



**3427 22nd Ave W**

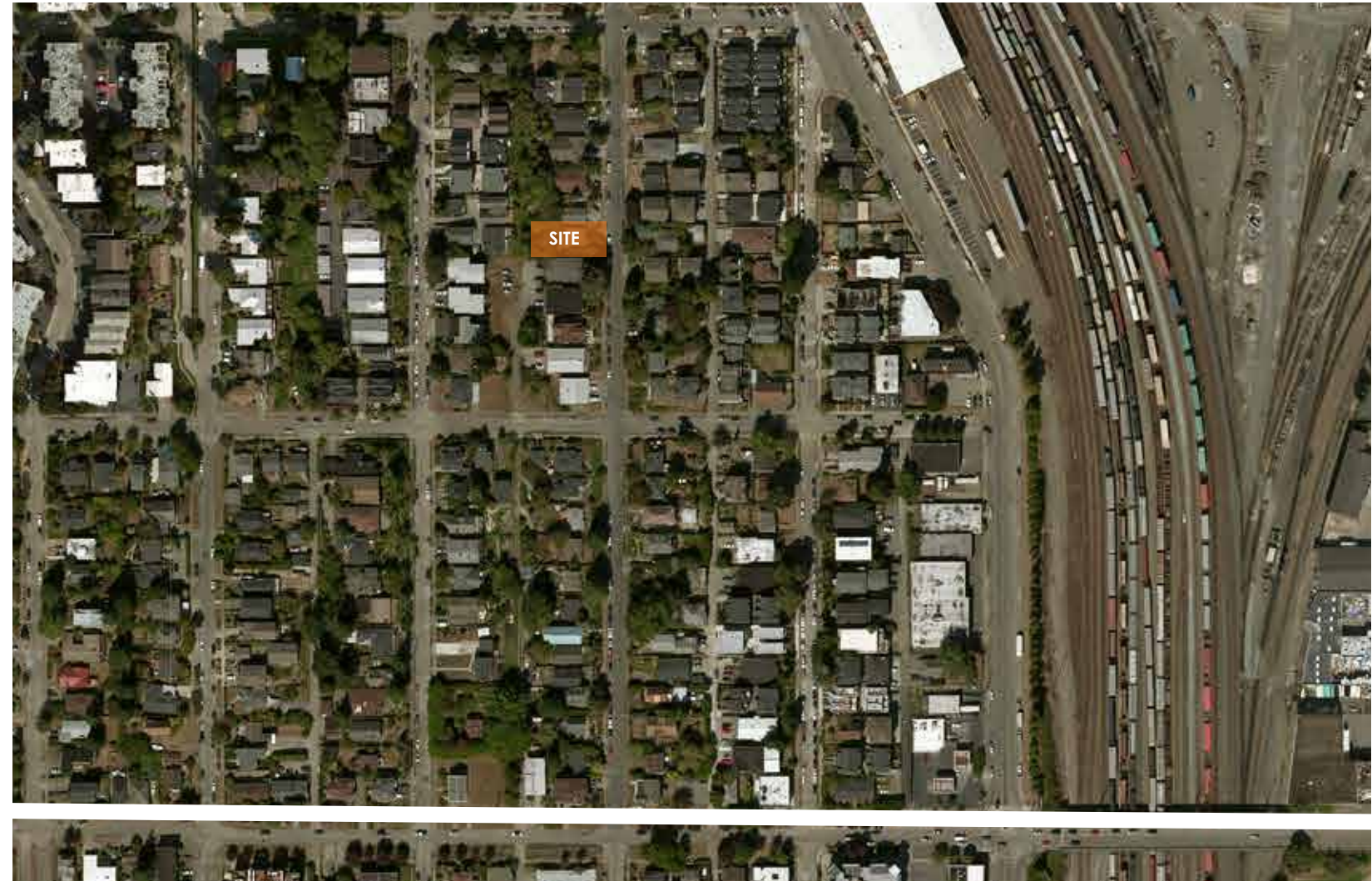
Address:  
3427 22nd Ave W

**b9** architects



# TABLE of CONTENTS

<b>1</b>	<b>OBJECTIVES</b> SDR Guidance Application	4-5
<b>2</b>	<b>CONTEXT ANALYSIS</b> Site Opportunities and Constraints Current Use Map Context Analysis	6 6 7
<b>3</b>	<b>SITE CONDITIONS</b> Neighborhood Analysis Site Analysis	8 9
<b>4</b>	<b>SITE PLAN</b> Survey Section	10 11
<b>5</b>	<b>DESIGN GUIDELINES</b> Context and Site Public Life Design Concept Context and Site	12 12 13
<b>6</b>	<b>ADJUSTMENT SUMMARY</b>	14-17
<b>7</b>	<b>ARCHITECTURAL CONCEPT</b> Renderings Privacy Elevations Floor Plans Rendered Elevations	18-23 24-25 26-29 30-33
<b>8</b>	<b>COMPLETED WORK</b> Previous Work Examples	34-35



25th Ave W

24th Ave W

23rd Ave W

22nd Ave W

21st Ave W

## Context Map

Arterial

Ruffner St

Bertona St

W Dravus St





## OBJECTIVES

Design and construct a townhouses arranged along a pedestrian walkway. Access to parking will be provided from the street as there is no access from the alley.

Number of Residential Units (Approx.)	4
Structure Height	30'
Number of Parking Stalls (Approx.)	4

### Sustainability

Achieve a 4-Star Built Green certification.  
Utilize reclaimed materials.

### Community

The proposal will be designed around a walkway that connects the site from east to west.

## TEAM

ARCHITECT	b9 architects
DEVELOPMENT	gProjects
STRUCTURAL	MaslamTsang Structural Engineering
GEOTECHNICAL	GeoGroup NW

# CITY of SEATTLE

## Application for Streamlined Design Guidance

### PART I: CONTACT INFORMATION

1. Property Address	3427 22nd Ave W
2. Project number	3017712
3. Additional related project number(s):	None
4. Owner/Lessee Name	Graham Black
5. Contact Person Name	Bradley Khouri
Firm	b9 architects
Mailing Address	210 S Jackson St
City State Zip	Seattle, WA 98104
Phone	206.297.1284
Email address	bgk@b9architects.com
6. Applicant's Name	Bradley Khouri
Relationship to Project	Architect
7. Design Professionals Name	Manuel Castaneda
Address	210 S Jackson St
Phone	206.297.1284
Email address	Manuel@b9architects.com



Project Site, existing single family structure to be deconstructed.

# SITE OPPORTUNITIES & CONSTRAINTS



Address  
3427 22nd Ave W Seattle WA

Lot Size : 6000 square feet.

Zoning : LR1

- C2-40
- SM/D 45-80
- LR1
- LR3
- LR3 -RC
- SF 5000
- NC2-40
- IG1 U/45
- IB U/45

**Zoning**

The site is located in an area zoned Lowrise 1 two blocks west of Gilman Avenue W. Surrounding zoning, primarily residential, includes Lowrise 2, Lowrise 3 and Single Family 5000. The intersection of W Dravus Street and W Gilman street is an area of NC2-40 and C2-40, abutting the Ballard Interbay Northend Manufacturing Industrial.



