in Fawcett Street at 80-90 Fawcett Street. From this manhole, an 18-inch reinforced concrete pipe connects to the Massachusetts Water Resources Authority sewer in Wheeler Street through the 80-90 Wheeler Street property.

The sanitary sewage from this Project will be collected by new sanitary sewer services from the proposed buildings. Each proposed building will be designed to include an 8-hour sanitary holding tank to retain sanitary sewer waste on site during high flow events. These services will discharge to the existing municipal sewer or to new sewer mains located in the proposed roadways constructed as part of the Project. The Project will maintain the existing municipal sewer system as described above.

The Project is expected to generate a greater quantity of wastewater flow than the existing uses. Based on Title V Flow estimates, the proposed development and uses will generate approximately 752,979 GPD of new wastewater flow, as shown in **Table 2-1** below. The wastewater generation and water demand calculations in this table are based on the current development program and may be revised during the final design of each building.

The existing buildings within the Development Parcel generate approximately 48,174 GPD of wastewater flow, which will be removed as part of the Project. This results in a net new sewer generation of 704,804 GPD for the entirety of the Project.

Table 2-1 Estimated Wastewater Flow and Water Demand

Total Sewage Generation	±752,979	GPD
Existing Sewage Generation	±48,174	GPD
Net Sewage Generation	±704,804	GPD
Net Water Demand	±775,285	GPD

*Net Water Demand is based on Title 5 sewer demand with a factor of 10% applied

The Applicant met with DPW on December 5, 2024, to review the sanitary sewer demands and stormwater management strategy for the Project. Based on coordination with DPW, the Applicant has provided sewer monitoring data to DPW to assist DPW in determining the capacity of the municipal sanitary sewer and storm drain systems in vicinity of the Project. The Applicant will continue to work with DPW once the results of the monitoring program are known, to determine the capacity of the existing municipal gravity systems, based on the proposed net new flow from the Project.

The Applicant met with DPW again to review the Project on March 12, 2026. As part of this coordination meeting, the Applicant has added 8-hour sanitary holding tanks for all new buildings within the Development Parcel. These holding tanks will be used to hold back sanitary flow in the event that the municipal system is flowing full to mitigate CSO events. The sanitary holding tanks will be located on private property and will have flow monitors installed in the City right-of-way to measure the capacity of the City system. If large storm events result in the City separated sewer system being close to capacity, the sanitary holding tanks will be utilized to hold any sewer generation from the Development Parcel until the City system has capacity to handle the flows.

The wastewater flow generation threshold for DPW I/I mitigation is 15,000 GPD. As shown in **Table 2-1** above, the Project will exceed this threshold. The Project will provide I/I mitigation at a rate of 4:1 which will reduce inflows into the City sewer system, thereby reducing the impact of the development on CSOs. Regional CSO issues with the MWRA will be coordinated by DPW. It is anticipated that the Project will be constructed in phases, which will have corresponding I/I mitigation requirements. On a building-by-building basis, the Project will provide the appropriate I/I based on the sewer generation. The Applicant anticipates meeting with DPW after the results of the sewer monitoring program have been collected to discuss the I/I mitigation requirements for the Project.

The Applicant met with DPW on June 8, 2026. DPW presented preliminary findings of their infrastructure model, and potential I/I sources within the Alewife Quad neighborhood. The Applicant will continue to work with DPW throughout the Project to determine these I/I sources within the neighborhood, and any potential localized existing infrastructure deficiencies. These improvements will be coordinated on a building-by-building basis. Additionally, phased utility infrastructure plans will be coordinated with DPW prior to the issuance of the first proposed building, per each phase.

2.3.2 Stormwater Infrastructure

2.3.2.1 Existing Drainage Conditions

The majority of the existing Development Parcel drains to two distinct municipal discharge locations, referred to as Design Points A and B. A very small portion of the existing Development Parcel drains to the MBTA commuter rail tracks to the north, which is referred to as Design Point C. The frontage of 725 Concord Avenue, referred to as Building E3 of the Project, drains out to the roadway drainage along Concord Avenue. This frontage drains via closed drainage in the street to a culvert at Fresh Pond, Design Point D. No changes to this area are proposed as part of the Project but have been included here as part of the Development Parcel.

Refer to **Figure 2C.3a** for the existing stormwater management conditions.

Design Point A

The majority of the Development Parcel drains via a closed drainage system to a DPW-owned 6-foot by 8-foot box culvert located at the bend in Fawcett Street near the northeastern boundary of the Development Parcel. This culvert conveys stormwater beneath the MBTA commuter rail tracks to Cambridgepark Drive and discharges to the Little River via the Alewife Forebay.

The northern portion of the Development

Parcel drains to a 36-inch reinforced concrete pipe in Fawcett Street. The southern portion drains via Wilson Road to a 36-inch ductile iron pipe in Fawcett Street. Both storm drains connect to the 6-foot by 8-foot box culvert. The existing on-site drainage system provides minimal infiltration or detention; runoff from roofs and paved areas generally flows overland or via catch basins and drain manholes to the municipal system without significant on-site storage or treatment.

Design Point B

The westernmost portion of the Development Parcel, in the vicinity of Mooney Street, drains via surface runoff and existing on-street drainage to a DPW-owned 41-inch by 42-inch culvert that also discharges to the Little River. This area is predominantly covered by buildings, asphalt parking, and internal roadways with limited pervious or landscaped areas. There are no known on-site stormwater treatment, retention, or infiltration facilities serving this drainage area.

Design Point C

To the north and west of Mooney Street, a portion of the existing Development Parcel drains overland to the MBTA commuter rail tracks, north of the Development Parcel. This area is predominately asphalt parking with limited landscaped areas and a small roof area.

Design Point D

Along the frontage of 725 Concord Avenue, there is a small portion of landscaped area that drains overland to the Concord Avenue closed drainage system. This drainage area eventually discharges to a culvert in proximity to Fresh Pond.

2.3.2.2 Proposed Drainage Conditions

The proposed condition includes a comprehensive stormwater management system designed to reduce impervious cover by 10% over the total land area compared to existing conditions through the introduction of landscaping and pervious areas. It is also designed to promote infiltration where feasible, manage runoff volume in accordance with the City of Cambridge June 2021 Supplemental Stormwater Directive, and improve water quality in support of the Mystic River and Alewife Brook Total Maximum Daily Loads (“TMDLs”).

The Development Parcel layout introduces additional landscaped and pervious areas and low-impact development practices. Stormwater runoff from roofs, streets, and open spaces will be collected and routed to a combination of:

- Subsurface detention systems located within building parcels and beneath proposed streets;

- Infiltration practices, such as shallow infiltration chambers, detention chambers and infiltration wells, where subsurface conditions allow; and
- Structural water quality devices sized to achieve required removals of total suspended solids (“TSS”) and phosphorus. Structural water quality devices may include sand filters, where space allows, or proprietary treatment structures in cases where space is limited.

Refer to **Figure 2C.3b** for the proposed stormwater management conditions.

2.3.2.3 Analysis Assumptions

Hydrologic and hydraulic analyses have been completed in accordance with MassDEP Stormwater Management Standards and City stormwater management criteria, including the June 2021 Supplemental Stormwater Directive.

The analyses used 2070 projected rainfall depths for the 2-, 10-, 25-, 50-, and 100-year, 24-hour storm events as adopted by DPW. These stormwater rates are 3.65-in, 6.40-in, 8.22-in, and 11.70-in, respectively. The Project has been evaluated for peak discharge rates and runoff volumes for the 2-, 10-, and 25-year, 24-hour storms and will reduce the peak rate and volume of runoff for all storm events. The land that will remain private after Development Parcel

development will mitigate the difference between the existing 2-year and proposed 25-year, 24-hour storms, in accordance with the City's "25-2" volume management requirement.

Wherever possible, infiltration systems have been sized to infiltrate the first inch of runoff to provide phosphorus removal, as required by the City of Cambridge Stormwater Management Standards and the Mystic River Watershed Alternative TMDL Development for Phosphorus Management, as prepared for the EPA in January 2020.

A stormwater analysis was completed using an accepted hydrologic/hydraulic model (HydroCAD) using TR-55 methodologies, supported by site-specific soils mapping, groundwater information, and infiltration testing, where available, to verify the site-specific stormwater solutions. As the Project advances, more detailed geotechnical information will be collected and used to verify and modify the site-specific stormwater solutions, to the extent required by the ground conditions.

Results of this analysis are summarized in **Table 2-2** below.

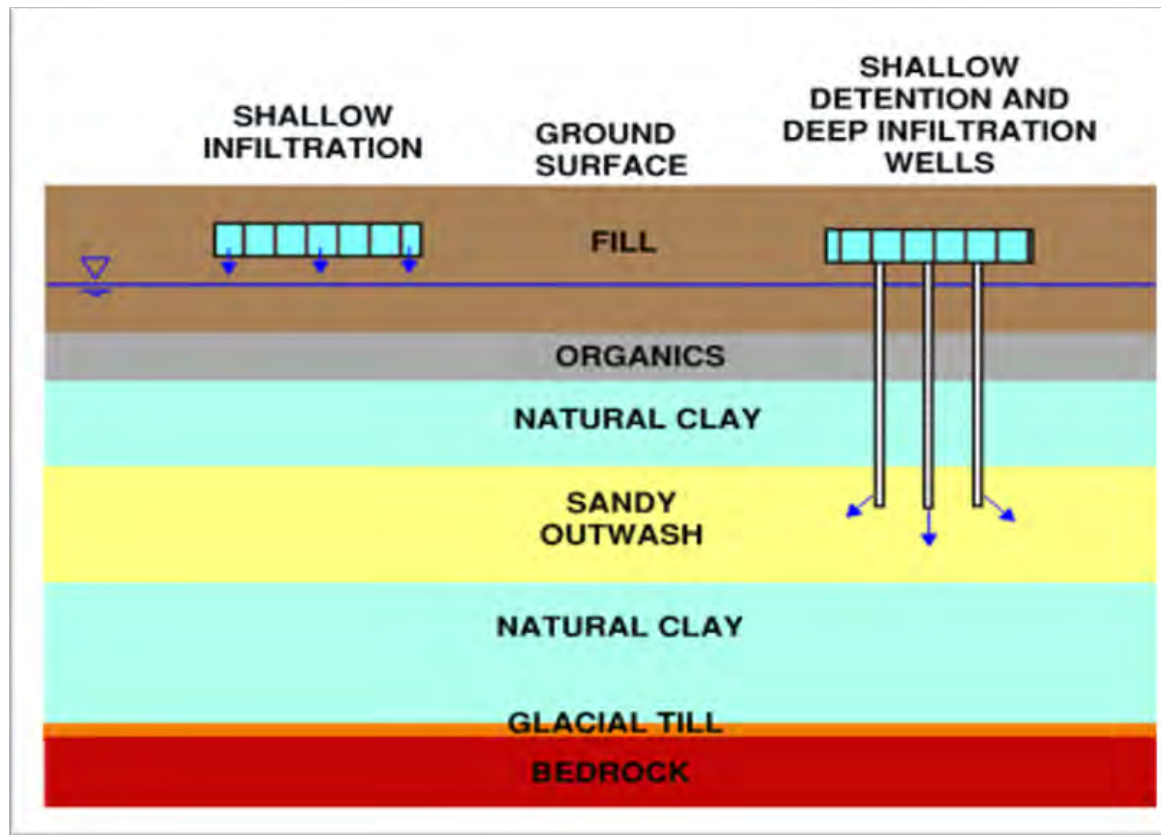
2.3.2.4 Potential Impacts to Alewife Brook Reservation

The Development Parcel shares a regional drainage connection with the Alewife Brook Reservation through the municipal storm drain system and the Little River/Alewife Forebay. Consistent with comments from DCR, the Project has been designed to avoid new direct discharges to the Reservation and to limit indirect impacts by:

- Maintaining or reducing peak discharge rates at existing municipal discharge points for key design storms;
- Providing on-site volume management to mitigate increases in runoff associated with climate-adjusted 25-year storms;
- Treating stormwater prior to discharge to reduce TSS and phosphorus loads to downstream receiving waters; and
- Implementing robust construction-phase erosion and sediment controls and post-construction stabilization along the shared drainage interface.

