

Warrant Article 18: Amend Articles 2 and 6 of the Town’s Zoning By-Laws pertaining to Bicycle Parking and Design Regulations

Recommendation: Favorable Action, as amended, by a vote of 22-0 with no abstentions.

Executive Summary:	This article is brought by the Department of Planning and Community Development and if approved by Town Meeting, would amend Section 6.05 of the Zoning By-Law to create design standards for bicycle parking areas and require a certain number of bicycle parking spaces in certain housing types. At least 1.1 long-term bicycle parking spaces per dwelling unit would be required for multiple dwellings of 8 units and above, while 0.5 long-term bicycle parking spaces per dwelling unit would be required for multiple dwellings where 100% of the units are affordable units, and age-restricted dwellings. Article 18 also proposes a change to Section 2.07 “G” Definitions, (1) Gross Floor Area.
Voting Yes will...	Amend Section 6.05 of the Zoning By-Law to add design requirements for bicycle parking areas and require 0.5 or 1.1 long-term bicycle parking spaces per dwelling unit in certain multifamily residential dwellings.
Voting No will...	Leave Section 6.05 unchanged, with no design requirements for bicycle parking areas and 0.2 “spaces for off-street parking of bicycles” per dwelling unit required for “each multifamily residential building” excluding “that portion of a housing development designed exclusively for elderly persons” (existing Section 6.05).
Financial impact	The Building Commissioner does not believe there would be an increase in workload for the staff at the Building Department. although the Building Commissioner would (a) create and amend the Bicycle Parking Design Standards in conjunction with the Planning Director, and (b) enforce these standards.
Legal implications	Changes to the Zoning By-Law are subject to Attorney General review; the inclusion of Bicycle Parking Design Standards by reference in the Zoning By-Law is somewhat novel, although the Transportation Access Plan guidelines for Major Impact Projects are similar.

Introduction

The Department of Planning and Community Development (DPCD), in consultation with the Building Department, proposes making changes to Section 2.01 and Section 6.01 of the Zoning By-law and significantly amending the existing Section 6.05, “Bicycle Space and Design Regulations”. DPCD acknowledges Town Meeting Members Anthony Ishak and David Kroop for the initial suggestion that zoning address the lack of reliable bicycle facilities in multifamily housing.

This amendment would (a) increase the required minimum bicycle parking ratios and (b) specify enforceable design standards to ensure that bicycle parking areas are accessible and feasible facilities that provide protection from theft, vandalism, and inclement weather. DPCD staff suggests that the new requirements would implement several strategies in the Town's Climate Action Plan and would support the Town's affordable housing goals by increasing options for less expensive, multi-modal transportation.

A newly revised Section 6.05 in the Zoning By-Law — along with the companion Bicycle Parking Design Standards residing outside of the By-Law — would regulate bicycle parking areas and would be enforceable by the Building Commissioner, while Section 2.07 "G" of the Zoning By-Law, as amended, would exempt Bicycle Parking Space from the Gross Floor Area, in particular when calculating Floor Area Ratio (FAR).

Evaluation Methodology/Research

- The Planning Department worked together with Town Meeting Members Anthony Ishak and David Kroop, as representatives of Brookline's bicycling community, to draft this article.
- The specific bicycle design requirements are heavily based on the similar bicycle design requirements next door in Cambridge, MA.

Discussion

Several concerns were raised, as follows:

1. The basis for the 1.1 long-term bicycle parking space per dwelling unit minimum. This number was taken from the Cambridge Bicycle Parking Standards, on which this warrant article was based, although the citizen petitioners originally wanted a higher figure (1.5). DPCD reports that developers are voluntarily building spaces at a 1:1 ratio. A question was asked about the parking area cost to provide these spaces, and whether requiring bicycle parking would add exorbitant costs to the developer. In response, an example was given: given a multifamily dwelling that currently requires 22 parking spaces, the required additional bicycle parking space that would be required would be equivalent to an additional 3 parking spaces, including the drive aisle. Concern was expressed that 1.1 long-term bicycle parking spaces per dwelling unit may not be the "right" number.
2. Detailed bicycle parking space design requirements are not written into the proposed amendment, but instead would be part of a separate document maintained by the Building Commissioner in conjunction with the Planning Department. Legally this is similar to the way that Section 5.09 of the Zoning By-Law requires a Transportation Access Plan (TAP) for developments denoted as Major Impact Projects, but the TAP guidelines are maintained by the Planning Department and are not written into the By-law itself. Concern was expressed that Town Meeting Members would need to know the precise standards being set in order to cast a knowledgeable vote on this amendment; a copy of

the standards was distributed with the Warrant Article Explanations distributed to every Town Meeting Member, and was additionally included in the subcommittee report on this article.

