



SAN FRANCISCO PLANNING DEPARTMENT

Preliminary Mitigated Negative Declaration

Date: February 28, 2018
Case No.: **2015.012729ENV**
Project Title: **600 Van Ness Avenue**
Zoning: RC-4 [Residential-Commercial-High Density] Use District
NC-3 [Neighborhood Commercial, Moderate Scale] Use District
Van Ness Avenue Special Use District
130-V Height and Bulk District
130-E Height and Bulk District
Block/Lot: 0763/006, 007, 008, 009
Lot Size: 22,980 square feet
Project Sponsor: John Kevlin, Reuben, Junius, and Rose LLP
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Lead Agency: San Francisco Planning Department
Staff Contact: Justin Horner – (415) 575-9023
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PROJECT DESCRIPTION:

The proposed project would construct an 185,739-square-foot thirteen-story-over-basement mixed-use residential building. The proposed project would be 129-feet-8-inches-tall (138 feet 8 inches tall with elevator penthouse and equipment) along its Van Ness and Golden Gate Avenue frontages, and would step down to 81 feet tall in the eastern portion of the project site along Golden Gate Avenue. Along Elm Street, the tallest portion of the building would step down to a height of 51 feet along Van Ness Avenue and to a height of 22 feet along the eastern portion of the project site. The proposed new building would include approximately 156,598 square feet of residential uses, 168 dwelling units, 6,241 square feet of ground floor commercial, and 22,900 square feet of parking. The proposed project would include up to 102 off-street parking spaces and one off-street freight loading space at the basement level accessed via an 18 foot wide curb cut on Golden Gate Avenue. The proposed project would include 169 Class 1 bicycle parking spaces on the ground floor, and 14 Class 2 bicycle parking spaces at two locations along Golden Gate Avenue. The proposed project would construct a corner bulb-out at Van Ness and Golden Gate avenues. The proposed project would plant 16 street trees along the project site's Elm Street frontage and 10 street trees along the project's Golden Gate Avenue frontage. The proposed project would include a back-up diesel generator no larger than 500 kilowatt, with an 8 hour day tank, on the roof. During the approximately 24-month construction period, the proposed project would require up to twenty-two feet of excavation below ground surface for the proposed basement garage and foundation work, resulting in approximately 17,800 cubic yards of soil disturbance. The proposed building would be supported on a mat slab foundation.

FINDING:

This project could not have a significant effect on the environment. This finding is based upon the criteria of the Guidelines of the State Secretary for Resources, Sections 15064 (Determining Significant Effect), 15065 (Mandatory Findings of Significance), and 15070 (Decision to prepare a Negative Declaration), and the following reasons as documented in the Initial Evaluation (Initial Study) for the project, which is attached.

Mitigation measures are included in this project to avoid potentially significant effects. See pages 119.

TABLE OF CONTENTS

600 Van Ness Avenue

| <u>Section</u> | <u>Page</u> |
|---|-------------|
| A. PROJECT DESCRIPTION | 1 |
| B. PROJECT SETTING | 23 |
| C. COMBATIBILITY WITH EXISTING ZONING AND PLANS | 24 |
| D. SUMMARY OF ENVIRONMENTAL EFFECTS | 28 |
| E. EVALUATION OF ENVIRONMENTAL EFFECTS | 30 |
| E.1 Land Use and Land Use Planning | 30 |
| E.2 Population and Housing | 33 |
| E.3 Cultural Resources | 35 |
| E.4 Transportation and Circulation | 38 |
| E.5 Noise | 52 |
| E.6 Air Quality | 60 |
| E.7 Greenhouse Gas Emissions | 80 |
| E.8 Wind and Shadow | 84 |
| E.9 Recreation | 93 |
| E.10 Utilities and Service Systems | 95 |
| E.11 Public Services | 99 |
| E.12 Biological Resources | 101 |
| E.13 Geology and Soils | 104 |
| E.14 Hydrology and Water Quality | 108 |
| E.15 Hazards and Hazardous Materials | 112 |
| E.16 Mineral and Energy Resources | 116 |
| E.17 Agriculture and Forest Resources | 118 |
| E.18 Mandatory Findings of Significance | 119 |
| F. MITIGATION AND IMPROVEMENT MEASURES | 121 |
| G. PUBLIC NOTICE AND COMMENT | 124 |
| H. DETERMINATION | 125 |
| I. INITIAL STUDY PREPARERS | 126 |