Final grading, landscaping, and stormwater infrastructure will be designed to direct runoff to on-site treatment systems, stabilize disturbed areas, and protect existing municipal drainage infrastructure. Coordination with DCR and DPW will continue through design review.

Figure 2.3.2-1 Stormwater Management Concepts



2.3.2.5 Proposed Stormwater Management Plan

Measures to Retain/Infiltrate Stormwater Flows On-Site

Preliminary geotechnical investigations have been performed at the Development Parcel to evaluate the feasibility of shallow infiltration for the Project.

Subsurface conditions in the Alewife Quad are highly variable across the Development Parcel because of the area's complex geologic and previous development history. In general, the subsurface geology consists of a surficial layer of man-placed fill over organic deposits, where present, underlain by variable clay and sandy outwash deposits, glacial till, and bedrock at depth. Groundwater levels generally range from five to 15 feet below ground surface. Infiltration feasibility for each parcel was evaluated based on available environmental information, groundwater level data, and soil gradation descriptions from limited subsurface explorations.

Stormwater management through on-infiltration is not recommended in areas of known groundwater contamination, because infiltrated stormwater could mobilize contaminants and worsen existing soil or groundwater conditions. As identified in **Figure 2C.3c**, there are three known contamination areas associated with RTNs

3-30408, 3-18094, and 3-30223. Infiltration is not allowed within 75 feet of these areas, as recommended by the LSP.

Outside of these areas, stormwater infiltration was evaluated for various approaches considering the high groundwater levels and highly variable geologic conditions. As illustrated in **Figure 2.3.2-1** above, the feasible approaches include: shallow infiltration systems; deep infiltration wells, or both, subject to final engineering design; and parcel-specific conditions and future hydrogeologic evaluations.

Shallow infiltration would use recharge chambers installed at least two feet above seasonal high groundwater levels and would discharge to permeable fill or underlying outwash deposits. At some locations, shallow infiltration may not be feasible because of the shallow depth to groundwater, low hydraulic conductivity of the near surface soils, or potential for excessive groundwater mounding. In these locations, deep infiltration wells may be installed in sandy outwash deposits ranging from about 10 to 100 feet below ground surface. Future Project design studies for each parcel will define the depth, location, and number of deep infiltration wells.

With these constraints, the Project can use infiltration-based stormwater management in suitable areas while avoiding locations where infiltration could worsen existing groundwater.

Potential Comprehensive Stormwater Management Strategies

The Development Parcel consists of a multitude of parcels separated by existing City streets and abutting land not controlled by the Applicant, which limits the ability to provide communal stormwater management systems on a Project-wide basis. However, as illustrated in **Figure 2C.3b**, the proposed conceptual stormwater management design has been evaluated to provide communal stormwater systems where feasible. Based on geotechnical information, three communal stormwater management systems have been located to infiltrate the water quality storm event (1-inch) for the following areas:

- Mooney Green—Shallow detention chambers with recharge wells to take stormwater from Buildings C2, C3, C4, C6, and P2 of the Project.
- Mooney West—Shallow infiltration chambers to take stormwater from Buildings C1 and P1 of the Project.
- New Main Street—Shallow detention chambers with recharge wells to take stormwater from Buildings C7 and C8 of the Project.

The Project is designed to meet DPW's "25-2" standard for all private sites, and as such, will greatly reduce the peak rate of flow to the City system. Based on preliminary soil investigations, it is anticipated that the Project will be able to infiltrate the first inch of water in areas where soil conditions allow for infiltration, which will result in a reduction in stormwater volume to the municipal system.

2.3.2.6 Regulatory Compliance

The Project has been designed to comply with the MassDEP Stormwater Management Standards, the City's MS4 and DPW standards, as well as the TMDL for Phosphorus Removal, required by the TMDL for the Mystic River Watershed.

Land Use with Higher Potential Pollutant Loads (LUHPPL)

The Development Parcel is not considered a land use with higher potential pollutant loads.

Compliance with Massachusetts Stormwater Management Standards

As designed, the Project will comply with the MassDEP Stormwater Management Standards. Each phase of development, as coordinated with the City, will meet the Stormwater Management Standards fully. A detailed description of each of the 10 standards and the Project intention for each one is described below.

Standard 1—No New Untreated Discharges

The Project will not create new untreated discharges to wetlands or surface waters. All new discharges to the municipal system will receive treatment.

Standard 2—Peak Rate Attenuation

Post-development peak discharge rates at Design Points A and B will be maintained at or below existing conditions for the 2-, 10-, and 25-year, 24-hour storm events (2070 rainfall), as summarized in **Tables 2-2** and **2-3** below.

Table 2-2 Peak Rate of Runoff Comparison (CFS)

STORM EVENT	DESIGN POINT A		DESIGN POINT B		DESIGN POINT C		DESIGN POINT D (NO CHANGE)	
	EXISTING	PROPOSED	EXISTING	PROPOSED	EXISTING	PROPOSED	EXISTING	PROPOSED
2-YR	125.4	51.7	24.1	8.7	5.82	-	0.27	0.27
10-YR	226.1	109.8	42.9	18.0	10.51	-	0.55	0.55
25-YR	292.0	148.2	55.3	23.4	13.6	-	0.75	0.75
100-YR	420.1	289.1	79.5	43.8	19.61	-	1.11	1.11

Standard 3—Recharge

Infiltration Best Management Practices (“BMPs”) will be provided, where feasible, to meet MassDEP recharge criteria. Where infiltration is constrained, alternative volume management consistent with the City’s “25–2” requirement will be provided.

The Project is a redevelopment and will result in a 10% net decrease in impervious surfaces over the total land area, compared to existing conditions, which will promote recharge to groundwater. As designed, the Project approximately doubles the amount of landscape area, compared to existing conditions.

Standard 4—Water Quality

All new impervious areas will receive stormwater treatment designed to achieve at least 80 percent TSS removal on an average annual basis, with significant phosphorus reduction in support of the Mystic River TMDL.

Standard 5—Land Uses with Higher Potential Pollutant Loads (LUHPPL)

The Project is not considered a LUHPPL.

Standard 6—Critical Areas

The Project does not drain to a critical area.

Standard 7—Redevelopment

The Project redevelops previously disturbed land and will improve existing stormwater conditions by reducing impervious areas, where practicable, introducing new BMPs, and providing volume and peak rate control where these functions are currently limited or absent.

Standard 8—Construction Period Pollution Prevention

A Construction Period Pollution Prevention and Erosion and Sedimentation Control Plan will be prepared and implemented.

Table 2-3 Land Cover Comparison

	EXISTING LAND COVER (ACRES)	% OF TOTAL AREA	PROPOSED LAND COVER (ACRES)	% OF TOTAL AREA	% CHANGE
<i>LANDSCAPE</i>	+4.3	10%	+8.8	20%	109%
<i>PAVEMENT/ SIDEWALK</i>	+26.4	60%	+14.7	33%	-44%
<i>ROOF</i>	+13.3	30%	+20.5	47%	54%
<i>TOTAL</i>	+44.0		+ 44.0		

Standard 9—Operations and Maintenance Plan

A long-term Operations and Maintenance Plan will be prepared for all stormwater BMPs, identifying responsible parties, inspection and maintenance requirements, and record-keeping procedures.

Standard 10—Prohibition of Illicit Discharges

No illicit discharges will be introduced to the stormwater system. Any existing illicit connections identified during construction will be removed or corrected in coordination with DPW.

2.3.3 Water Infrastructure

The Project will connect to the existing water infrastructure located in the City streets abutting the Development Parcel. Where new roadways are created, new 12" cement-lined ductile iron water main will be installed to provide water to the buildings. It is anticipated that each residential building will have dual domestic water services and one fire protection service. Commercial buildings will incorporate domestic and fire protection pursuant to building code requirements, as the designs for the individual buildings advance. The Applicant will coordinate with the Cambridge Water Department ("CWD") on providing the necessary fire hydrants and water utilities to support the use.

Based on the estimated Title V sewer flows, the estimated water demand for the Project is 775,285 gallons per day. (Refer to **Table 2-1** above for the Title 5 calculated sewer flow rates for the Project.)

The Project does not anticipate that municipal water system will need to be upgraded to support the Project's water demand. The Applicant met with CWD on April 1, 2025, and provided the City with the estimated water demand for the Project. The CWD confirmed via memorandum on April 24, 2025, that the municipal water system has capacity to support the Project.

2.3.4 Energy Infrastructure

The Applicant will undergo a systematic, well-coordinated, multi-phased effort to establish the installation of electric utility services to each of the buildings on the proposed parcels. The phasing strategy for the Project's energy infrastructure will be studied by the Applicant, prior to obtaining building permit, during early design stages for each building in accordance with the City's conditions of approval provided with the PUD Special Permit. The team will study in further detail the infrastructure improvements required for the particular building both on private property or public right of way with consideration to a holistic strategy for a particular Project subphase (Phase 1A, Phase 1B, Phase 2A, Phase 2B) and its subsequent phases. This will be

reviewed with the City during Design Review and coordinated with planning of the Applicant's required municipal utility improvements for storm drain, sewer, and private telecommunications improvements through meetings with City staff during design, including CDD and DPW. Electrical and telecommunications undergrounding of infrastructure immediately adjacent to the Applicant's parcels will also be considered during the detailed phasing evaluation. Scope will be documented in either building, site, or offsite permit packages, as appropriate to provide the level of detail required for interdisciplinary coordination and approved by the City during the permitting process.

The initial approach and major steps of work to secure electric utility interconnections with the private utility provider are presented below (Eversource Project Overview, Preconstruction Coordination, Construction, and Inspections and Energization).