DPCD staff explained that the Bicycle Design Standards provisions were written in this manner to allow the standards to evolve over time. The definitions which are stable were written into the By-Law, but DPCD expects that there may be, for example, additional technology improvements in bicycle racks which could be accommodated, or future improvements to the standards with respect to clearance requirements or slope of the access path.

3. The conditions under which existing properties must be brought into compliance. There are no specific provisions for “significant renovations” in the proposed By-Law amendment, so the new zoning requirements would take effect in the same way as most other changes to the By-Law: a “significant alteration” to the portion of the property affected by the amendment would need to be performed in order to require the property to be in compliant with the newly-amended By-Law.
4. Narrow scope for minimums. Concerns were expressed about the reduced requirement for 100% affordable buildings, and the lack of a requirement for commercial properties—expressing a hope that something for workplace bicycle parking could be brought to a future Town Meeting.

Some minor amendments were made to the motion in the article with the cooperation of the DPCD staff: two copyediting fixes and the deletion of the mention of “microunits” as unnecessary. These changes are shown in the Appendix.

Recommendation

The Advisory Committee, by a vote of 22-0 with no abstentions, recommends FAVORABLE ACTION WA18 as amended.

MOVED THAT the Town will amend **Article II-Definitions** and **Article VI-Vehicular Service Uses Requirements** of the Brookline Zoning By-Law as follows:

1 – By amending Section 2.07 “G” DEFINITIONS (strike-through indicates deletion and underline indicates new text):

1. GROSS FLOOR AREA — The sum of the areas of all floors of all principal and accessory buildings whether or not habitable except as excluded. Gross floor area shall include enclosed porches and the horizontal area at each floor level devoted to stairwells and elevator shafts. Gross floor area shall exclude (a) portions of cellars, basements, attics, penthouses and historically and architecturally significant accessory buildings that are not habitable, provided however that space that has been decommissioned shall not be excluded from gross floor area; (b) except as required in §5.06, paragraph 4, subparagraph

b (3) relating to the parking in Coolidge Corner and as required in §5.06, paragraph 4, subparagraph d (1) (c)(iv) relating to the parking in the GMR-2.0 District, any floor space in accessory buildings or in the main building intended and designed for parking of motor vehicles in order to meet the parking requirements of this By-law, provided, however, that for single and two-family dwellings the floor space thereby exempted from the calculation of gross floor area shall not exceed 360 square feet per required parking space; (c) elevator penthouses and mechanical equipment enclosures located above the roof, if not habitable; (d) necessary mechanical equipment space in the basement; ~~and~~ (e) up to 150 square feet of area in an accessory structure such as a garden or equipment shed; and (f) Bicycle Parking Spaces shall not count toward Gross Floor Area. Measurements shall be from the exterior faces of the walls or from the centerlines of the walls for adjoining buildings. For one-, two- and three-family buildings where the ceiling height measured from the finished floor to the ceiling exceeds 12 feet (including without limitation atriums, vaulted ceilings and cathedral ceilings), gross floor area shall be calculated by dividing by 12 the maximum ceiling height in such areas where the ceiling height exceeds 12 feet, and multiplying the result by the horizontal square footage in such areas where the ceiling height exceeds 12 feet. Space that has been decommissioned shall be included in the gross floor area of a building.

2 – By amending Article VI as follows (underline indicates new text):

ARTICLE VI - VEHICULAR AND BICYCLE SERVICE USES REQUIREMENTS

3 – By amending Section 6.01 as follows (strike-through indicates deletion)

2. Whenever there is an alteration of a structure or a change or extension of a use which increases the parking requirements by 15 percent or more according to the standards of §6.02 ~~and §6.05~~, the total additional parking requirements for the alteration, change, or extension shall be provided in accordance with the requirements of that section. The calculation of a 15 percent increased requirement shall be based on the aggregate of alterations, changes, or extensions undertaken since July 27, 1962, or since the effective date of any later change in the parking requirements applicable to the premises prior to any alteration, change or extension.

a. In SC, T, F, M, L, or G Districts, when a structure is converted for one or more additional dwelling units and the conversion results in an increased parking requirement, parking requirements for the entire structure shall be provided in accordance with the requirements of §6.02 ~~and §6.05~~. However, the Board of Appeals by special permit under Article IX may reduce or eliminate the number of parking spaces required under §6.02 ~~and §6.05~~.

4 - By amending Section 6.01 to add new Paragraph 6 after Paragraph 5:

6. Wherever else in this Zoning By-Law the term "parking" is used without specific reference to bicycle parking, such term shall refer only to parking for Motor Vehicles and not to bicycle parking.

5 – By amending Section 6.05 to delete Section 6.05 in its entirety and insert with new Section 6.05 (strike-through indicates deleted text).