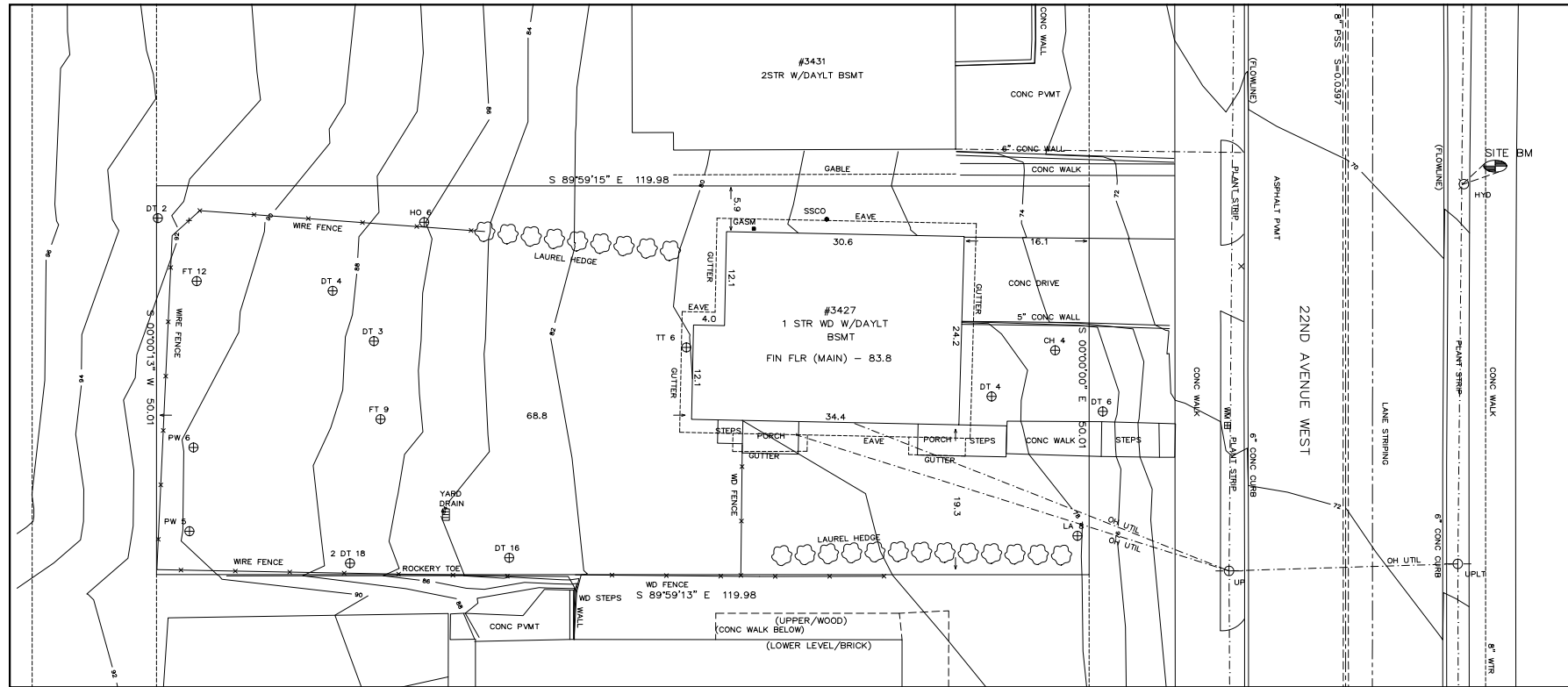


## CONTEXT ANALYSIS

- The site topography slopes significantly down to the east to 22nd Avenue W.
- 22nd Avenue W slopes gradually down to the south from Ruffner St toward Bertona St.
- Magnolia Manor Park and Lawton Park are located four blocks to the west from the site.
- There is significant new development in the immediate surrounding.
- An existing duplex is located to the south of the project. The design approach responds to the scale of residential fabric, ranging from single family homes to townhouses.
- Townhouses are currently being permitted on the two parcels immediately north of the development site.
- The project site abuts an unopened alley which cannot provide access to the site due to topographic conditions.
- The site offers potential for territorial views to the west side of Queen Anne Hill.



22nd Ave. N



## NEIGHBORHOOD ANALYSIS

The neighborhood is predominantly residential, with a mix of multifamily and single-family. Commercial zoning is focused around the intersection of W Dravus Street and Gilman Avenue W. The topography continues uphill to the west to 28th Avenue E and downhill to the east to Gilman Avenue W / 20th Avenue W abutting the railroad tracks and Interbay. 22nd Avenue W slopes gently uphill to the north and down to the south. The neighborhood abuts the Ballard-Interbay Northend Manufacturing Industrial Area to the east. Discovery Park and the Ballard Locks are located 1.4 miles northwest, a five minute drive, 10 minute bike ride or 25 minute walk. The site has direct access to the Interbay bike trail with connections to Myrtle Edwards Park and downtown Seattle.

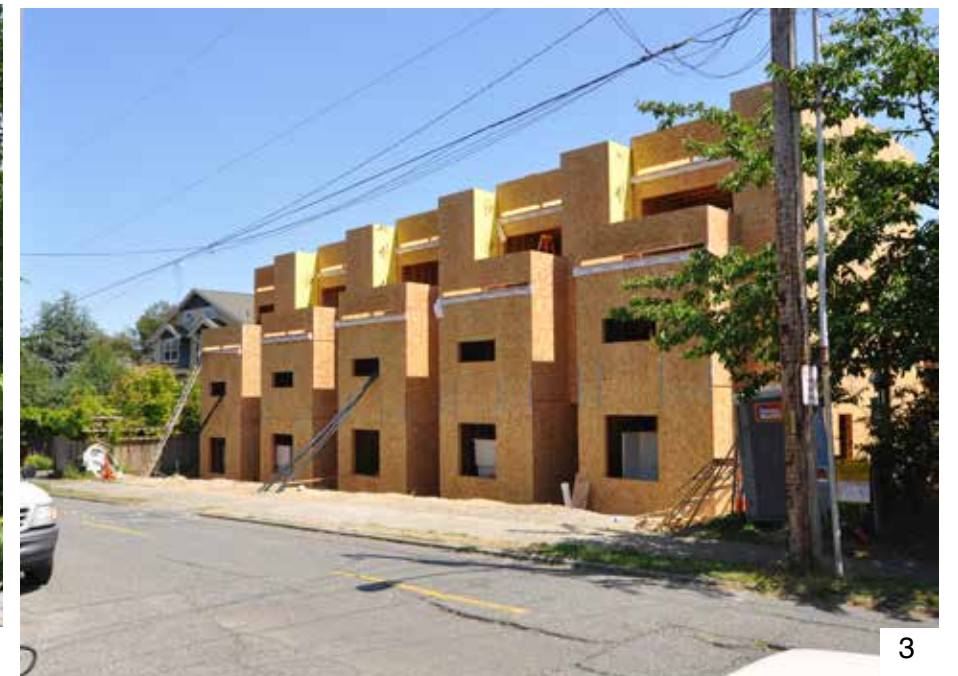
The neighborhood is seeing significant residential development currently, with several townhouse projects under construction and in permitting in the immediate block of the site.



1



2



3



23rd  
Ave W

22nd  
Ave W



## SITE ANALYSIS

The site's dimensions are 50 feet north-south and 120 feet east-west. It fronts 22nd Avenue W with no alley access. The lot contains an existing single family house. The uses immediately surrounding the site are predominantly multifamily structures including recent and new townhouse developments and established duplexes and triplexes. Immediately south of the parcel is an existing triplex constructed in 1969. To the north of the parcel is a townhouse project currently in permitting.

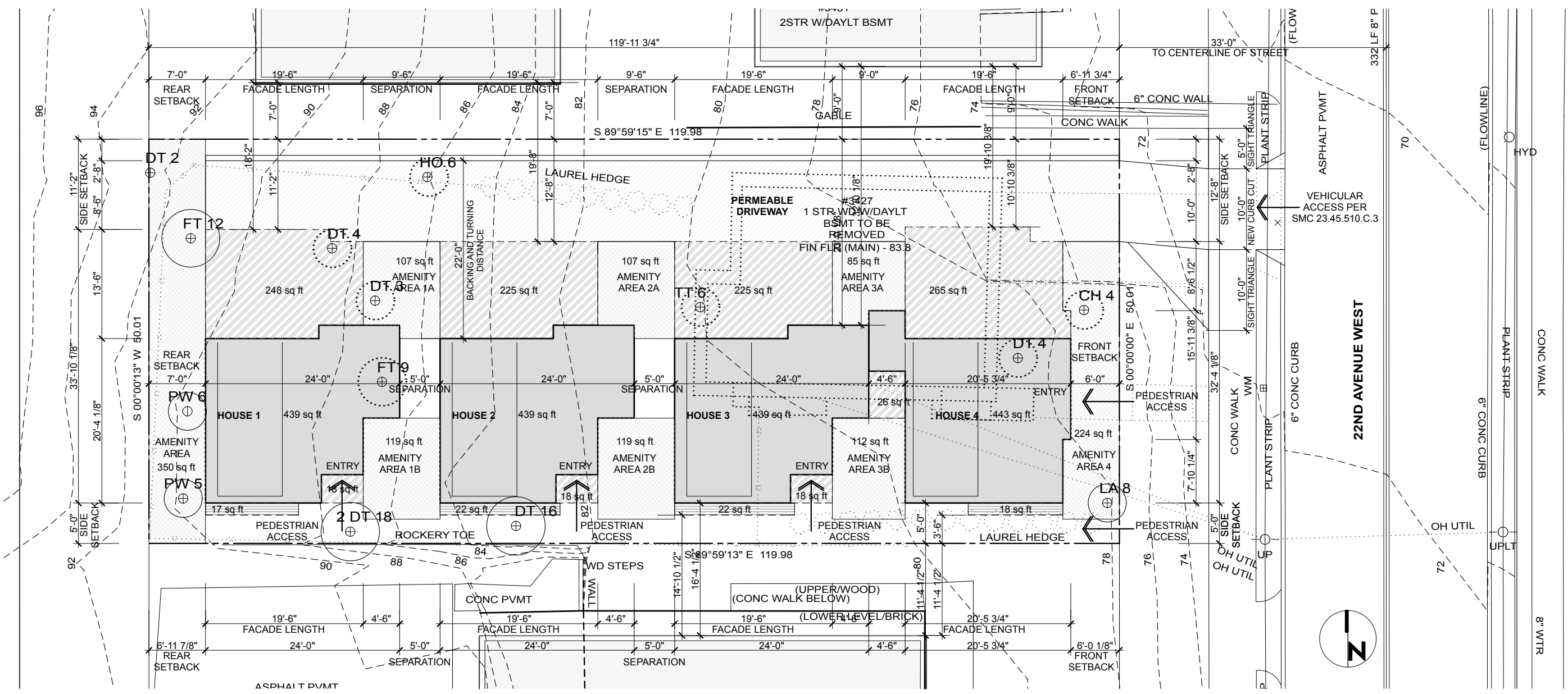
The site is located with access to bus transit as well as city arterials. Bus stops at 22nd Avenue W and Bertona Ave (a half-block walk) provide access to route 31 with access to Central Magnolia and Fremont and route 33 with access to downtown Seattle and Seattle Center.