2.3.4.1 Eversource Project Overview

Early engagement with Eversource is recognized as a critical action to ensure Project success. As a first step, the Applicant established estimated connected electric loads for each of the planned buildings, based on their anticipated size and use. These estimates were previously shared with Eversource along with a conceptual site plan. Discussions commenced in 2025 to overview

the program, design assumptions, and process to evaluate Project feasibility and next steps.

After further studies and coordination with the City during preparation of the PUD Special Permit application, the Project scope has been further defined, and total connected load estimates have been updated. It is anticipated that by Summer 2026, these updated estimates will be presented to Eversource, accompanied by current plans and the anticipated construction schedule to assist Eversource with the necessary capacity planning to support the Project. The Applicant intends to work closely with representatives from Eversource responsible for the planning, design, modification, scheduling, and construction of the local electric grid to understand their recommended approach for implementation and provide support as needed.

2.3.4.2 Preconstruction Coordination

Prior to obtaining each building permit with the City, the Applicant will provide Eversource with a work order application for services. The packages will present the connected electric loads and specific electrical requirements of the building, including service voltage and amperage, site utility plans, electric one-line, electric riser diagram, metering plan, electric service infrastructure on private property, point of service entrance, and in-service date. Eversource will review the applications,

generate work orders, and diversify connected loads to determine the peak demand for the sizing of the service capacity before assigning Eversource Engineering for design of each service.

Eversource will complete a design unique to each building. With this design, the Applicant will be able to incorporate the Applicant's scope into their Issue for Permit drawings for the building and associated site. These drawings will be reviewed and discussed with the City during design and permitting stage of the Project and provide opportunity to overview extent of scope in public right of way. Additionally, the Applicant will be able to execute an easement to grant Eversource the right to install utility owned infrastructure on private property and within the premises. Eversource will coordinate payment for all identified work with the Applicant, promote the work order to the Construction Stage, and proceed in recording the easement at the Middlesex County Registry of Deeds.

2.3.4.3 Construction

The Applicant will install all of the necessary site infrastructure located on private property in compliance with the relevant Eversource Construction and Material Standards. Eversource performs inspections during the installation of the infrastructure. Simultaneously to the Applicant's site work, Eversource secures municipal approvals to

install utility distribution infrastructure in the public domain from Cambridge in the form of a Grant of Location ("GOL"). Once Eversource secures the GOL, an application for a Street Opening Permit ("SOP") follows. With the SOP issued, Eversource schedules and performs the required installation of electric distribution infrastructure in the public domain and makes the necessary interconnections to the private property facilities. Eversource installs all equipment specified by the work order design.

2.3.4.4 Inspections and Energization

The Applicant will remain in close communication with Eversource. Progress updates will be provided to establish a schedule and sequence of events for energization. The Applicant will secure approvals for the building electrical system from the City Inspector. Approvals are communicated to Eversource, indicating the completion of the final task by the Applicant to allow the scheduling of energization. Eversource proceeds with an internal process to establish a permit to remove the determined electric source infrastructure from service for the final tie-ins to the local electric grid. Energization of the new electric service occurs during the Eversource permit. In some cases, the full design of the electric service requires additional permits to be implemented.

2.3.4.5 Secondary Electric Services

Electric service will be required for facilities other than the buildings, within the limit of work but located outside of the Applicant's land holdings. These facilities include, but are not limited to, street lighting, electric vehicle charging, and bike-share stations, all located in the public domain. Street lighting, owned and maintained by the City of Cambridge, will have independent electric service provided. Street lighting control cabinets situated on the sidewalk will be fed underground from the Eversource secondary system within the public roadways. Cabinets will accommodate Eversource metering to record consumption for billing purposes on City accounts. Electric vehicle charging within parking facilities will be powered from the host building electrical system. Electric vehicle charging for private parking spaces along the roadways will be served directly from the Eversource secondary system via metered cabinets located on the sidewalk. Bike-share stations will be served by the Eversource secondary system by un-metered single phase services and charged a fixed monthly rate, detailed under the Eversource tariff.

2.3.4.6 District Energy

Per **Volume II, Section 1.12.3**: "[T]he Project has evaluated opportunities for geothermal and thermal energy networks to further improve energy efficiency and reduce emissions.

The Development Parcel is not near any existing district steam networks; however, on-site heating plants can be designed more efficiently than new district steam networks for the Project. During the planning process, the team investigated the feasibility of district connections for a thermal loop, sharing heat between commercial and residential buildings. With current land holdings, limitations in connection opportunities and viable open space for potential geothermal wells poses challenges for pursuit within the existing project (further detail on preliminary district energy studies, including subdistricts studied, can be found in the Applicant's certified Green Building Report (**Appendix B**)). Instead, the Project team continues to collaborate with the City on understanding the feasibility of connecting to an ambient loop or geothermal-based thermal energy network invested, constructed and operated by Eversource, with further engagement and exploration needed by Eversource. The Applicant is open to collaborating with the City and Eversource on potential district-scale or shared geothermal energy solutions and is supportive of zoning relief that would enable such shared systems and advance long-term emissions reductions. The Project team has prepared preliminary energy modeling outputs and architectural shapefiles to support further Eversource exploration of a wider application of district energy systems in this region of Cambridge."

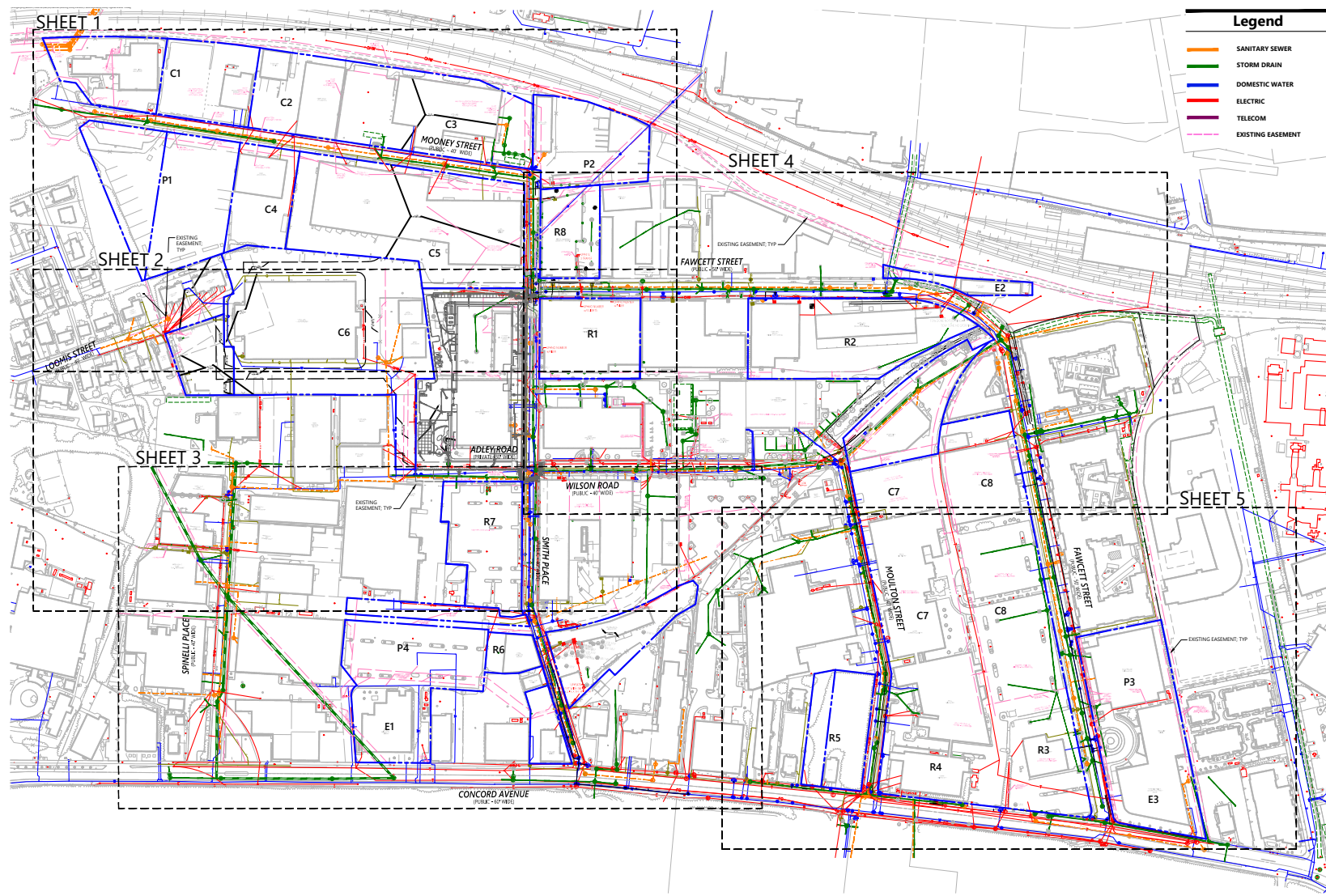


Figure 2C.1a: Overall Existing Utility Plan
Healthpeak PUD Master Plan | Cambridge, MA