§6.05 BICYCLE SPACE AND DESIGN REGULATIONS

~~1. Spaces for off-street parking of bicycles shall be provided for the residents of each multi-family residential building in the amount of one space per five housing units or fraction thereof, not counting units having a ground floor entrance, and wherever else the Board of Appeals requires bicycle spaces as part of design review under Section 5.09.4.d "Circulation" and/or as transportation mitigation measures, subject to the further provisions of this section, § 6.01, and adopted Planning Board Bicycle Guidelines.~~

~~The requirements of this section shall not apply to that portion of a housing development designed exclusively for elderly persons.~~

~~2. The design, location and maintenance of bicycle parking facilities shall be guided by the Bicycle Guidelines approved by the Planning Board pursuant to Section 5.09.4.n, Design Review Guidelines.~~

~~3. Changes in the requirements of this section, consistent with the intent of this Article, may be approved by the Board of Appeals for an individual building by special permit.~~

§6.05 OFF-STREET SPACE AND DESIGN REGULATIONS FOR BICYCLE PARKING

1. General

- a. Bicycle Parking Areas and Spaces shall be regulated by Sec. 6.05 of the Zoning By-Law and the BICYCLE PARKING DESIGN STANDARDS maintained by the Building Commissioner separate from the Zoning By-Law.
- b. Section 6.05 authorizes the Building Commissioner to:
 - (1) set forth BICYCLE PARKING DESIGN STANDARDS;
 - (2) enforce BICYCLE PARKING DESIGN STANDARDS, with all requirements of conformance to the BICYCLE PARKING DESIGN STANDARDS enforceable as though said STANDARDS were included in this Section; and
 - (3) in conjunction with the Planning Director amend BICYCLE PARKING DESIGN STANDARDS consistent with contemporary industry practices for bicycle parking.

2. Definitions

Terms not defined in this Section shall be as defined in Article II and in the BICYCLE PARKING DESIGN STANDARDS.

- a. **Bicycle Parking Space:** A physical space at least 2 feet by 6 feet that securely stores one bicycle, including Electric Bicycles, and which may also be referred to as a Standard Bicycle Parking Space.

A **Large Bicycle Parking Space** is a physical space at least 3 feet by 10 feet that securely stores a bicycle larger than what can fit in a Standard Bicycle Parking Space, including but not limited to recumbent bicycles, cargo bicycles, bicycles with a trailer, bicycles with a child seat or child trailer, and tandem bicycles--all of which may referred to as Large Bicycles.

Large Bicycle Parking Spaces shall be prioritized for, but not reserved exclusively for, bicycles that accommodate the mobility needs of different users and the functions of different bicycles that do not fit in a Standard Bicycle Parking Space.

A Bicycle Parking Space of any size and any type shall be served by a Bicycle Rack, unless the Bicycle Parking Space is in a Bicycle Locker.

No part of a bicycle parked in a Bicycle Parking Space of any size or type shall create an obstruction in pedestrian aisles and drive aisles.

Bicycle Parking Spaces shall not be installed in the public way or Street without the approval and specifications of the Public Works Department.

Bicycle Parking Spaces of any size may be Long-Term or Short-Term.

- b. **Bicycle Parking Space, Long-Term:** A Bicycle Parking Space that serves users staying more than two hours at a site.
- c. **Bicycle Parking Space, Short-Term:** A Bicycle Parking Space that serves users staying less than two hours at a site.
- d. **Bicycle Parking Area:** A physical space not in the public way reserved for Bicycle Parking Spaces. Bicycle Parking Areas may be Long-Term or Short-Term.
- e. **Bicycle Parking Area, Long-Term:** An area meeting the performance criteria in the BICYCLE PARKING DESIGN STANDARDS that is (1) made up to Long-Term Bicycle Parking Spaces and (2) located in an unoccupied area in a building or an enclosed area within a Parking Garage or (3) served by a Bicycle Locker or Bicycle Shed
- f. **Bicycle Parking Area, Short-Term:** An area that is (1) made up Short-Term Bicycle Parking Spaces and (2) located on a private parcel and easily identified and accessed by the public.
- g. **Bicycle Locker:** A fixed-in-place, lockable container closed on all sides that is fabricated to industry standards and that shall meet all of the following performance criteria: (1) can accommodate one Long-Term Bicycle Parking Space, (2) is made of durable material, (3) is designed to fully protect the bicycle against inclement weather, (4) provides secure protection against theft, (5) opens sufficiently to allow bicyclists easy access, (5) has a perforated area to allow air flow for security and safety, and (6) is of a character and color that adds aesthetically to the immediate environment. Bicycle Racks are not required in Bicycle Lockers.