The site has a grade change of 20 ft sloping down towards the eastern edge of the property at 22nd Avenue W.

Our solution seeks to address Design Guidelines CS1 Natural Systems and Site Features: C. Topography, D. Plants and Habitat; CS2 Urban Pattern and Form: B. Adjacent Sites, Streets and Open Spaces, C. Relationship to Block, D. Height, Bulk and Scale; PL2 Walkability: B. Safety and Security; PL3 Street Level Interaction: A. Entries, C. Residential Edges; DC1 Project Uses and Activities: B. Vehicular Access and Circulation; DC2 Architectural Concept: A. Massing, C. Secondary Architectural Features; DC4 Exterior Elements and Materials: B. Signage, D. Trees, Landscape and Hardscape Materials.



# PLOT PLAN AND SECTIONS



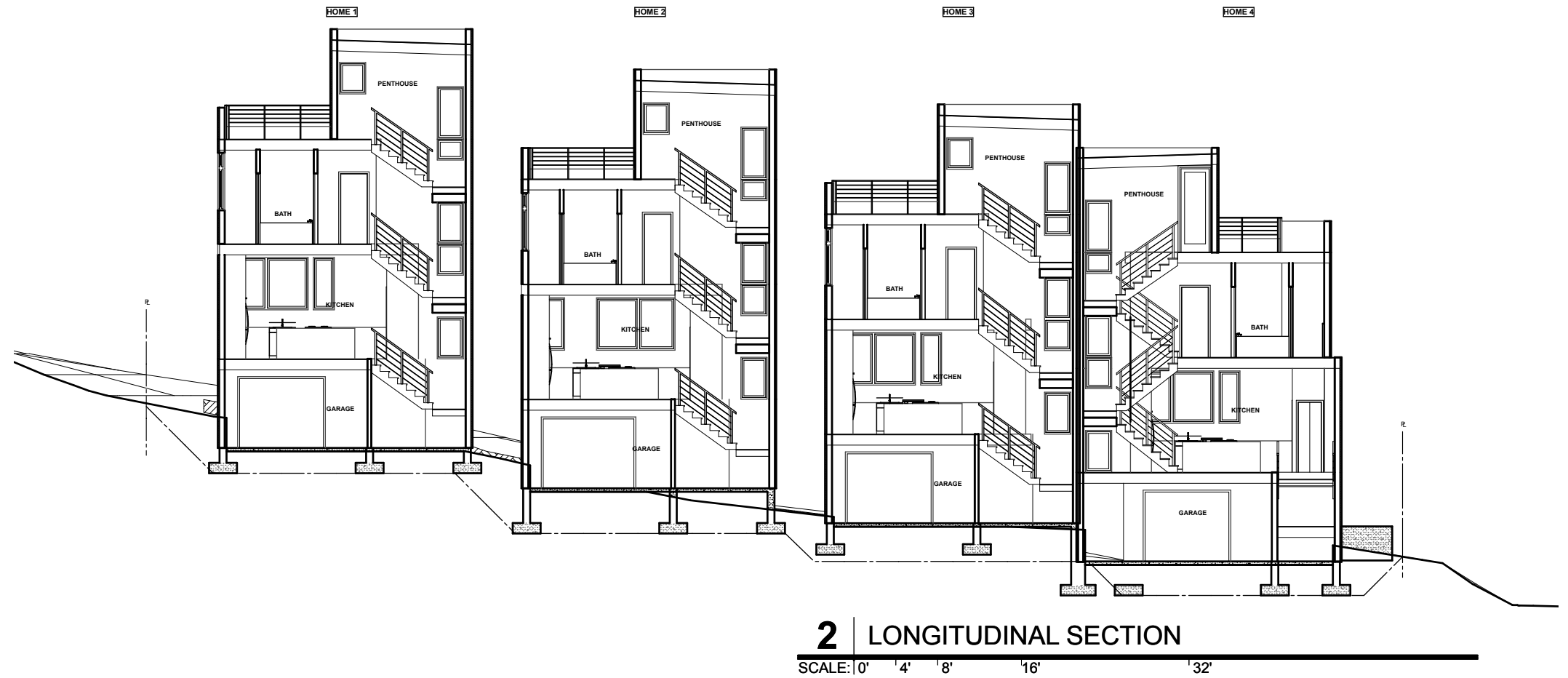
**1 | PLOT PLAN**  
 SCALE: 0' 4' 8' 16' 32'

## DESIGN APPROACH

The 6,000 square-foot infill parcel has access from 22nd Avenue W. The design proposal responds to the site's topography and context. Detached and attached homes step down the grade following the slope. The street-facing homes, an attached duplex, are lifted above the street. All homes connect to 22nd Avenue W along a shared pedestrian pathway to the south and driveway to the north.

The massing of the proposal responds to the existing rhythm within the immediate surrounding, consisting of townhouses, four-plexes triplexes, duplexes and an occasional single family home. Instead of creating one large structure of attached townhouses or two duplexes, the scheme creates three separate structures. A duplex fronts the street, modulated to clearly demonstrate the two distinct homes. The rear structures are two detached homes, spaced apart consistently to relate to the surrounding context. The homes are further scaled through modulation and varied materials. Private amenity spaces are located on decks and roof decks. Furthermore, at grade amenity areas are focused in varied spaces along the pedestrian pathway.

A entry wood screen highlights the shared walkway from the street, with addresses and mailboxes attached to it. A canopy highlights the entry to each unit and provides weather protection. Varied paving, planters and larger landscaping activate the pathway and provide privacy between the homes and the adjacent neighbors.



**2** | LONGITUDINAL SECTION

SCALE: 0' 4' 8' 16' 32'

## CONTEXT & SITE

### CS1 NATURAL SYSTEMS AND SITE FEATURES

#### C. TOPOGRAPHY

*Use the natural topography and existing site features to inform the project design.*

The project is designed to respond to the sloping topography from east to west. By following the slope, the project steps down at each unit to provide scale and rhythm. This approach minimizes the height and bulk while relating to the scale of surrounding residential structures.

#### D. PLANTS AND HABITAT

*Incorporate on-site natural habitats and landscape elements including existing trees or vegetation into project design and connect those features to existing networks of open spaces and natural habitats wherever possible.*

The project isolates the automobile access from pedestrian access. In between is a robust landscaped front yard for the street-facing home consistent with adjacent sites. The proposed planting includes drought-tolerant native species, fruit trees and one street tree on the property side of the sidewalk because of the undersized planting strip in the right-of-way. Where possible existing trees may be saved at the rear of the site abutting the unopened alley.

#### D. HEIGHT, BULK, AND SCALE

*Use changes in topography, site shape, and vegetation or structures to help make a successful fit with adjacent properties.*

The project responds to the sloping topography by stepping the masses down the hill toward the street. Modulation combined with material variation creates opportunities for visual interest and a well-scaled proposal. Projections and recesses announce entries and decks.



Caption: Existing structures and Rhythm



Caption: New development across the street.

### CS2 URBAN PATTERN AND FORM

#### B. ADJACENT SITES, STREETS, AND OPEN SPACES

*Contribute to the character and proportion of surrounding open spaces. Evaluate adjacent sites, streetscapes, trees and vegetation, and open spaces for how they function as the walls and floor of outdoor spaces or "rooms" for public use in order to determine how best to support those spaces through project siting and design.*

The project considers adjacent sites and its relationship to the street. Open spaces are created between each unit to the north and south as a way of creating rhythm and landscape opportunities. The adjacent proposed structure has been included in our proposal and has been referenced for our design decisions. Our proposed project pulls itself away from that adjacent townhouse and creates edges of landscaping and pavers to its neighbors.