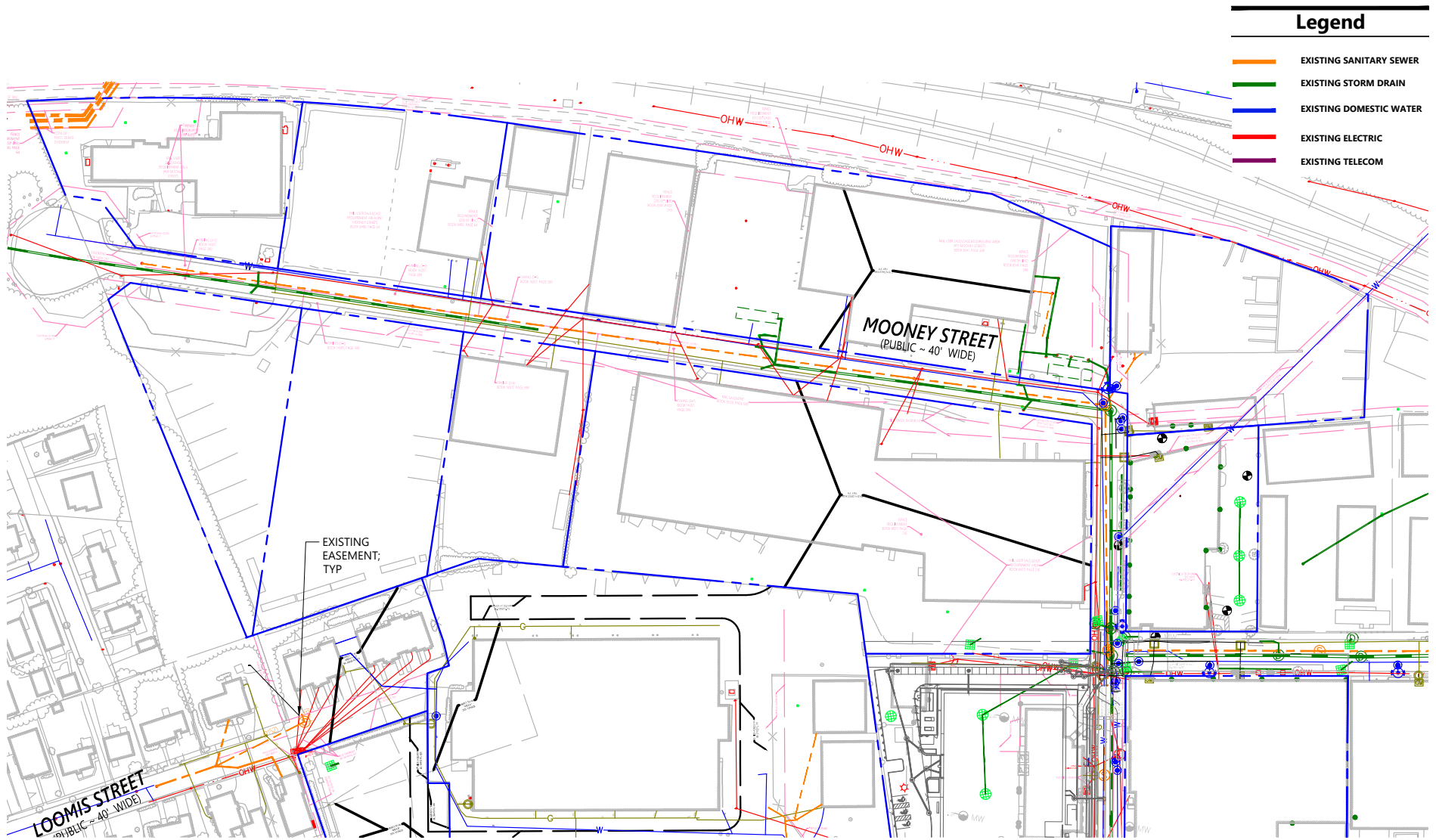


Figure 2C.1b: Existing Utility Figure - Sheet 1
Healthpeak PUD Master Plan | Cambridge, MA



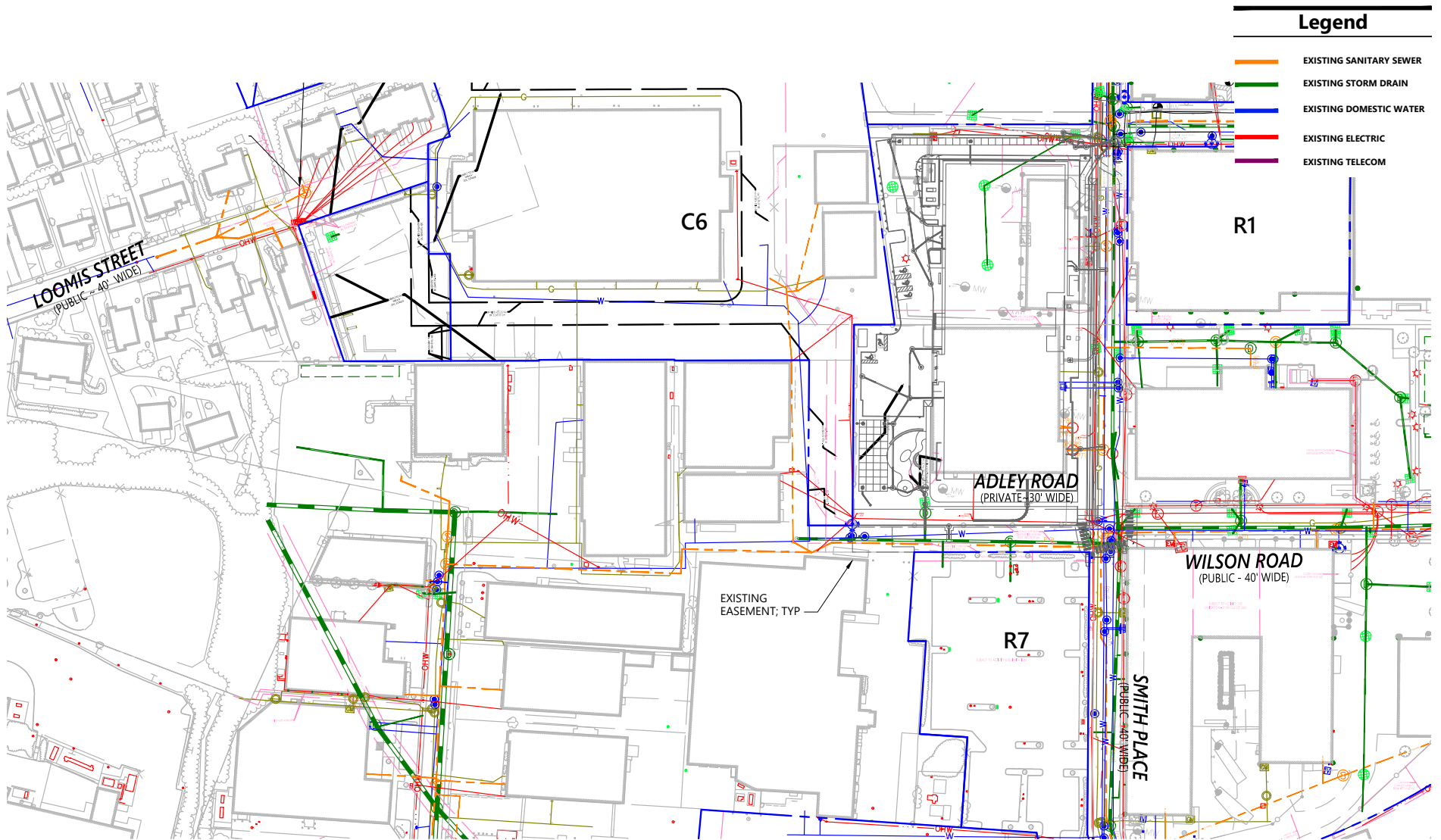


Figure 2C.1c: Existing Utility Figure - Sheet 2
Healthpeak PUD Master Plan | Cambridge, MA



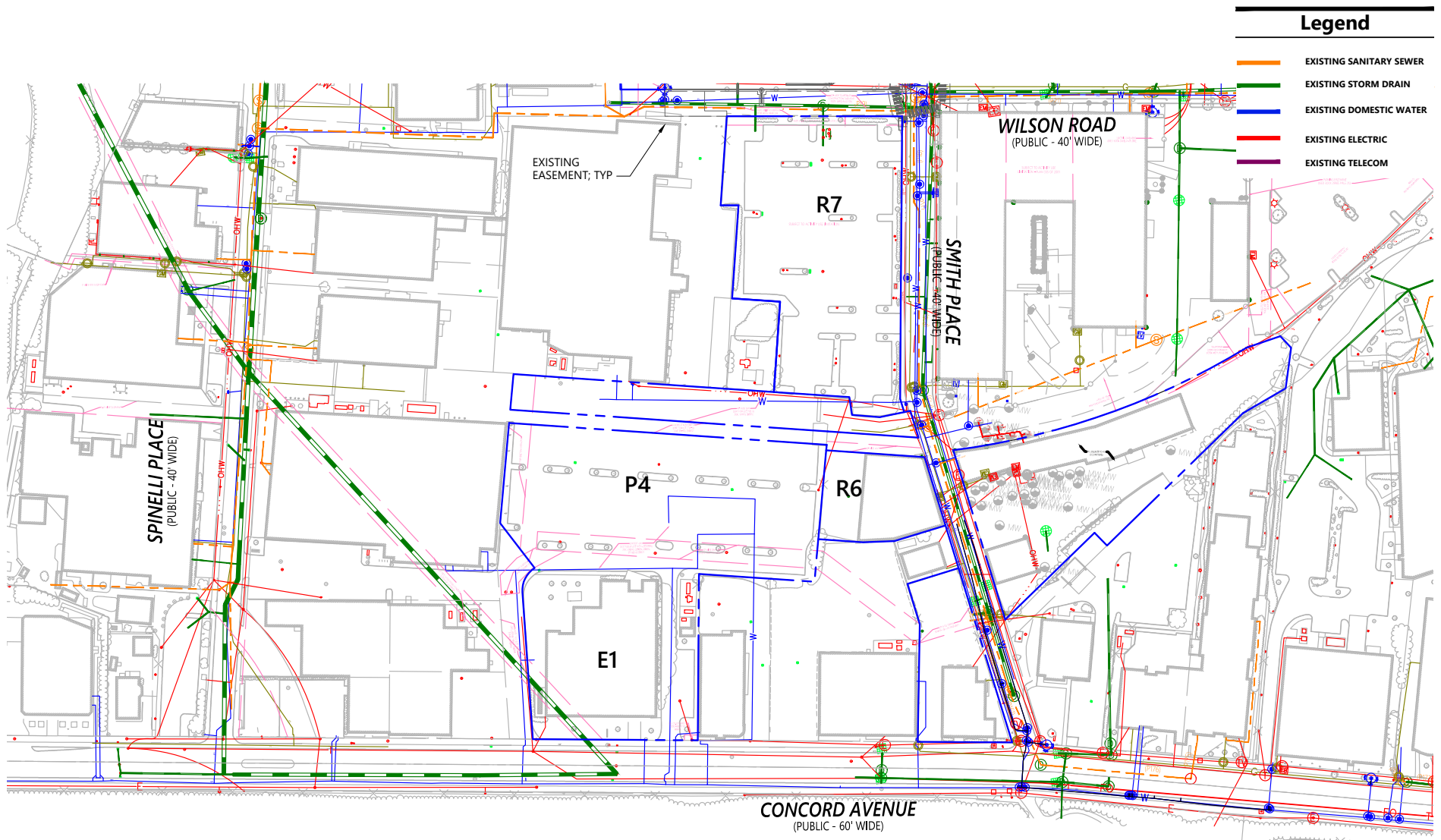


Figure 2C.1d: Existing Utility Figure - Sheet 3
Healthpeak PUD Master Plan | Cambridge, MA