Bicycle Lockers shall be:

- (1) Stored within unoccupied areas within a Building or outside of a Building;
 - (2) Used only for the storage of bicycles;
 - (3) Prohibited in Short-Term Bicycle Parking Spaces; and
 - (4) Bicycle Lockers stored outside of a Building shall be considered Accessory Structures.
- h. **Bicycle Shed:** A covered and lockable enclosure that is fabricated to industry standards and that shall meet all of the following performance criteria: (1) can contain multiple Long-Term Bicycle Spaces equipped with Bicycle Racks, (2) provides secure protection against theft, (3) provides at least overhead protection against inclement weather, (4) opens sufficiently to allow bicyclists easy access and (5) is of a character and color that adds aesthetically to the immediate environment.

Bicycle Sheds shall be:

- (1) Stored within unoccupied areas within a Building or outside of a Building;
 - (2) Used only for the storage of bicycles;
 - (3) Prohibited in Short-Term Bicycle Parking Spaces; and
 - (4) Bicycle Sheds stored outside of a Building shall be considered Accessory Structures.
- i. **Bicycle Rack also Rack**

One Bicycle Rack shall serve one or two Bicycle Parking Spaces of any type as long as the minimum distance between Racks complies with the manufacturer’s specifications or the BICYCLE PARKING DESIGN STANDARDS.

Racks are not required in Bicycle Lockers.

Acceptable Racks shall include Post-and-Ring and Inverted-U and equivalent versions of these aforementioned types and shall meet the performance criteria specified in the BICYCLE PARKING DESIGN STANDARDS.

- j. **Bicycle Rack, High-Density:** Racks installed that require bicycles to be hung on a wall (Vertical Bicycle Racks) or lifted off the floor (Two-Tier Bicycle Racks)
 - k. **Electric Bicycle:** Shall be as defined as under Massachusetts General Laws. In the absence of a definition in Massachusetts General Laws, Electric Bicycle shall be as defined under federal law.
 - l. The terms “**Motor Vehicle(s)**,” “**Motorized Bicycle(s)**,” “**Motorcycle(s)**,” “**Motorized Scooter(s)**,” and “**Moped**” shall be as defined under Massachusetts General Laws. Such categories of vehicles with the exception of Electric Bicycles shall be prohibited from parking in Bicycle Parking Spaces.
3. Bicycle Parking Spaces and Areas: Applicable Uses and Requirements
- a. Long-Term Bicycle Parking Spaces are required in Residential Uses with 8 units or more.
 - b. Any quantity of Bicycle Parking Spaces, Short-Term or Long-Term, that are provided though not required under **Table 6.05-1** shall comply with the requirements of Sec. 6.05 and the BICYCLE PARKING DESIGN STANDARDS, unless otherwise specified.
 - c. At least 75% of Long-Term Bicycle Parking Spaces shall be on the ground and secured with either an Inverted U Rack or Post-and-Ring Rack. One Inverted U Rack or Post-and-Ring Rack may serve one or two Bicycle Parking Spaces, as long as the required minimum distance between Racks complies with the BICYCLE PARKING DESIGN STANDARDS.
 - d. Required Minimum Quantity of Bicycle Parking Spaces

General Use Category	Building Use	Number of Long-Term Bicycle Parking Spaces	Number of Short-Term Bicycle Parking Spaces
Residential Uses	1 to 7 Dwelling Units, including Accessory Dwelling Units	No Minimum	No minimum
	Multiple Dwellings, 8 units and above	1.1 per Dwelling Unit	
	Multiple Dwellings in which at least 100% of total units are Affordable Units as defined in Sec. 4.08	0.5 per Dwelling Unit	

	Age Restricted Dwelling	0.5 per Dwelling Unit
	All Other Residential Uses	No Minimum
Non-Residential Uses	All	No Minimum

e. Large Bicycle Parking Spaces

- (1) Required Minimum Quantity: Where 16 or more Long-Term Bicycle Parking Spaces are required, the required minimum quantity of Large Bicycle Parking Spaces shall be 5% of the total number of Long-Term Bicycle Parking Spaces Required and no fewer than 2.
- (2) All Large Bicycle Parking Spaces shall be on the ground with the bicycle frame horizontal to the ground and shall be equipped with either an Inverted U Rack or Post-and-Ring Rack.
- (3) Large Bicycle Parking Spaces shall be prioritized for, but shall not be restricted to, parking Large Bicycles.
- (4) Large Bicycle Parking Spaces shall count toward the required minimum quantity of Long-Term Bicycle Parking Spaces specified in Table 6.05-1.

f. High-Density Bicycle Parking Spaces

- (1) No more than 25% of Long-Term Bicycle Parking Spaces shall be High-Density Racks.
- (2) Clearances above, below, and around Vertical Bicycle Racks or Two-Tier Bicycle Racks shall comply with the manufacturers' instructions.
- (3) High-Density Bicycle Racks shall be prohibited in Short-Term Bicycle Parking Spaces.

g. Any Short-Term Bicycle Parking Spaces that are provided voluntarily or are required shall not count toward the number of required Long-Term Bicycle Parking Spaces.