#### C. RELATIONSHIP TO THE BLOCK

*Look to the uses and scales of adjacent buildings for clues about how to design a mid-block building.*

Consideration for the uses and scale of adjacent buildings results in the rhythmic proposal. Homes are individualized through material and massing variation. Entries are clearly identified.

## PUBLIC LIFE

### PL2 WALKABILITY

#### B. SAFETY AND SECURITY

*Create a safe environment by providing lines of sight and encouraging natural surveillance through strategic placement of doors, windows, balconies, and street-level use.*

A shared pedestrian path provides access to all homes. Entry doors connect to the path via small recesses adjacent to a defined open space. The street-facing townhouse takes access from the path as well, to a partially covered front porch with a direct connection to the street. Lines of sight and natural surveillance are supported through the placement of entry doors, windows and decks. Landscape design between the units also emphasizes entry moments.

### PL3 STREET LEVEL INTERACTION

#### A. ENTRIES

*Design primary entries to be obvious, identifiable, and distinctive with clear lines of sight.*

Primary entries connect to the shared pedestrian path as noted above under PL2. Entries along the path are defined by canopies and landscaped open space between the homes. Each entry is identified by a deck overhang that adds definition and visual interest. The street-facing entry is directly accessible from the street and visible to passersby.

#### C. RESIDENTIAL EDGES

*Provide security and privacy for residential buildings through the use of a buffer or semi-private space between the development and the street or neighboring buildings. suggestions: elevating the main floor, providing setback from the sidewalk, and or landscaping to indicate the transition from one type of space to another.*

All homes are raised above the street. Additional buffering is created through recessed entries and front porch. In addition the large planting area between the sidewalk and the front property line provides a significant buffer space between public and private. Along the north edge a side setback of 12'- 8" is provided to allow for the vehicular entry and space for a buffer.

The alley area directly behind the property is unopened and will remain undeveloped. It is heavily landscaped, which provides a visual buffer between it and the adjacent structures. This combined with a landscaped 7' rear setback establishes a substantial buffer to the west.

Along the south edge the shared walkway is landscaped with vine maples to provide screening at recessed home entries. A deck projection to within 3'-6" of the side setback at each unit creates small occupiable decks that accent entries and provide visual surveillance and scale.

## DESIGN CONCEPT

### DC1 PROJECT USES AND ACTIVITIES

#### B. VEHICLE ACCESS AND CIRCULATION

*Choose locations for vehicular access that minimize conflict between vehicles and non-motorists wherever possible.*

Vehicle access is proposed from 22nd Avenue W through a new curb cut. Private garages are accessed through a permeable driveway along the north side of the site. The unopened alley at the rear of the site has been determined to be infeasible due to topography.

### DC2 ARCHITECTURAL CONCEPT

#### C. SECONDARY ARCHITECTURAL FEATURES

*Add depth to facades through secondary and potentially dual-purpose elements that appropriate themselves within the context of the neighborhood.*

The project creates depth in multiple ways. First the homes are separated and modulated for individual clarity and expression. Second facade articulation is created through projections, canopies, railings and decks that highlight interior volumes and provide weather protection. Third, landscaping provides a transition to the street consistent with adjacent sites scale add depth along the facades between each residence.

### DC4 MATERIALS

#### B. SIGNAGE

*Develop a signage plan within the context of architectural and open space concepts, and coordinate the details with facade design, lighting, and other project features to complement the project as a whole.*

Address signage for the rear homes will be provided at the street along a fence return at the south property line and over adjacent to each entry door.

#### D. TREES, LANDSCAPE AND HARDSCAPE MATERIALS

*Reinforce the overall architectural and open space design concepts through the selection of landscape and hardscape materials.*

Landscaping emphasizes points of access for residents and vehicles. Reclaimed brick pavers and drivable grass or similar pavers detail the shared pedestrian path and driveway respectively. Trees will soften edges and provide buffers to adjacent properties. Fruit trees, vine maples and city specified street tree will be featured.



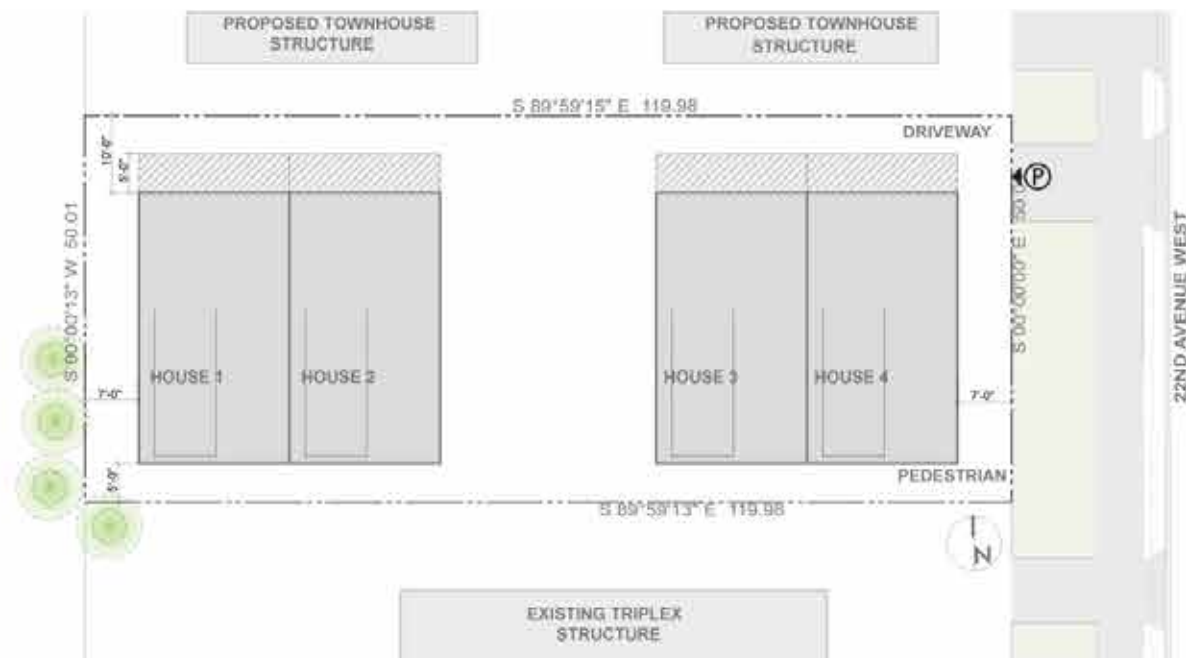
Caption: Adjacent site where new townhome development is occurring