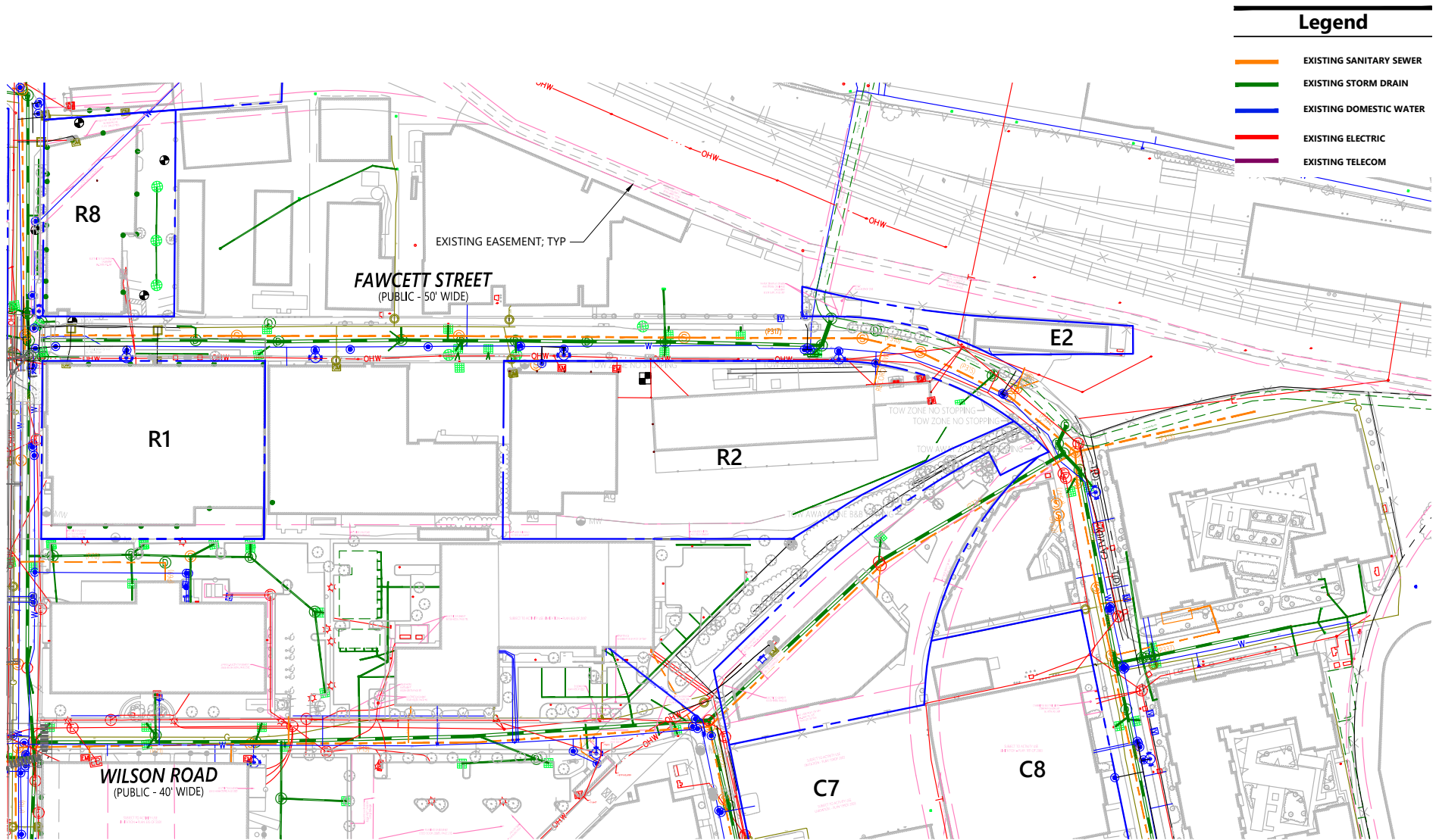


Figure 2C.1e: Existing Utility Figure - Sheet 4
Healthpeak PUD Master Plan | Cambridge, MA

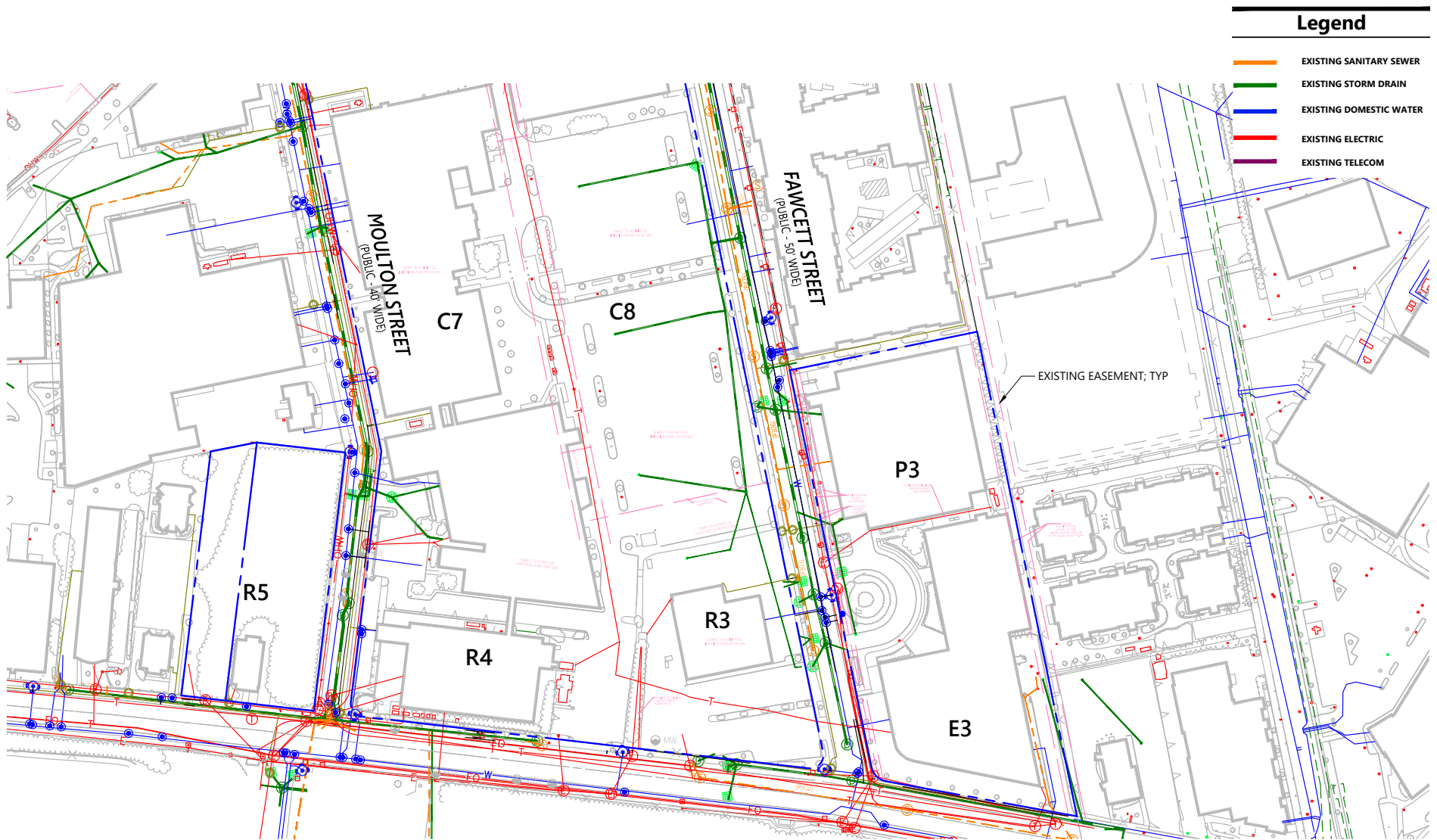


Figure 2C.1f: Existing Utility Figure - Sheet 5
Healthpeak PUD Master Plan | Cambridge, MA

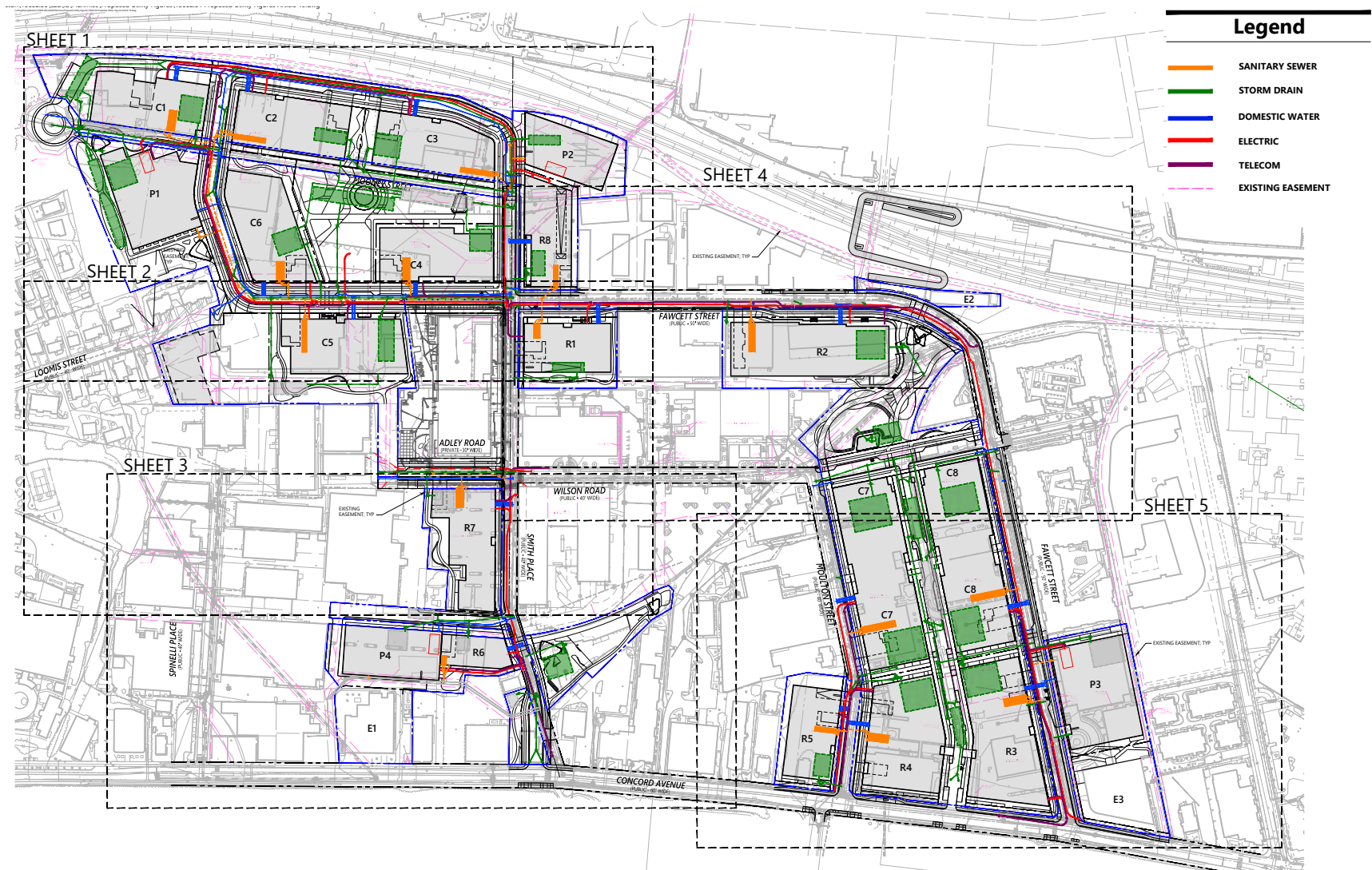
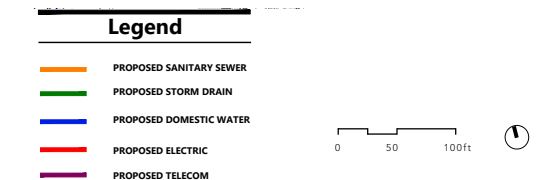