4. Required Materials for Plan Reviews, Site Plan and/or Design Review, and Special Permit and Building Applications

Plans for Bicycle Parking Areas, Long-Term and Short-Term, shall be stamped and signed by a registered architect, professional engineer, qualified transportation planner or transportation designer certifying that such plans meet the performance criteria and requirements of Sec. 6.05 the BICYCLE PARKING DESIGN STANDARDS. Such plans shall also show compliance with any and all applicable State Building and Fire Codes.

5. Layout Standards for All Bicycle Parking Areas, Bicycle Parking Spaces, Clearances, and Aisles

Plans for Bicycle Parking Areas shall be stamped by a registered architect, professional engineer, qualified transportation planner or transportation designer showing evidence of compliance with dimensions recommended by the Rack, Bike Locker, and/or Bicycle Shed manufacturer for layout of Racks; clearances above, below, around, and between Racks; slope of and widths of the aisle used by a pedestrian walking a bicycle. In lieu of a manufacturer's specifications for layout for Bicycle Parking Spaces and Racks, Bicycle Parking Areas shall comply with the minimum standards indicated in the BICYCLE PARKING DESIGN STANDARDS and shall not conflict with the latest edition of the Massachusetts State Building Codes.

6. Exemptions

Uses indicated in Table 6.05-1 are exempt from required minimum quantities only. Any Short-Term and Long-Term Bicycle Spaces provided shall comply with Sec. 6.05 and the BICYCLE PARKING DESIGN STANDARDS.

7. Exceptions and Waivers

a. The Board of Appeals may waive by Special Permit up to one-half the bicycle parking spaces required in the following cases as long as the change or conversion does not meet the definition of demolition as defined in Article 5.3 of the General By-Laws:

(1) conversion to residential use with eight units or more, or

(2) an existing residential use with at least seven units or more in which the number of dwelling units is increased by one or more

b. Use of High-Density Bicycle Racks, Bicycle Lockers, and Bicycle Sheds are permitted in compliance with Sec. 6.05 and the BICYCLE PARKING DESIGN STANDARDS.

8. Rounding

Fractional numbers one-half (0.5) and above shall be rounded up to the nearest whole number.

ARTICLE 18 ADVISORY COMMITTEE VOTES

Article Description	Bicycle parking space requirements, as amended
AC recommendation (Favorable Action unless indicated)	22-0-0
Scott Ananian	Y
Carla Benka	Y
Ben Birnbaum	Y
Harry Bohrs	Y
Cliff Brown	Y
John Doggett	
Katherine Florio	Y
Harry Friedman	Y
David-Marc Goldstein	Y
Neil Gordon	
Susan Granoff	Y
Kelly Hardebeck	Y
Anita Johnson	Y
Georgia Johnson	Y
Alisa Jonas	Y
Janice Kahn	Y
Carol Levin	Y
Pam Lodish	Y
Linda Olson Pehlke	Y
Donelle O'Neal, Sr.	Y
David Pollak	Y
Stephen Reeders	
Carlos Ridruejo	Y
Lee Selwyn	Y
Alok Somani	
Christine Westphal	Y
Dennis Doughty *	
* Chairperson does not vote except to break a tie	

APPENDIX

Advisory Committee modifications from the originally filed warrant article are in ~~italie strikethrough~~.

MOVED THAT the Town will amend **Article II-Definitions** and **Article VI-Vehicular Service Uses Requirements** of the Brookline Zoning By-Law as follows:

1 – By amending Section 2.07 “G” DEFINITIONS (strike-through indicates deletion and underline indicates new text):

1. GROSS FLOOR AREA — The sum of the areas of all floors of all principal and accessory buildings whether or not habitable except as excluded. Gross floor area shall include enclosed porches and the horizontal area at each floor level devoted to stairwells and elevator shafts. Gross floor area shall exclude (a) portions of cellars, basements, attics, penthouses and historically and architecturally significant accessory buildings that are not habitable, provided however that space that has been decommissioned shall not be excluded from gross floor area; (b) except as required in §5.06, paragraph 4, subparagraph b(3) relating to the parking in Coolidge Corner and as required in §5.06, paragraph 4, subparagraph d(1) (c)(iv) relating to the parking in the GMR-2.0 District, any floor space in accessory buildings or in the main building intended and designed for parking of motor vehicles in order to meet the parking requirements of this By-law, provided, however, that for single and two-family dwellings the floor space thereby exempted from the calculation of gross floor area shall not exceed 360 square feet per required parking space; (c) elevator penthouses and mechanical equipment enclosures located above the roof, if not habitable; (d) necessary mechanical equipment space in the basement; ~~and~~ (e) up to 150 square feet of area in an accessory structure such as a garden or equipment shed; and (f) Bicycle Parking Spaces shall not count toward Gross Floor Area. Measurements shall be from the exterior faces of the walls or from the centerlines of the walls for adjoining buildings. For one-, two- and three-family buildings where the ceiling height measured from the finished floor to the ceiling exceeds 12 feet (including without limitation atriums, vaulted ceilings and cathedral ceilings), gross floor area shall be calculated by dividing by 12 the maximum ceiling height in such areas where the ceiling height exceeds 12 feet, and multiplying the result by the horizontal square footage in such areas where the ceiling height exceeds 12 feet. Space that has been decommissioned shall be included in the gross floor area of a building.