| <u>List of Figures</u> | <u>Page</u> |
|------------------------------------|-------------|
| 1 Project Site Location | 3 |
| 2 Proposed Site Plan | 4 |
| 3 Proposed Basement Plan | 5 |
| 4 Proposed Ground Floor Plan | 6 |
| 5 Proposed Upper Ground Floor Plan | 7 |
| 6 Proposed Second Floor Plan | 8 |

| | | |
|----|---------------------------------------|----|
| 7 | Proposed Third and Fourth Floor Plan | 9 |
| 8 | Proposed Fifth Floor Plan | 10 |
| 9 | Proposed Sixth Floor Plan | 11 |
| 10 | Proposed Seventh Floor Plan | 12 |
| 11 | Proposed Eighth Floor Plan | 13 |
| 12 | Proposed Ninth Floor Plan | 14 |
| 13 | Proposed Tenth Floor Plan | 15 |
| 14 | Proposed Eleventh Floor Plan | 16 |
| 15 | Proposed Twelfth Floor Plan | 17 |
| 16 | Proposed Roof Plan | 18 |
| 17 | Proposed Van Ness Avenue Elevation | 19 |
| 18 | Proposed Golden Gate Avenue Elevation | 20 |
| 19 | Proposed Elm Street Elevation | 21 |
| 20 | Cumulative Projects | 32 |
| 21 | December 21 Shadow Diagrams | 89 |
| 22 | January 21 Shadow Diagrams | 90 |
| 23 | February 21 Shadow Diagrams | 91 |

List of Tables

| | | <u>Page</u> |
|---|---|--------------------|
| 1 | Daily Vehicle Miles Traveled | 40 |
| 2 | Vibration Guidelines for Potential Damage to Structures | 56 |
| 3 | Vibration Sources Levels for Construction Equipment | 57 |
| 4 | Typical Noise Levels from Construction Equipment | 59 |
| 5 | Criteria Air Pollutant Significance Thresholds | 62 |
| 6 | Construction CAP Emissions | 70 |

Initial Study
600 Van Ness Avenue
Planning Department Case No. 2015-012729ENV

A. PROJECT DESCRIPTION

Project Location

The 22,980-square-foot project site (Assessor's Block 0763, Lots 6, 7, 8 and 9) is on a block bounded by Golden Gate Avenue to the south, Van Ness Avenue to the west, Polk Street to the east and Turk Street to the north in San Francisco's Downtown/Civic Center neighborhood (see Figure 1, Project Location). The project site has frontage on Elm Street, an east-west street that bisects the block. The project site is currently vacant and San Francisco Public Works is using the site as a staging area for the construction of the Van Ness Bus Rapid Transit project. The project site includes a 17 foot wide curb cut on Golden Gate Avenue and three curb cuts on Elm Street with widths of 12 feet, 16 feet, and 32 feet. Existing sidewalk widths on Van Ness Avenue, Golden Gate Avenue and Elm Street are approximately 16, 10 and seven, respectively. The project site is located in two zoning districts and two height and bulk districts. The two westernmost parcels (Block 0763, Lots 9 and 8) are located in an RC-4 (Residential-Commercial, High Density) Zoning District, the Van Ness Special Use District, and a 130-V Height and Bulk District. The two easternmost parcels (Block 0763, Lots 6 and 7) are located in an NC-3 (Neighborhood Commercial, Moderate Scale) Zoning District and a 130-E Height and Bulk District.

Project Characteristics

The proposed project would construct an 185,739-square-foot thirteen-story-over-basement mixed-use residential building. The proposed project would be 129-feet-8-inches-tall (138 feet 8 inches tall with elevator penthouse and equipment) along its Van Ness and Golden Gate Avenue frontages, and would step down to 81 feet tall in the eastern portion of the project site along Golden Gate Avenue. Along Elm Street, the tallest portion of the building would step down to a height of 51 feet along Van Ness Avenue and to a height of 22 feet along the eastern portion of the project site. The proposed new building would include approximately 156,598 square feet of residential uses, 168 dwelling units, 6,241 square feet of ground floor commercial, and 22,900 square feet of parking (see Figures 2 and 19). The dwelling unit mix would be 87 studio, 47 one-bedroom, 33 two-bedroom, and one three-bedroom units. The proposed project would include up to 102 off-street parking spaces and one off-street freight loading space at the basement level accessed via an 18 foot wide curb cut on Golden Gate Avenue. The proposed project would include 169 Class 1 bicycle parking spaces on the ground floor, and 14 Class 2 bicycle parking spaces at two locations along Golden Gate Avenue. The proposed project would remove the one existing curb cut on Golden Gate Avenue and three existing curb cuts on Elm Street. The proposed project would construct a corner bulb-out at Van Ness and Golden Gate avenues, widening the sidewalk along Golden Gate Avenue by eight-and-a-half feet for a length of approximately 61 feet, measured eastward from the corner of Golden Gate Avenue and Van Ness Avenue. The proposed project would plant 16 street trees along the project site's Elm Street

frontage and 10 street trees along the project's Golden Gate Avenue frontage. The proposed project would add a new 50-foot long yellow zone along the building's Golden Gate Avenue frontage, to the west of the new curb cut.