Figure 2C.2a: Overall Proposed Utility Plan
Healthpeak PUD Master Plan | Cambridge, MA





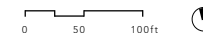
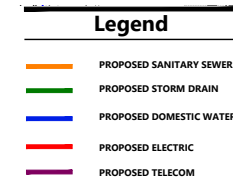
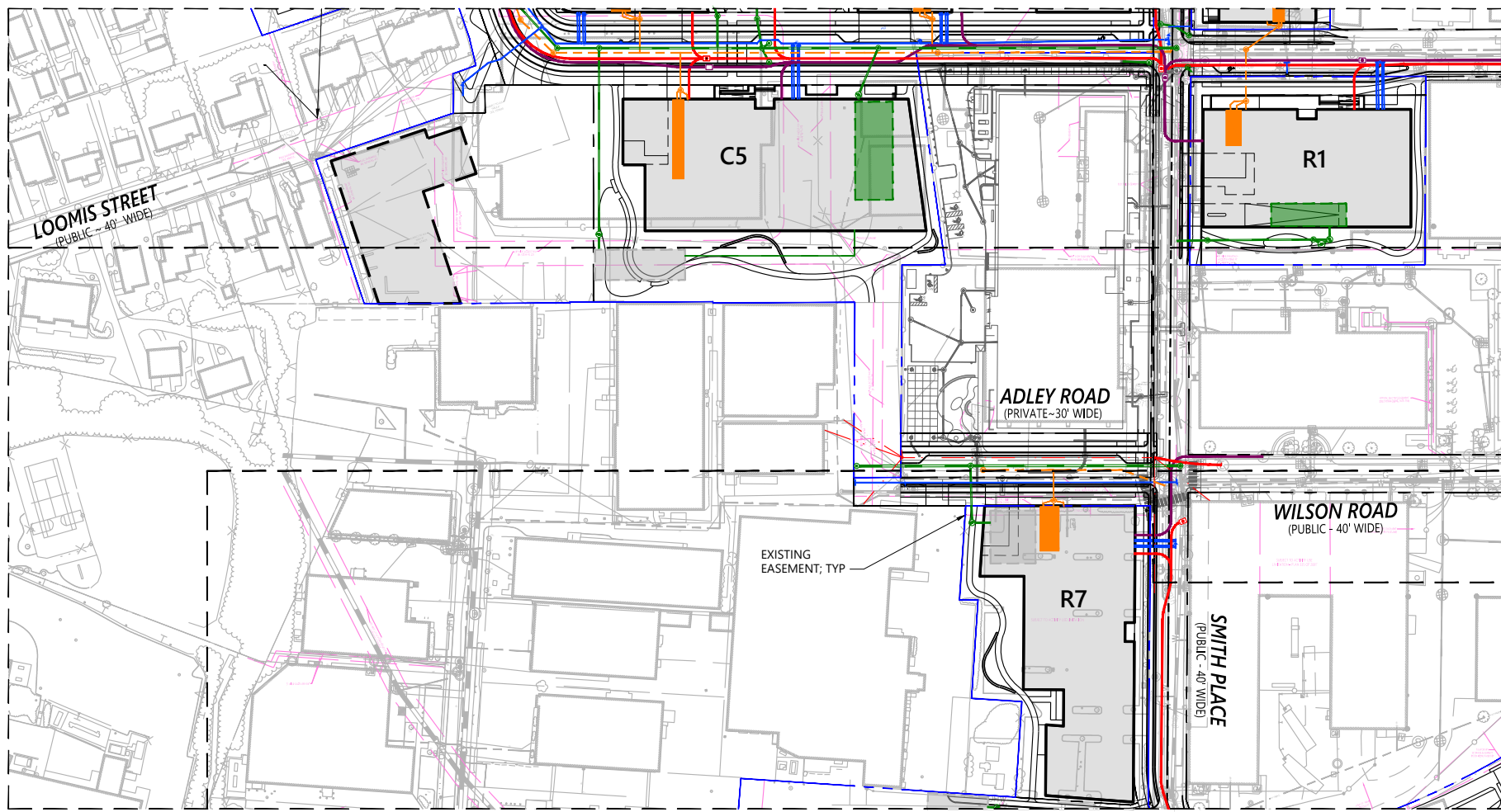


Figure 2C.2c: Proposed Utility Figure—Sheet 2
Healthpeak PUD Master Plan | Cambridge, MA

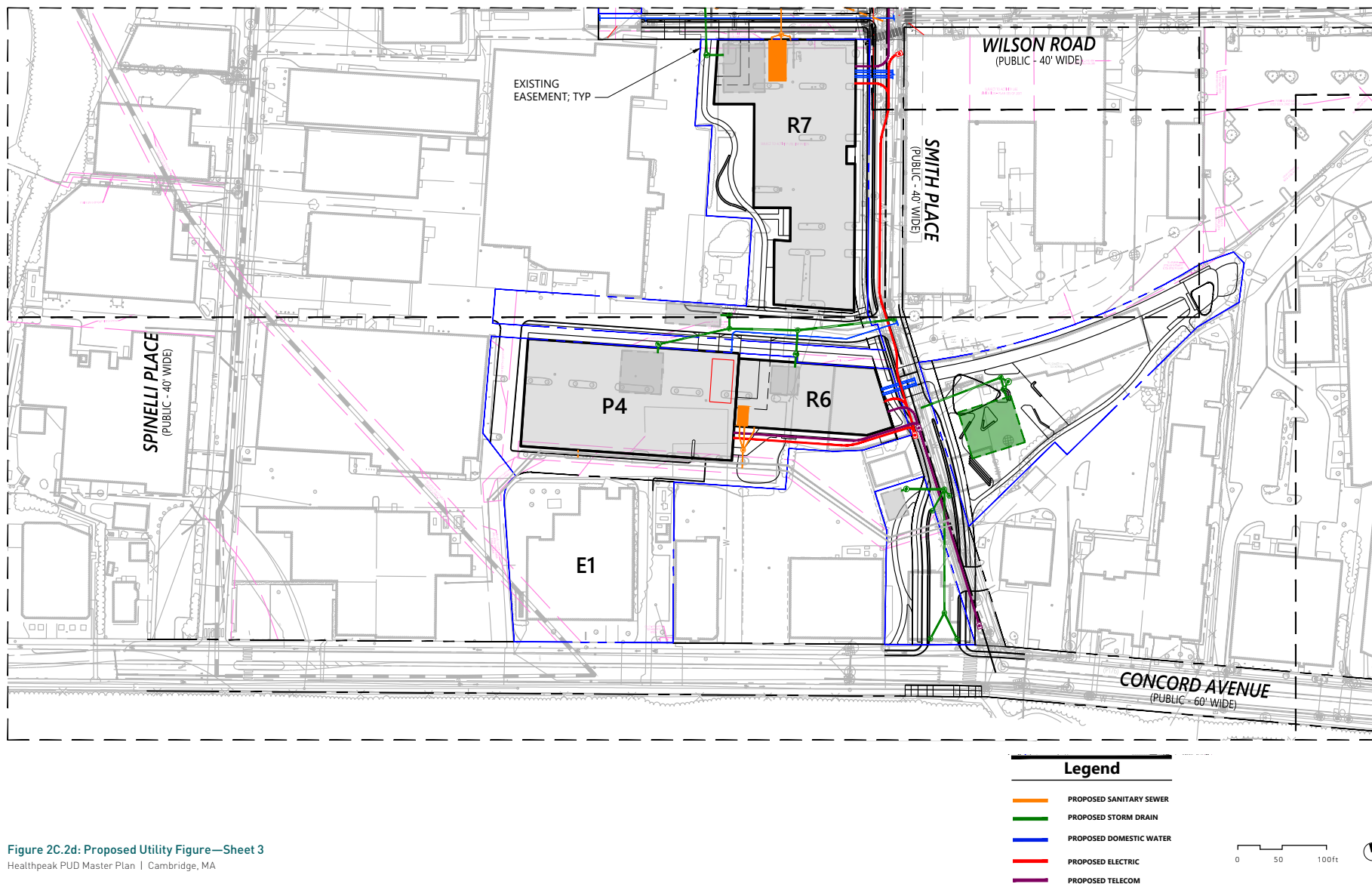


Figure 2C.2d: Proposed Utility Figure—Sheet 3
 Healthpeak PUD Master Plan | Cambridge, MA

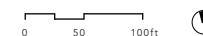
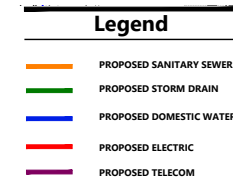
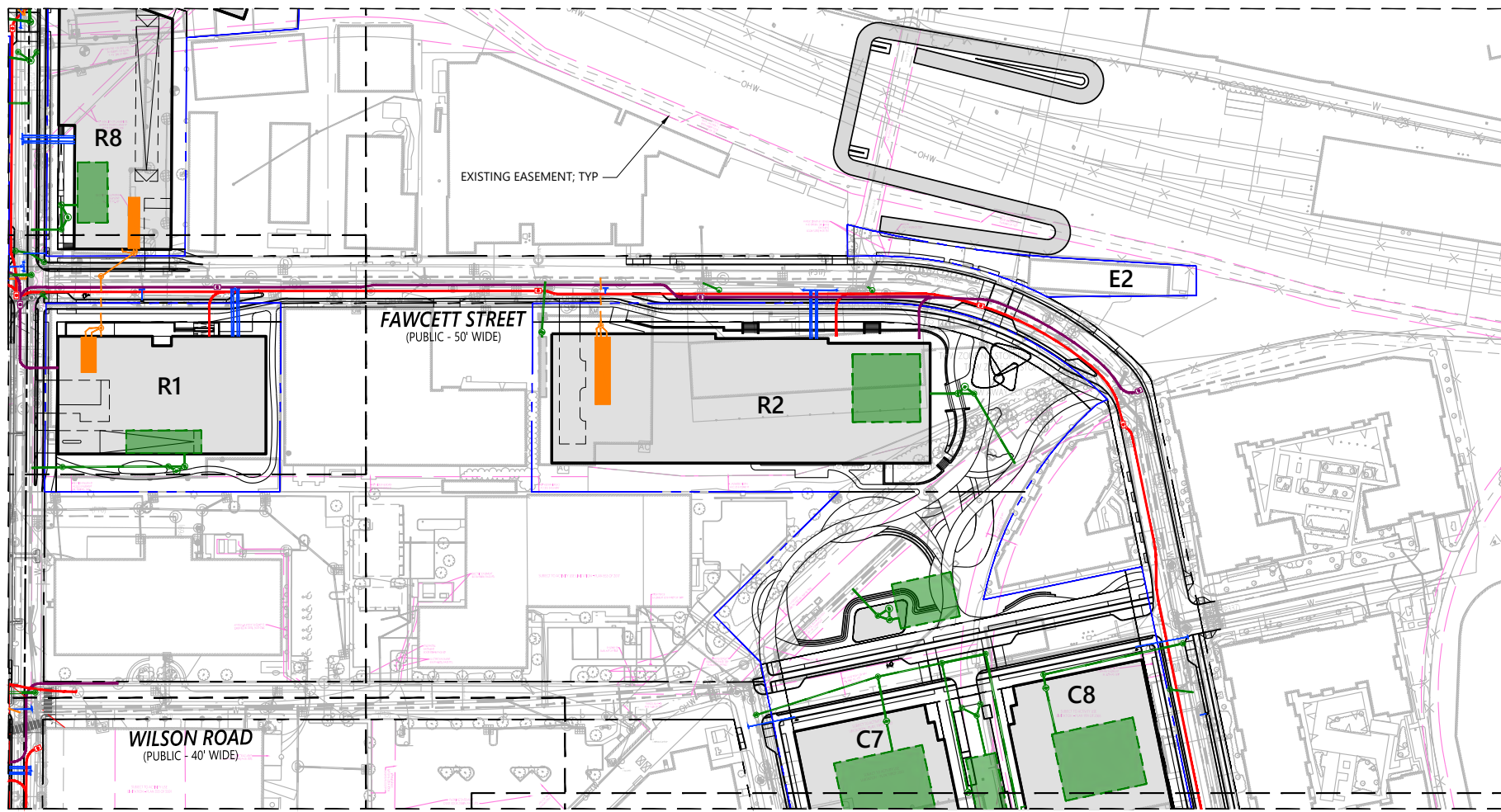