2 – By amending Article VI as follows (underline indicates new text):

ARTICLE VI - VEHICULAR AND BICYCLE SERVICE USES REQUIREMENTS

3 – By amending Section 6.01 as follows (strike-through indicates deletion)

2. Whenever there is an alteration of a structure or a change or extension of a use which increases the parking requirements by 15 percent or more according to the standards of §6.02 ~~and §6.05~~, the total additional parking requirements for the alteration, change, or extension shall be provided in accordance with the requirements of that section. The calculation of a 15 percent increased requirement shall be based on the aggregate of alterations, changes, or extensions undertaken since July 27, 1962, or since the effective date of any later change in the parking requirements applicable to the premises prior to any alteration, change or extension.

a. In SC, T, F, M, L, or G Districts, when a structure is converted for one or more additional dwelling units and the conversion results in an increased parking requirement, parking requirements for the entire structure shall be provided in accordance with the requirements of §6.02 ~~and §6.05~~. However, the Board

of Appeals by special permit under Article IX may reduce or eliminate the number of parking spaces required under §6.02 and §6.05.

4 - By amending Section 6.01 to add new Paragraph 6 after Paragraph 5:

6. Wherever else in this Zoning By-Law the term "parking" is used without specific reference to bicycle parking, such term shall refer only to parking for Motor Vehicles and not to bicycle parking.

5 – By amending Section 6.05 to delete Section 6.05 in its entirety and insert with new Section 6.05 (strike-through indicates deleted text).

~~§6.05 BICYCLE SPACE AND DESIGN REGULATIONS~~

~~1. Spaces for off-street parking of bicycles shall be provided for the residents of each multi-family residential building in the amount of one space per five housing units or fraction thereof, not counting units having a ground floor entrance, and wherever else the Board of Appeals requires bicycle spaces as part of design review under Section 5.09.4.d "Circulation" and/or as transportation mitigation measures, subject to the further provisions of this section, § 6.01, and adopted Planning Board Bicycle Guidelines. The requirements of this section shall not apply to that portion of a housing development designed exclusively for elderly persons.~~

~~2. The design, location and maintenance of bicycle parking facilities shall be guided by the Bicycle Guidelines approved by the Planning Board pursuant to Section 5.09.4.n, Design Review Guidelines.~~

~~3. Changes in the requirements of this section, consistent with the intent of this Article, may be approved by the Board of Appeals for an individual building by special permit.~~

~~§6.05 OFF-STREET SPACE AND DESIGN REGULATIONS FOR BICYCLE PARKING~~

~~9. General~~

~~c. Bicycle Parking Areas and Spaces shall be regulated by Sec. 6.05 of the Zoning By-Law and the BICYCLE PARKING DESIGN STANDARDS maintained by the Building Commissioner separate from the Zoning By-Law.~~

~~d. Section 6.05 authorizes the Building Commissioner to:~~

~~(4) set forth BICYCLE PARKING DESIGN STANDARDS;~~

~~(5) enforce BICYCLE PARKING DESIGN STANDARDS, with all requirements of conformance to the BICYCLE PARKING DESIGN STANDARDS enforceable as though said STANDARDS were included in this Section; and~~

~~(6) in conjunction with the Planning Director amend BICYCLE PARKING DESIGN STANDARDS consistent with contemporary industry practices for bicycle parking.~~

~~10. Definitions~~

~~Terms not defined in this Section shall be as defined in Article II and in the BICYCLE PARKING DESIGN STANDARDS.~~

- m. **Bicycle Parking Space:** A physical space at least 2 feet by 6 feet that securely stores one bicycle, including Electric Bicycles, and which may also be referred to as a Standard Bicycle Parking Space.

A **Large Bicycle Parking Space** is a physical space at least 3 feet by 10 feet that securely stores a bicycle larger than what can fit in a Standard Bicycle Parking Space, including but not limited to recumbent bicycles, cargo bicycles, bicycles with a trailer, bicycles with a child seat or child trailer, and tandem bicycles--all of which may referred to as Large Bicycles.