The proposed project includes an approximately 4,398-square-foot common open space at the second floor, an approximately 2,109-square-foot common open space on the sixth floor, and an approximately 1,133-square-foot common open space on the ninth floor. Six of the proposed units would each include a private patio ranging from 525 to 1,331 square feet in size. No roof deck is proposed. The proposed project would include a back-up diesel generator no larger than 500 kilowatt, with an 8 hour day tank, on the roof. Project elevations are provided as Figures 17, 18 and 19.

Figure 1: Project Site Location

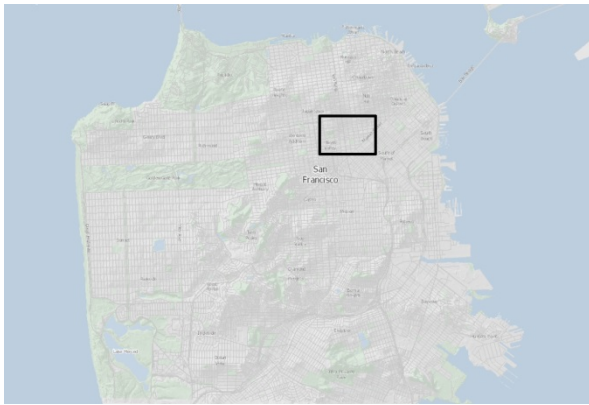