Figure 2C.2e: Proposed Utility Figure—Sheet 4
Healthpeak PUD Master Plan | Cambridge, MA



- Legend**
- PROPOSED SANITARY SEWER
 - PROPOSED STORM DRAIN
 - PROPOSED DOMESTIC WATER
 - PROPOSED ELECTRIC
 - PROPOSED TELECOM



Figure 2C.2f: Proposed Utility Figure—Sheet 5
Healthpeak PUD Master Plan | Cambridge, MA

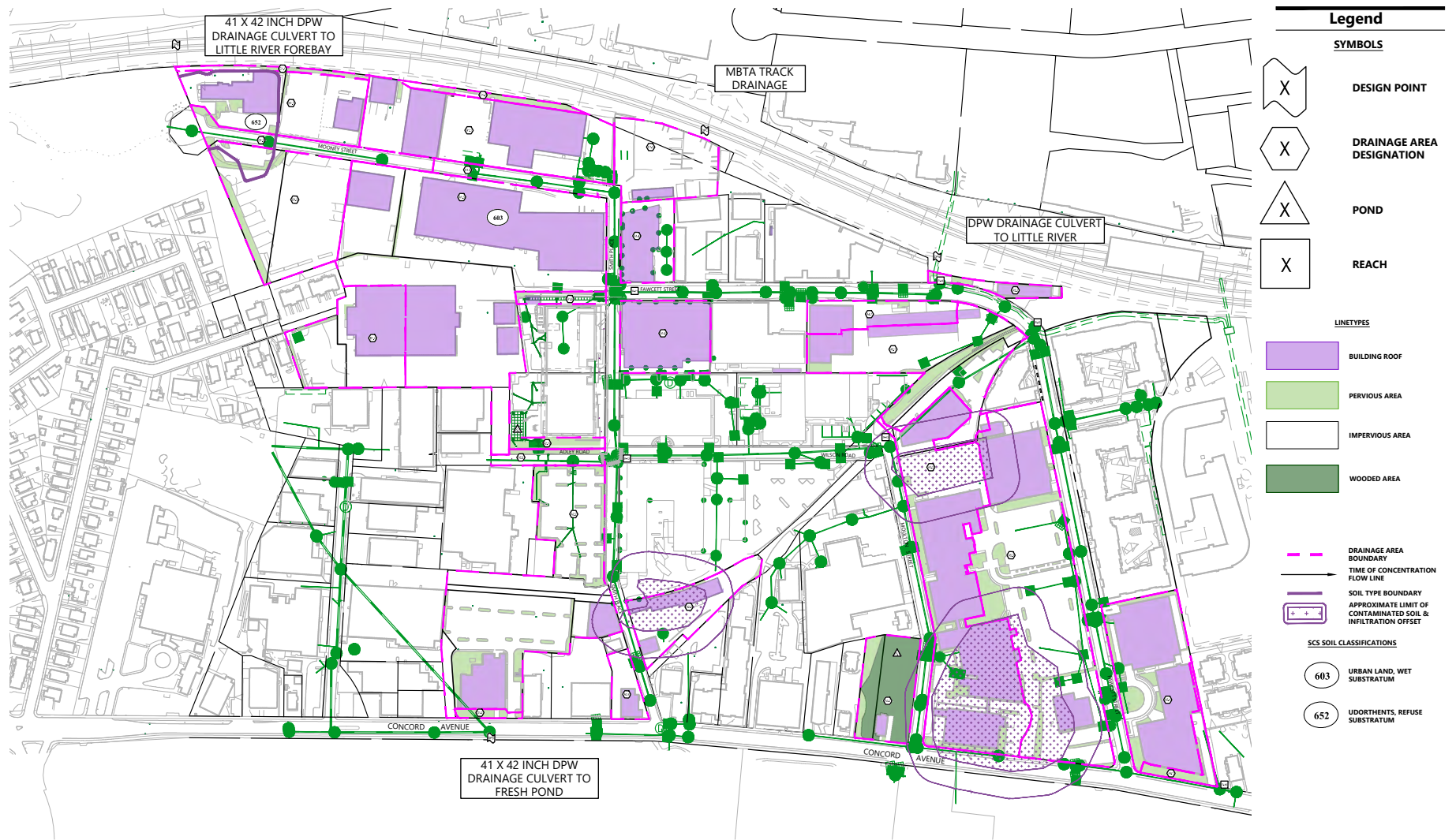


Figure 2C.3a: Existing Drainage Conditions
Healthpeak PUD Master Plan | Cambridge, MA

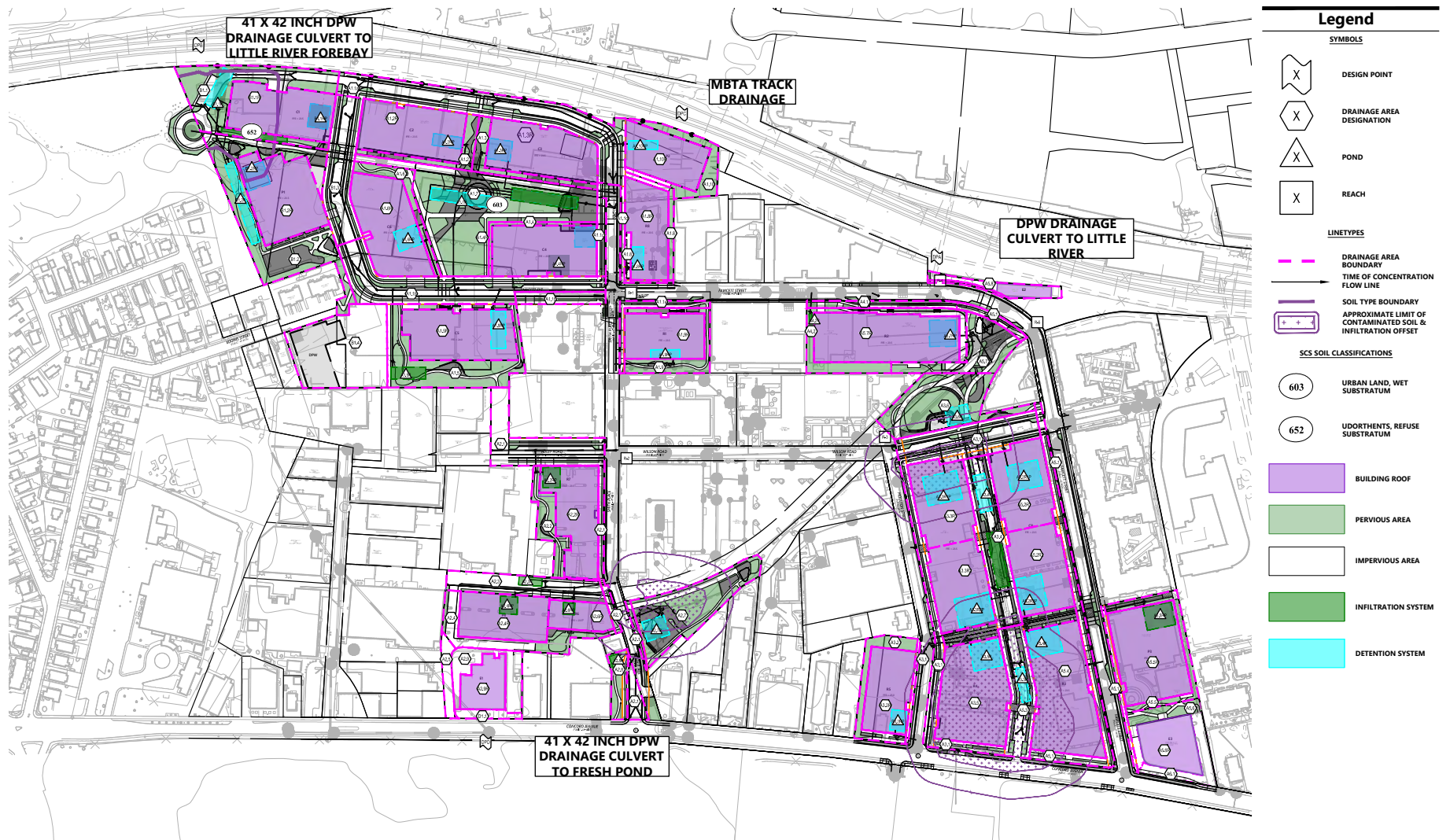
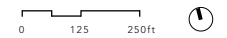


Figure 2C.3b: Proposed Drainage Conditions
Healthpeak PUD Master Plan | Cambridge, MA