Large Bicycle Parking Spaces shall be prioritized for, but not reserved exclusively for, bicycles that accommodate the mobility needs of different users and the functions of different bicycles that do not fit in a Standard Bicycle Parking Space.

A Bicycle Parking Space of any size and any type shall be served by a Bicycle Rack, unless the Bicycle Parking Space is in a Bicycle Locker.

No part of a bicycle parked in a Bicycle Parking Space of any size or type shall create an obstruction in pedestrian aisles and drive aisles.

Bicycle Parking Spaces shall not be installed in the public way or Street without the approval and specifications of the Public Works Department.

Bicycle Parking Spaces of any size may be Long-Term or Short-Term.

- n. **Bicycle Parking Space, Long-Term:** A Bicycle Parking Space that serves users staying more than two hours at a site.
- o. **Bicycle Parking Space, Short-Term:** A Bicycle Parking Space that serves users staying less than two hours at a site.
- p. **Bicycle Parking Area:** A physical space not in the public way reserved for Bicycle Parking Spaces. Bicycle Parking Areas may be Long-Term or Short-Term.
- q. **Bicycle Parking Area, Long-Term:** An area meeting the performance criteria in the BICYCLE PARKING DESIGN STANDARDS that is (1) made up to Long-Term Bicycle Parking Spaces and (2) located in an unoccupied area in a building or an enclosed area within a Parking Garage or (3) served by a Bicycle Locker or Bicycle Shed
- r. **Bicycle Parking Area, Short-Term:** An area that is (1) made up Short-Term Bicycle Parking Spaces and (2) located on a private parcel and easily identified and accessed by the public.
- s. **Bicycle Locker:** A fixed-in-place, lockable container closed on all sides that is fabricated to industry standards and that shall meet all of the following performance criteria: (1) can accommodate one Long-Term Bicycle Parking Space, (2) is made of durable material, (3) is designed to fully protect the bicycle against inclement weather, (4) provides secure protection against theft, (5) opens sufficiently to allow bicyclists easy access, (5) has a perforated area to allow air flow for security and safety, and (6) is of a character and color that adds aesthetically to the immediate environment. Bicycle Racks are not required in Bicycle Lockers.

Bicycle Lockers shall be:

- (5) Stored within unoccupied areas within a Building or outside of a Building;
- (6) Used only for the storage of bicycles;

- (7) Prohibited in Short-Term Bicycle Parking Spaces; and
- (8) Bicycle Lockers stored outside of a Building shall be considered Accessory Structures.

- t. **Bicycle Shed:** A covered and lockable enclosure that is fabricated to industry standards and that shall meet all of the following performance criteria: (1) can contain multiple Long-Term Bicycle Spaces equipped with Bicycle Racks, (2) provides secure protection against theft, (3) provides at least overhead protection against inclement weather, (4) opens sufficiently to allow bicyclists easy access and (5) is of a character and color that adds aesthetically to the immediate environment.

Bicycle Sheds shall be:

- (5) Stored within unoccupied areas within a Building or outside of a Building;
- (6) Used only for the storage of bicycles;
- (7) Prohibited in Short-Term Bicycle Parking Spaces; and
- (8) Bicycle Sheds stored outside of a Building shall be considered Accessory Structures.

- u. **Bicycle Rack also Rack**

One Bicycle Rack shall serve one or two Bicycle Parking Spaces of any type as long as the minimum distance between Racks complies with the manufacturer's specifications or the BICYCLE PARKING DESIGN STANDARDS.

Racks are not required in Bicycle Lockers.

Acceptable Racks shall include Post-and-Ring and Inverted-U and equivalent versions of these aforementioned types and shall meet the performance criteria specified in the BICYCLE PARKING DESIGN STANDARDS.

- v. **Bicycle Rack, High-Density:** Racks installed that require bicycles to be hung on a wall (Vertical Bicycle Racks) or lifted off the floor (Two-Tier Bicycle Racks)
- w. **Electric Bicycle:** Shall be as defined as under Massachusetts General Laws. In the absence of a definition in Massachusetts General Laws, Electric~~a~~ Bicycle shall be as defined under federal law.
- x. The terms "**Motor Vehicle(s)**," "**Motorized Bicycle(s)**," "**Motorcycle(s)**," "**Motorized Scooter(s)**," and "**Moped**" shall be as defined under Massachusetts General Laws. Such categories of vehicles with the exception of Electric Bicycles shall be prohibited from parking in Bicycle Parking Spaces.