Caption: Street view of proposed townhomes

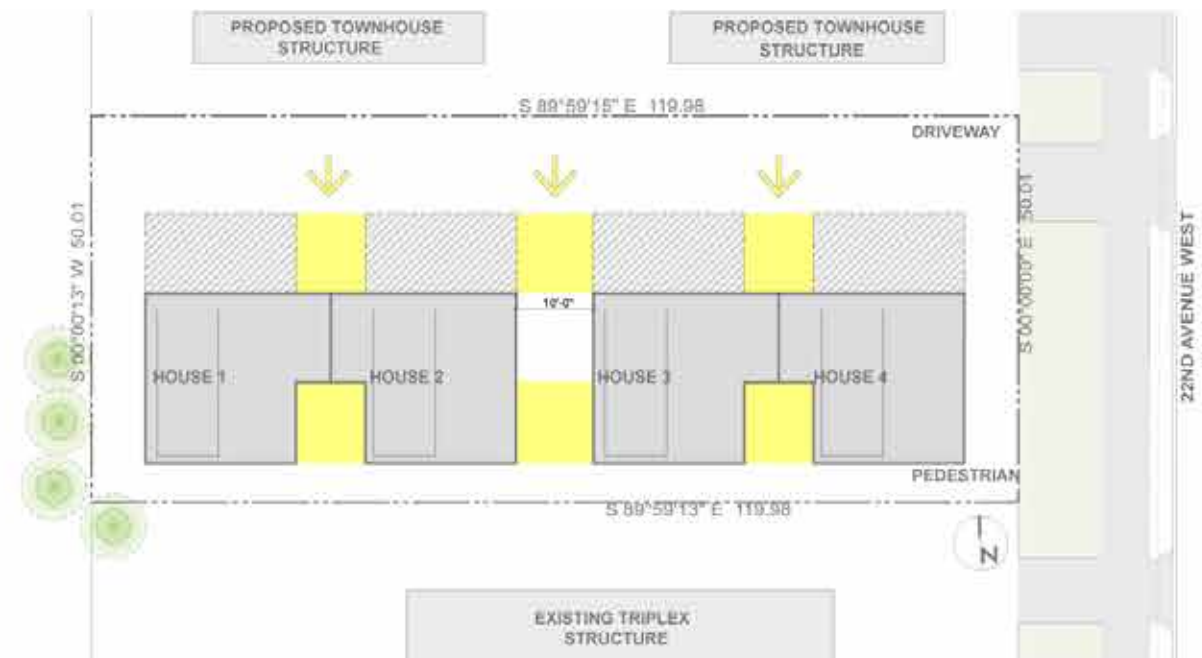
# PROJECT EVOLUTION

## Code Compliant Scheme



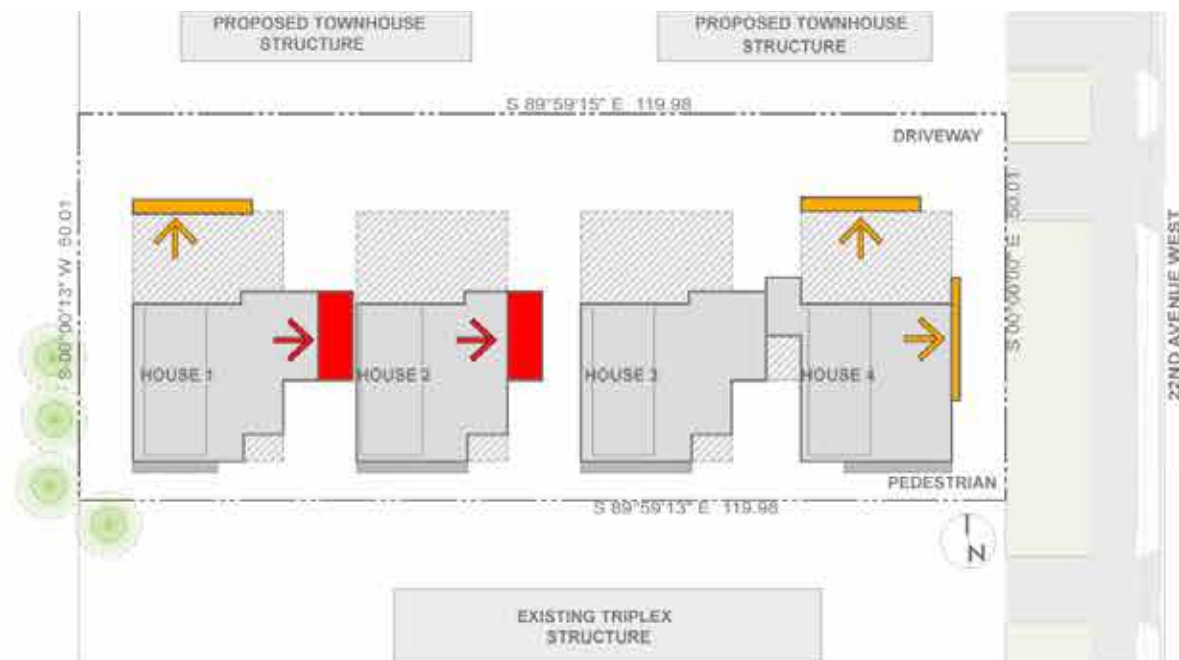
- A code compliant scheme of two duplexes fills the fills the site in the north-south direction with an overhang above the driveway access from 22nd Avenue W.
- This massing solution provides an open area at the site's center but does little to accommodate the adjacent site conditions or respond to the scale and rhythm of the neighborhood.

## Adjust Mass to Accommodate Site Conditions



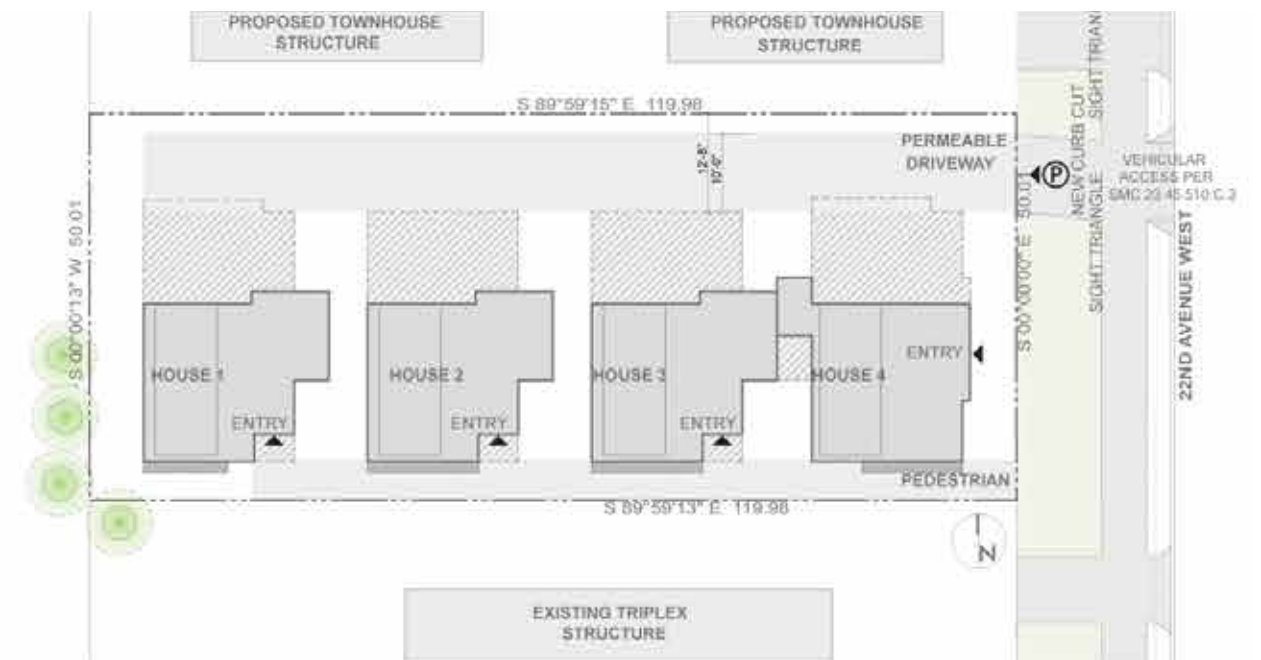
- A shift of the building masses maintains two duplexes and creates a larger setback to the north.
- Modulation along the north and south facades (shown in yellow in the diagram above) introduces the opportunity for rhythm in the design as well as light and air and to each unit.

## Separate Massing and Expand



- Further modulation affects both structures, reducing the overall mass of the structures and providing a scale which better responds to surrounding area and neighbors.
- The west structure is separated into two detached homes. This creates clarity of the individual homes and their entries and emphasizes the scale of surrounding structures.

## Proposed Scheme



- Pedestrian and vehicular access are separated with garage entries screened by being recessed.
- A shared pedestrian access is located adjacent to the south property line, which abuts the neighboring established triplex.
- Each unit's has individual entrance connect to the shared path.
- Modulation in the east structure references the structures to the west with minor variation given its relation to the street and sidewalk.
- Deck projections, varied massing and canopies highlight individual homes and entries.

# ADJUSTMENT TABLE

The modification to the code compliant scheme requires the following adjustments, each of which are allowed under the SDR Process:

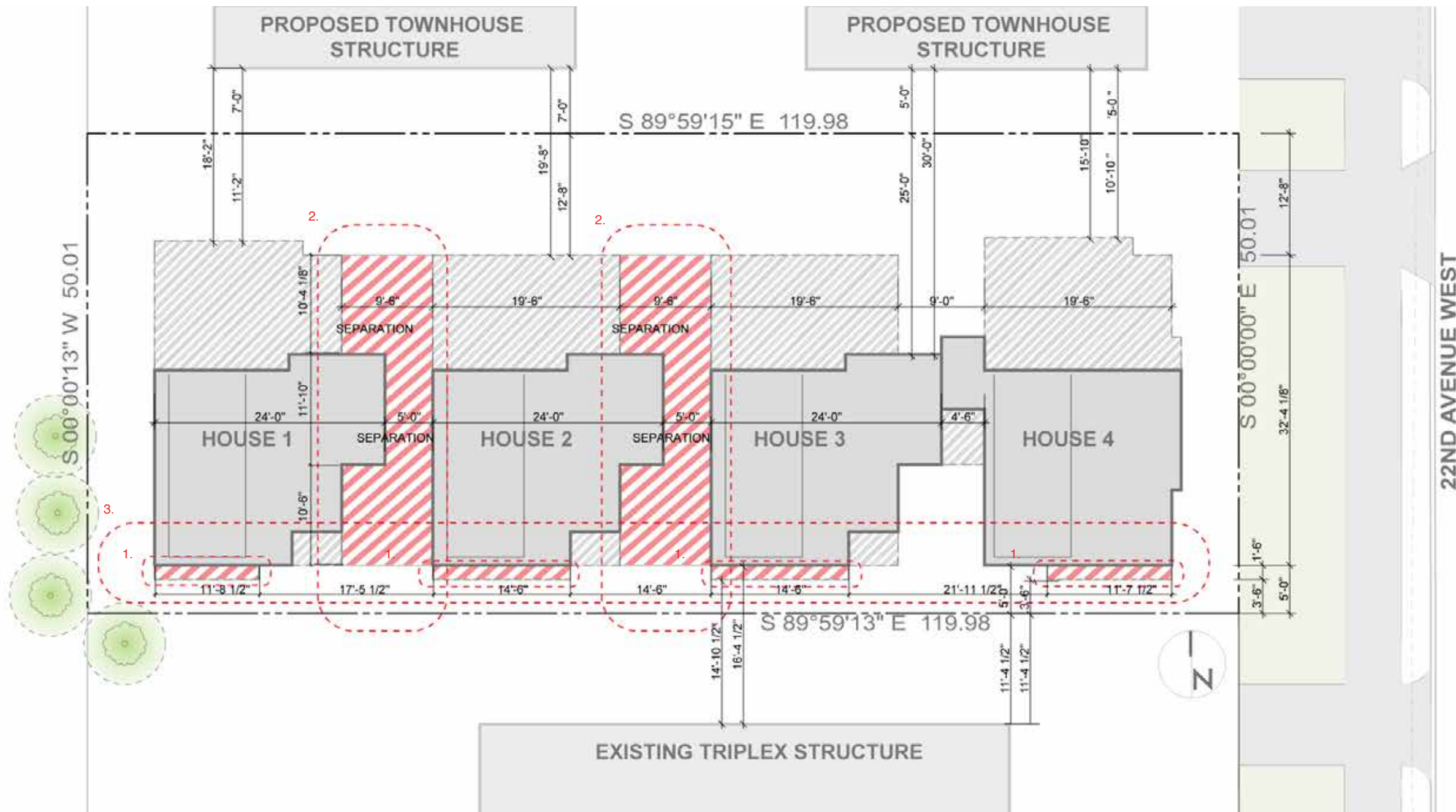
ITEM	CODE SECTION AND REQUIREMENT NAME	REQUIRED	PROVIDED	AMOUNT OF ADJUSTMENT	JUSTIFICATION	SUPPORTED DESIGN GUIDANCE
1	<b>SIDE SETBACK: PROJECTIONS</b> SMC 23.45.518.I	DECKS AND BALCONIES MAY PROJECT 4 FEET INTO EACH SETBACK IF IT IS NO CLOSER THAN 5 FEET TO THE PROPERTY LINE	PROJECTS 1'-6" TO WITHIN 3'-6" OF THE SIDE PROPERTY LINE	SETBACK: 1'-6" REDUCTION MINIMUM FOR DECKS, EACH NO LONGER THAN 14'-6".  ADJUSTMENTS ARE WITHIN LIMITS ALLOWED PER SMC 23.41.018.D.4.a	THE SETBACK PROJECTION EXTENDS CLOSER THAN 5 FEET TO THE SIDE LOT LINE IN ORDER TO PROVIDE A SMALL DECK AT EACH UNIT AT THE THIRD FLOOR. MODULATION ALONG THE SOUTH FACADE PROVIDES RHYTHM AND SCALE BY BREAKING THE MASSING INTO SMALLER ELEMENTS. IN ADDITION THE SOUTH-FACING DECK HIGHLIGHTS THE ENTRY DOOR FOR EACH HOME WHILE SUPPORTING SAFETY AND SECURITY BY CAPTURING VIEWS TO THE STREET AND ADJACENT UNITS. THE PROPOSED SETBACK REDUCTION IS ADJACENT TO AN EXISTING TRUPLEX STRUCTURE WITH A 14'-10 1/2" SIDE SETBACK. THE MAJORITY OF THE WINDOWS ON THE ADJACENT NEIGHBOR STRUCTURE ARE SHORT AND WIDE, AWAY FROM THE REDUCED SIDE SETBACK AND LOWER THAN THE DECKS.	PL.2.B SAFETY AND SECURITY, PL.3.A ENTRIES, CS2.D.4 HEIGHT BULK & SCALE, DC.2.C ARCHITECTURAL CONCEPT SECONDARY ARCHITECTURAL FEATURES
2	<b>SEPARATION</b> SMC 23.45.518.F	10 FEET MINIMUM	9'-6" MINIMUM FOR A LENGTH OF 17'-4" AND 5'-0" MINIMUM FOR A LENGTH OF 11'-6".	SEPARATION: 0'-6" REDUCTION; 5'-0" REDUCTION ADJUSTMENTS ARE WITHIN LIMITS ALLOWED PER SMC 23.41.018.D.4.a	A RHYTHM OF HOMES STEPS DOWN THE HILL TOWARDS 22ND AVENUE W. INSTEAD OF TWO DUPLEXES, THE DESIGN FOLLOWS THE TOPOGRAPHY, SEPARATED INTO THREE SEPARATE ARTICULATED MASSES. THE WESTERN STRUCTURES, TWO DETACHED HOMES ARE PULLED AWAY FROM THE EAST STRUCTURE, A DUPLEX. THIS IS MADE POSSIBLE THROUGH A REDUCED SEPARATION THAT VARIES FROM 9'-6" TO 5'-0". IN THIS WAY, MASSING EXPRESSES THE INDIVIDUAL DWELLINGS CLEARLY, AND ALLOWS FOR MORE NATURAL LIGHT TO REACH EACH UNIT AND THE ADJACENT SITES. ENTRIES ALSO BECOME EMPHASIZED. THE REDUCED SEPARATION IS BALANCED BY AN INCREASED NORTH SETBACK OF 11'-2". THE REDUCED SETBACK OF 5'-0" CREATES ADDITIONAL MODULATION AND CLARITY OF THE DESIGN CONCEPT.	CS2.D HEIGHT, BULK, & SCALE, PL.2.B SAFETY AND SECURITY, PL.3.C RESIDENTIAL EDGES, DC.2.A ARCHITECTURAL CONCEPT MASSING
3	<b>FACADE LENGTH</b> SMC 23.45.527.B.1	A MAXIMUM OF 65% OF LOT LENGTH, WHICH IS 78'-0"	65.8% ALONG THE SOUTH PROPERTY LINE, FAÇADE LENGTH IS 78'-11 3/4"	FAÇADE LENGTH: 0'-11 3/4" INCREASE OR A 0.8% INCREASE IN LENGTH ADJUSTMENTS ARE WITHIN LIMITS ALLOWED PER SMC 23.41.018.D.4.d	THE MINOR INCREASE IN FACADE LENGTH RESULTS FROM ARTICULATION AND MODULATION OF THE STREET-FACING FACADE. THE ENTRY IS PUSHED FORWARD TOWARD THE STREET IN CONCERT WITH A OPEN COVERED FRONT PORCH. THIS SUPPORTS THE DESIGN CONCEPT AND CREATES MASSES THAT ARE SCALED TO FIT WITH THE SURROUNDING STRUCTURES.	CS2.D HEIGHT, BULK, & SCALE, PL.3.C STREET LEVEL INTERACTION RESIDENTIAL EDGES, CS.2.B ADJACENT SITES, STREETS, AND OPEN SPACES, PL.3.A STREET LEVEL INTERACTION ENTRIES

**Facade Length Calculation:**

South Lot Line	=	120'-0"		
<b>Allowable Facade Length</b>	=	120' x .65	=	<b>78'-0"</b>
Proposed North Facade Length	=	78'-0"	=	<b>65.0 %</b>
Proposed South Facade Length	=	78'-11 3/4"	=	<b>65.8 %</b>