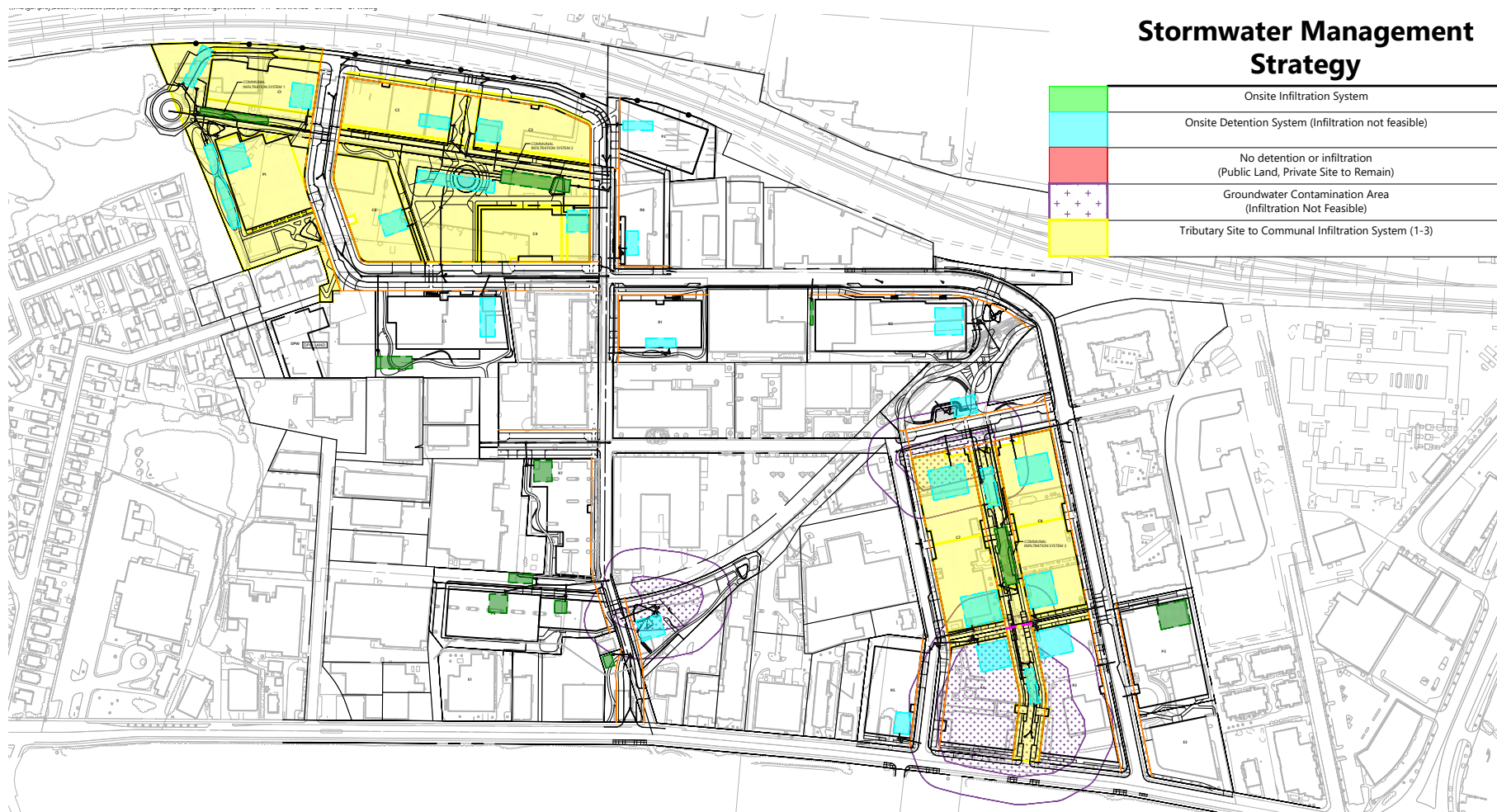


Figure 2C.3c: Stormwater Management Strategy—Infiltration vs. Detention
Healthpeak PUD Master Plan | Cambridge, MA



2.4 Noise Mitigation (19.24.7)

The Project will be designed to comply with the requirements of both DEP's noise policy (310 CMR 7.10) and the City's Noise Control Ordinance (Chapter 8.16 of the Cambridge, Massachusetts Municipal Code), as well as the provisions of Section 19.24.7 of the CZO, as applicable. To confirm compliance with DEP's noise policy, during the Design Review process, the Applicant will undertake a survey of existing ambient noise levels that establish prevailing background sound levels. Noise monitoring and receptor locations are shown on **Figure 2D.1**. This survey will thereby define site-specific limits that, together with the fixed limits in the City's Noise Control Ordinance, will apply to each building developed within the Development Parcel. During design of each building, the Applicant will engage qualified acoustics and noise control consultants to advise on the noise mitigation measures necessary to comply with DEP and local noise limits. These measures may include strategic equipment selection and location, equipment noise barriers or screens, sound attenuation devices, or other measures

necessary to confirm compliance. The primary elements that contribute to sound generation within an urban development project such as this are mechanical equipment noise and building service and loading activities. Construction activity temporarily generates noise during the construction of buildings and infrastructure. Construction activity noise is limited separately within the City's Noise Control Ordinance.

2.4.1 Building Mechanical Systems

The future design of individual buildings will include the selection and specification of major mechanical systems and equipment. These systems will be housed within enclosed rooftop mechanical penthouses or in dedicated service rooms located on the ground or second floor. To reduce potential noise impacts, appropriate sound attenuation measures will be integrated into the design. These enclosures and mitigation strategies are intended to effectively minimize the acoustic impact of mechanical equipment on the surrounding environment.

2.4.2 Service and Loading Activities

As shown in **Figure 1C.13**, the Project's loading and service needs will be accommodated within dedicated, internal loading docks for each building. Commercial buildings are designed to handle a 20-yard dumpster, with the option of a compactor as a supplement or replacement, while residential facilities are sized to accommodate up to an SU-40 vehicle. Service and delivery trucks will access the Development Parcel exclusively via designated truck routes identified by the City, using Route 2 and Alewife Brook Parkway at the regional level, and Fawcett Street, Moulton Street, and Smith Place locally while avoiding Blanchard Road due to restrictions. All loading and service areas will be located off-street, at ground level, and within the building footprint, with bays fully contained on-site to prevent encroachment into sidewalks or rights-of-way. These functions will be carefully managed to minimize impacts on local traffic circulation and reduce associated noise within the public realm.

2.4.3 Temporary Construction Activities

Construction activities associated with the individual buildings and site infrastructure (underground utilities, roadways, public realm landscapes, and hardscape features) will temporarily create an increase in noise levels emanating from the Development Parcel. Construction activities expected to generate the highest noise levels, such as demolition, excavation, and foundation work, will primarily occur during daytime hours to minimize disruption. The Applicant will develop a series of mitigation measures, for both building- and infrastructure-related projects, in collaboration with the City.

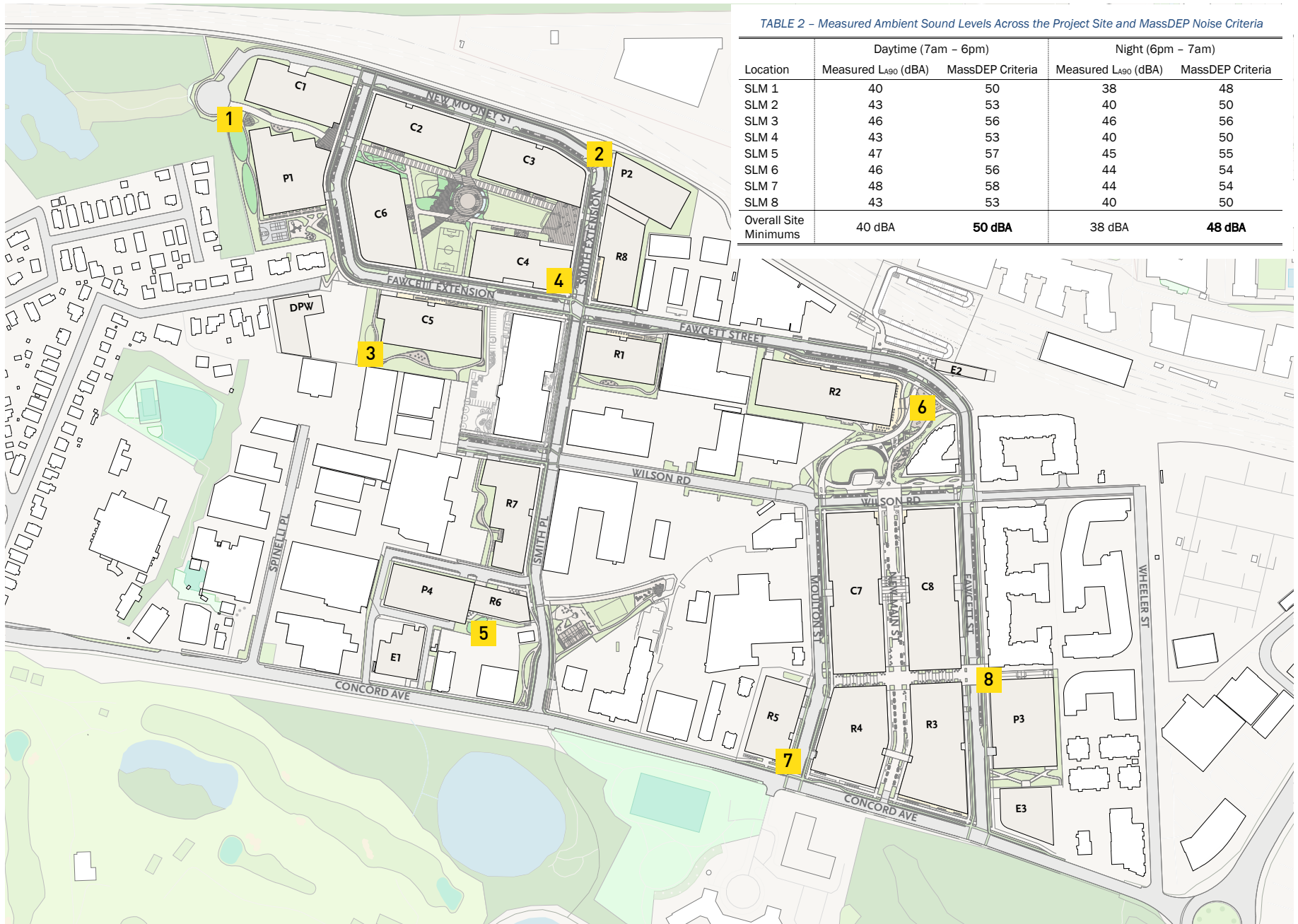


Figure 2D.1: Noise Monitoring and Receptor Locations

Healthpeak PUD Master Plan | Cambridge, MA



2.5 Resilience Narrative

2.5.1 Flood Resilience Standards

Section 22.80 of the CZO requires a description of specific design approaches used to respond to anticipated flood impacts, referencing plans, elevations, and other submitted drawings. Refer to **Volume II, Section 1.13**, for a description of the Project's compliance with the Flood Resilience Standards per Section 22.80.

2.5.2 Green Factor

Section 22.90 of the CZO requires a description of specific design approaches used to mitigate the anticipated impacts of heat on the Development Parcel and building operations. Refer to **Volume II, Section 1.13**, for a description of the Project's compliance with the Green Factor requirements per Section 22.90.