11. Bicycle Parking Spaces and Areas: Applicable Uses and Requirements

- h. Long-Term Bicycle Parking Spaces are required in Residential Uses with 8 units or more.
- i. Any quantity of Bicycle Parking Spaces, Short-Term or Long-Term, that are provided though not required under **Table 6.05-1** shall comply with the requirements of Sec. 6.05 and the BICYCLE PARKING DESIGN STANDARDS, unless *other* otherwise specified.
- j. At least 75% of Long-Term Bicycle Parking Spaces shall be on the ground and secured with either an Inverted U Rack or Post-and-Ring Rack. One Inverted U Rack or Post-and-Ring Rack may serve one or two Bicycle Parking Spaces, as long as the required minimum distance between Racks complies with the BICYCLE PARKING DESIGN STANDARDS.

k. Required Minimum Quantity of Bicycle Parking Spaces

Table 6.05-1			
General Use Category	Building Use	Number of Long-Term Bicycle Parking Spaces	Number of Short-Term Bicycle Parking Spaces
Residential Uses	1 to 7 Dwelling Units, including Accessory Dwelling Units	No Minimum	No minimum
	Multiple Dwellings, <i>including Microunits</i> , 8 units and above	1.1 per Dwelling Unit	
	Multiple Dwellings in which at least 100% of total units are Affordable Units as defined in Sec. 4.08	0.5 per Dwelling Unit	
	Age Restricted Dwelling	0.5 per Dwelling Unit	
	All Other Residential Uses	No Minimum	
Non-Residential Uses	All	No Minimum	

l. Large Bicycle Parking Spaces

- (5) Required Minimum Quantity: Where 16 or more Long-Term Bicycle Parking Spaces are required, the required minimum quantity of Large Bicycle Parking Spaces shall be 5% of the total number of Long-Term Bicycle Parking Spaces Required and no fewer than 2.
- (6) All Large Bicycle Parking Spaces shall be on the ground with the bicycle frame horizontal to the ground and shall be equipped with either an Inverted U Rack or Post-and-Ring Rack.
- (7) Large Bicycle Parking Spaces shall be prioritized for, but shall not be restricted to, parking Large Bicycles.
- (8) Large Bicycle Parking Spaces shall count toward the required minimum quantity of Long-Term Bicycle Parking Spaces specified in Table 6.05-1.

m. High-Density Bicycle Parking Spaces

- (4) No more than 25% of Long-Term Bicycle Parking Spaces shall be High-Density Racks.
- (5) Clearances above, below, and around Vertical Bicycle Racks or Two-Tier Bicycle Racks shall comply with the manufacturers' instructions.
- (6) High-Density Bicycle Racks shall be prohibited in Short-Term Bicycle Parking Spaces.

- n. Any Short-Term Bicycle Parking Spaces that are provided voluntarily or are required shall not count toward the number of required Long-Term Bicycle Parking Spaces.

12. Required Materials for Plan Reviews, Site Plan and/or Design Review, and Special Permit and Building Applications

Plans for Bicycle Parking Areas, Long-Term and Short-Term, shall be stamped and signed by a registered architect, professional engineer, qualified transportation planner or transportation designer certifying that such plans meet the performance criteria and requirements of Sec. 6.05 the BICYCLE PARKING DESIGN STANDARDS. Such plans shall also show compliance with any and all applicable State Building and Fire Codes.

13. Layout Standards for All Bicycle Parking Areas, Bicycle Parking Spaces, Clearances, and Aisles

Plans for Bicycle Parking Areas shall be stamped by a registered architect, professional engineer, qualified transportation planner or transportation designer showing evidence of compliance with dimensions recommended by the Rack, Bike Locker, and/or Bicycle Shed manufacturer for layout of Racks; clearances above, below, around, and between Racks; slope of and widths of the aisle used by a pedestrian walking a bicycle. In lieu of a manufacturer's specifications for layout for Bicycle Parking Spaces and Racks, Bicycle Parking Areas shall comply with the minimum standards indicated in the BICYCLE PARKING DESIGN STANDARDS and shall not conflict with the latest edition of the Massachusetts State Building Codes.

14. Exemptions

Uses indicated in Table 6.05-1 are exempt from required minimum quantities only. Any Short-Term and Long-Term Bicycle Spaces provided shall comply with Sec. 6.05 and the BICYCLE PARKING DESIGN STANDARDS.

15. Exceptions and Waivers

- a. The Board of Appeals may waive by Special Permit up to one-half the bicycle parking spaces required in the following cases as long as the change or conversion does not meet the definition of demolition as defined in Article 5.3 of the General By-Laws:
 - (3) conversion to residential use with eight units or more, or
 - (4) an existing residential use with at least seven units or more in which the number of dwelling units is increased by one or more
- c. Use of High-Density Bicycle Racks, Bicycle Lockers, and Bicycle Sheds are permitted in compliance with Sec. 6.05 and the BICYCLE PARKING DESIGN STANDARDS.

16. Rounding

Fractional numbers one-half (0.5) and above shall be rounded up to the nearest whole number.