# ADJUSTMENT DIAGRAM



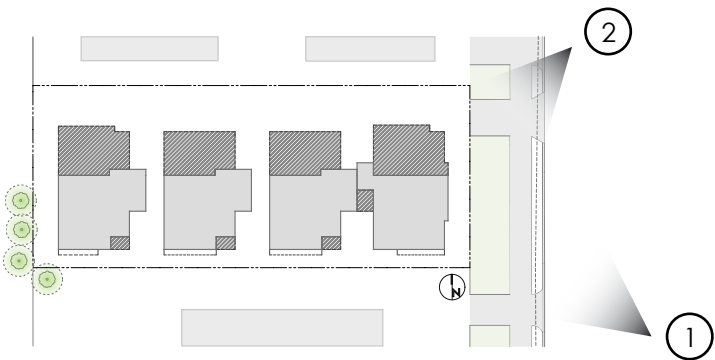
# RENDERINGS



Project Development



1. Street View from SE





Project Development



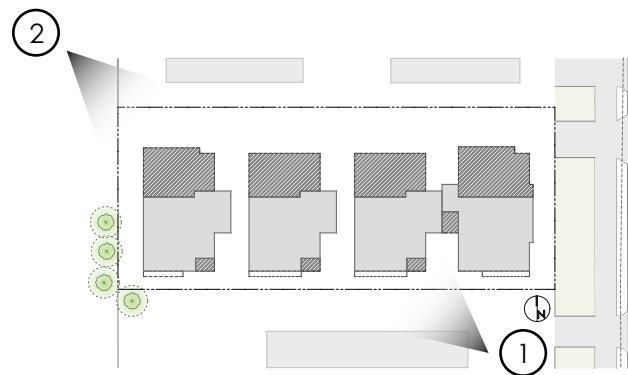
2. Street view from NE



Project Development



1. Typical entry view





Project Development



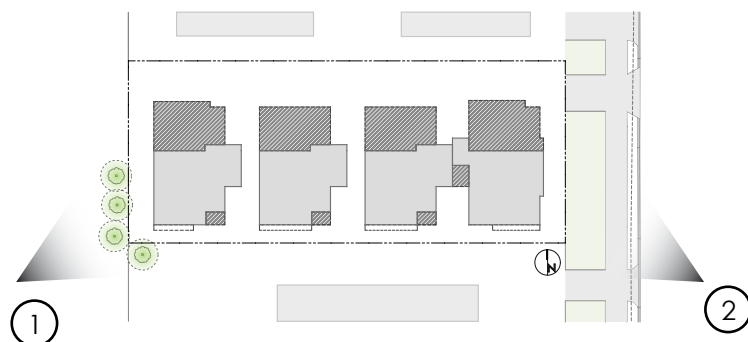
2. Rear view from NW



Project Development



1. Rear view from SW





Project Development



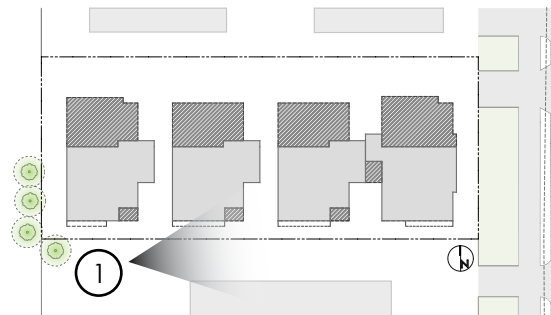
2. View from above



West elevation: Deck relationship to adjacent property. Review privacy elevation on page 27 for deck alignments



1. Pedestrian pathway view







# PRIVACY ELEVATIONS

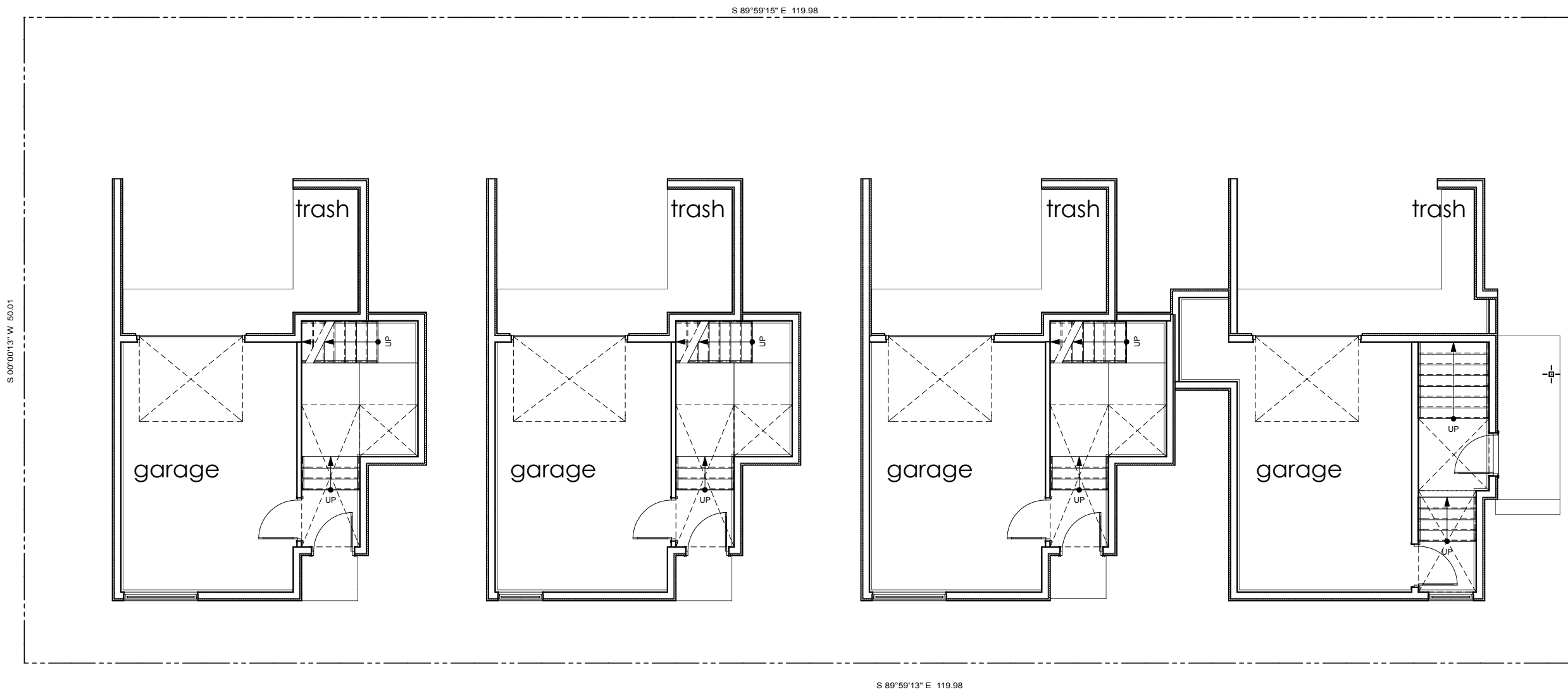




**1** | 1 SOUTH PRIVACY ELEVATION

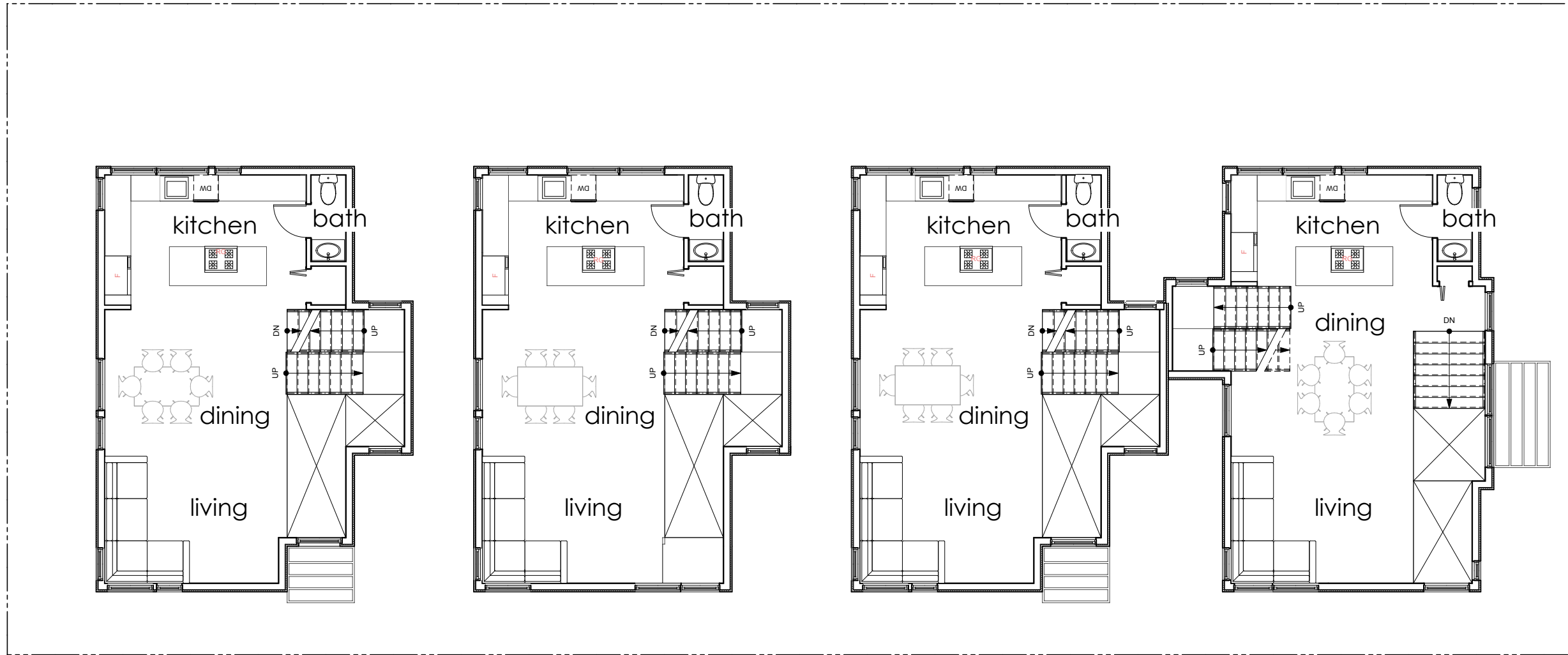
SCALE: 1/8" = 1'-0" 1/4" = 1'-0" 1/2" = 1'-0" 3/4" = 1'-0" 1" = 1'-0"

# FLOOR PLANS

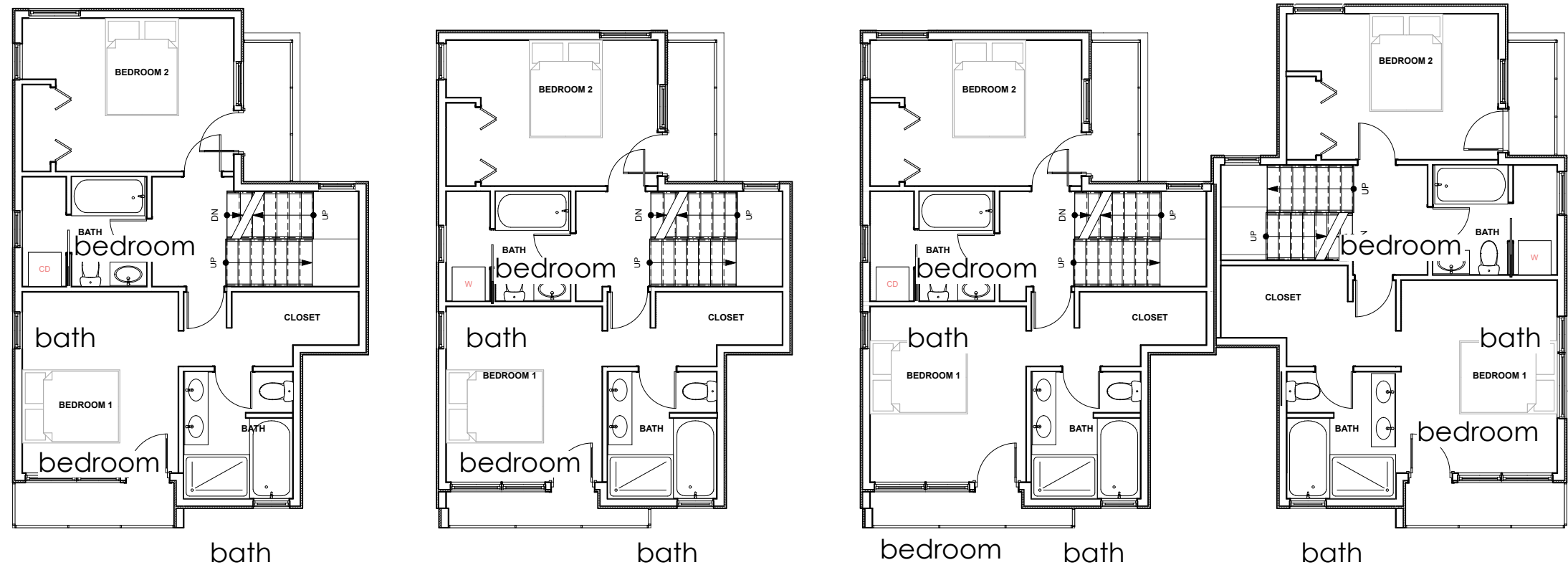


**1** | FIRST FLOOR PLAN

SCALE: 10' 2' 4' 8' 16'

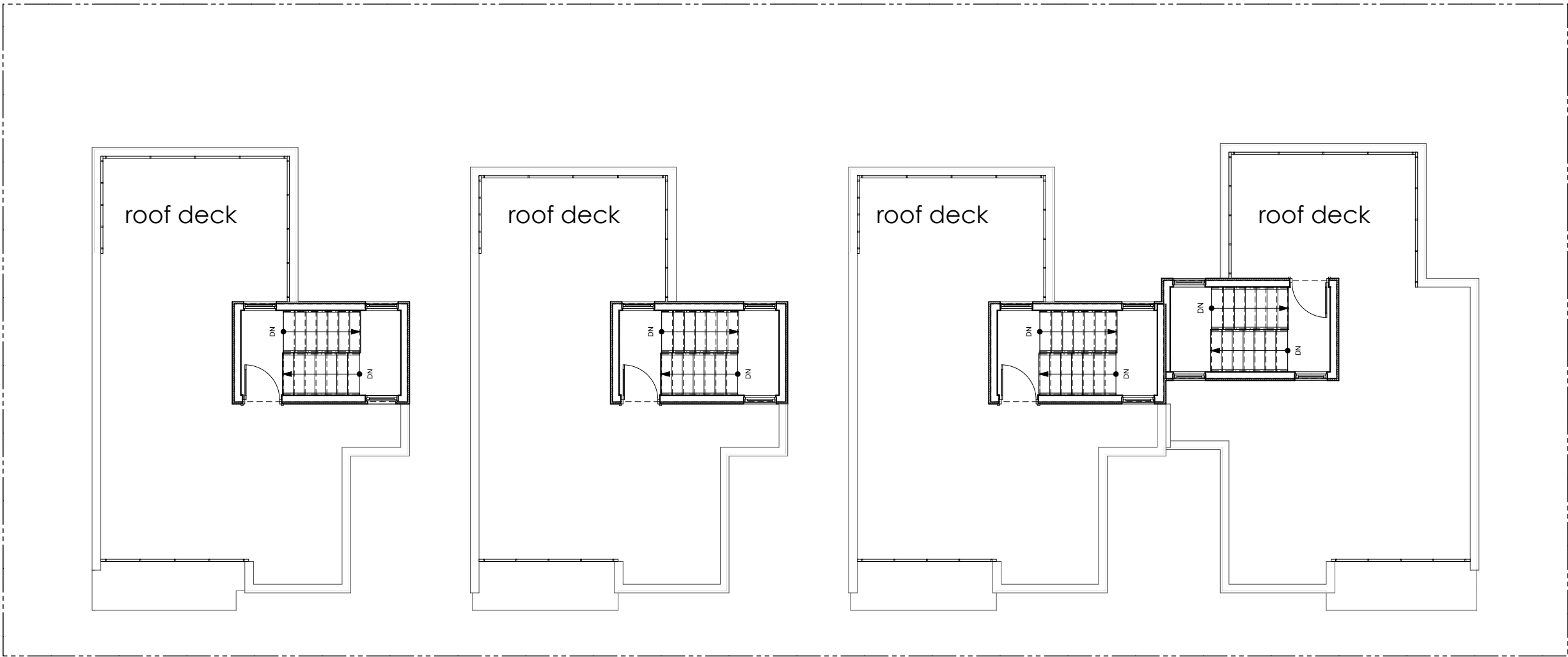


**1** SECOND FLOOR PLAN  
 SCALE: 0' 2' 4' 8' 16'



**1** | THIRD FLOOR PLAN

SCALE: 1/8" = 1'-0" 1/4" = 2'-0" 1/2" = 4'-0" 3/4" = 6'-0" 1" = 8'-0"



**1 | UPPER ROOF PLAN**

SCALE: 0' 2' 4' 8' 16'

# RENDERED ELEVATIONS



Rendered Elevations : North





4x8 painted panel siding off white  
or similar

1 x 8 painted panel siding grey

horizontal wood siding

Rendered Elevations : South



Rendered Elevations : West



Rendered Elevations : East



# COMPLETED WORKS



① 208 18th Ave. E. exterior view from street



② 1504 19th Avenue Duplex behind SF House



③ 1411 E. Fir St. exterior view from street



④ 1911 E. Pine St. courtyard view from a deck



⑤ 1911 E Pine St. view at interior of canyon



⑥ 1411 E. Fir St. interior boardwalk view



⑦ 1911 E. Pine St. view from street



⑧ 1818 E Yesler Way. view of a woonerf