Figure 2: Proposed Site Plan



Figure 3: Proposed Basement Plan

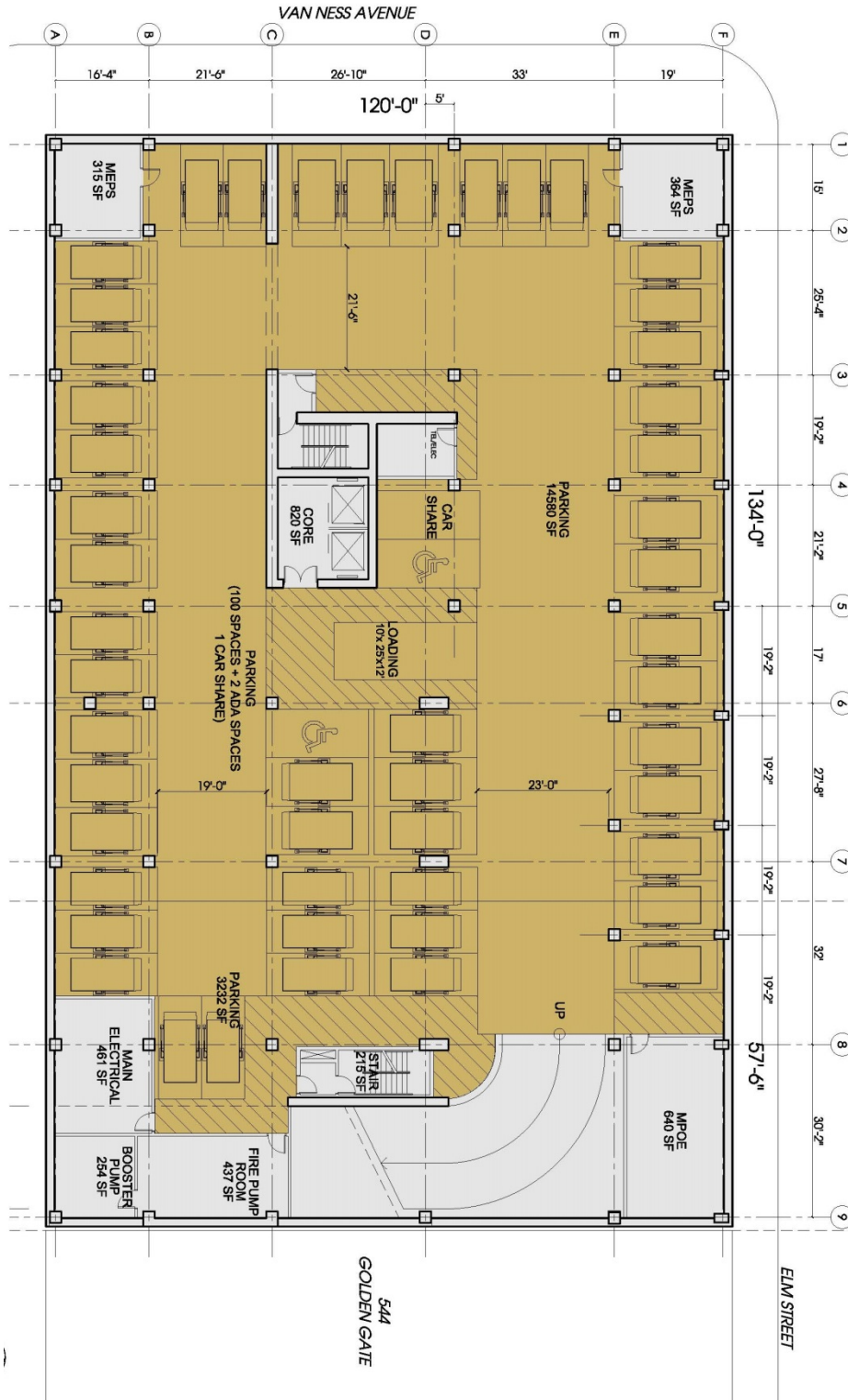


Figure 4: Proposed Ground Floor Plan

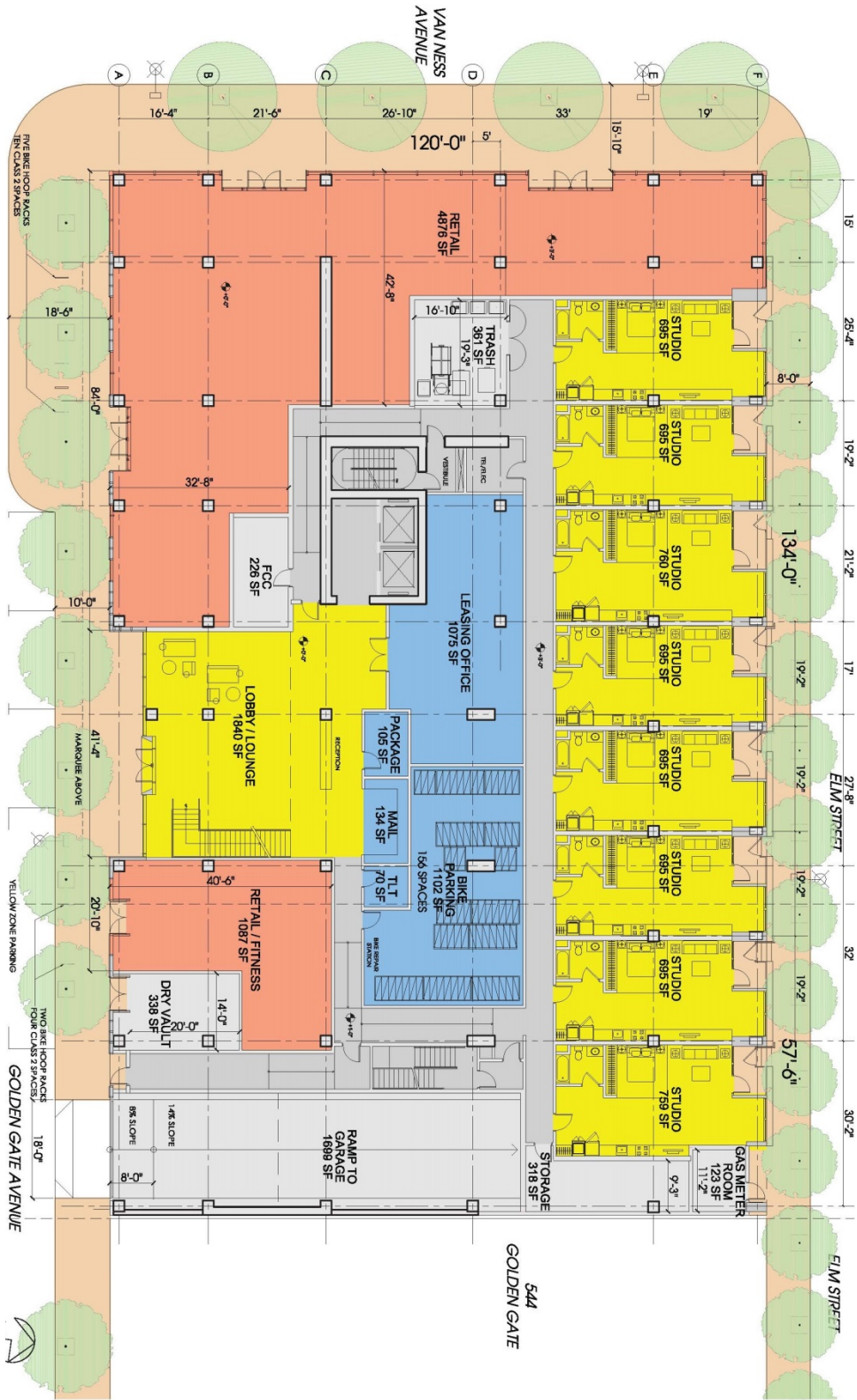


Figure 5: Proposed Upper Ground Floor Plan

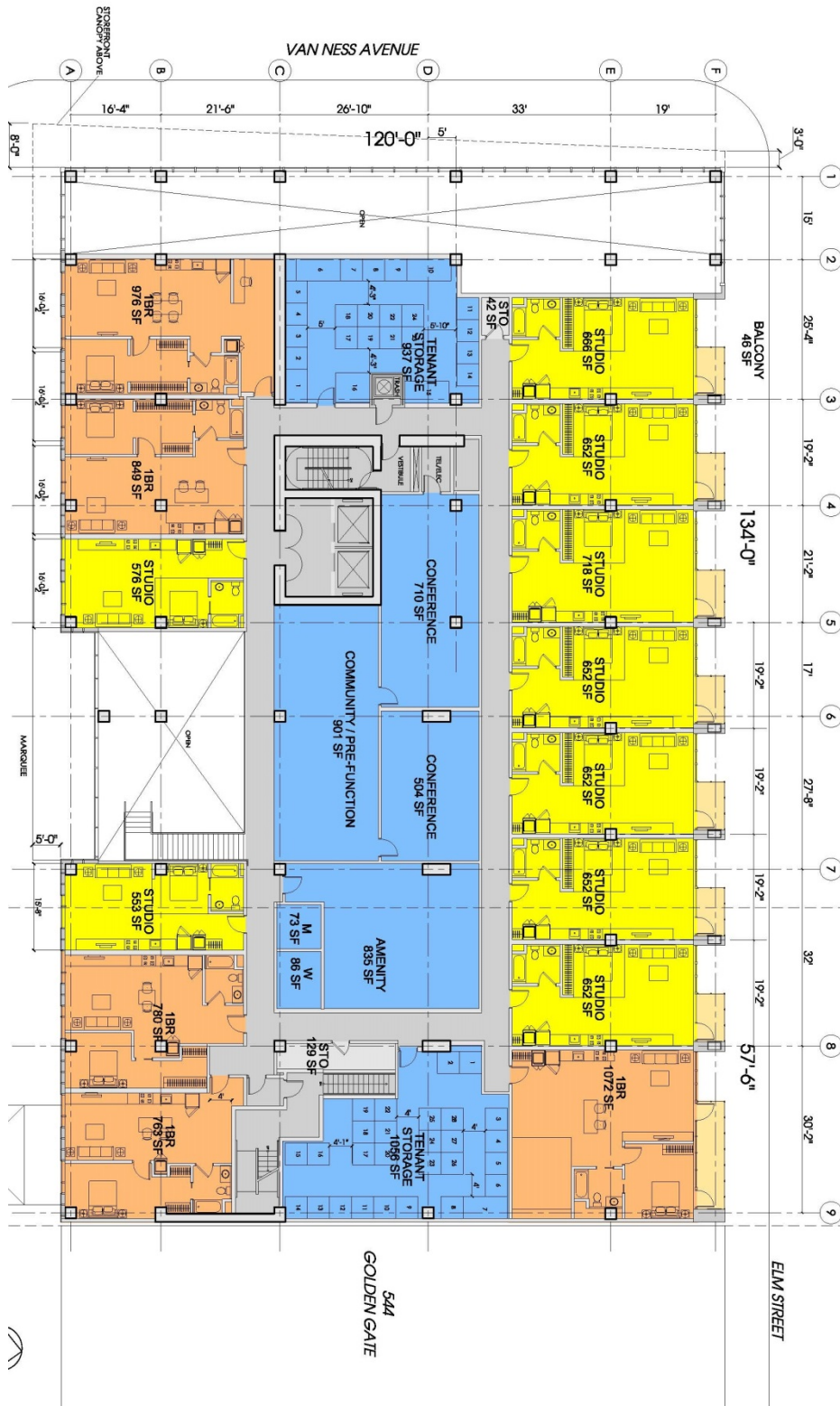


Figure 6: Proposed Second Floor Plan

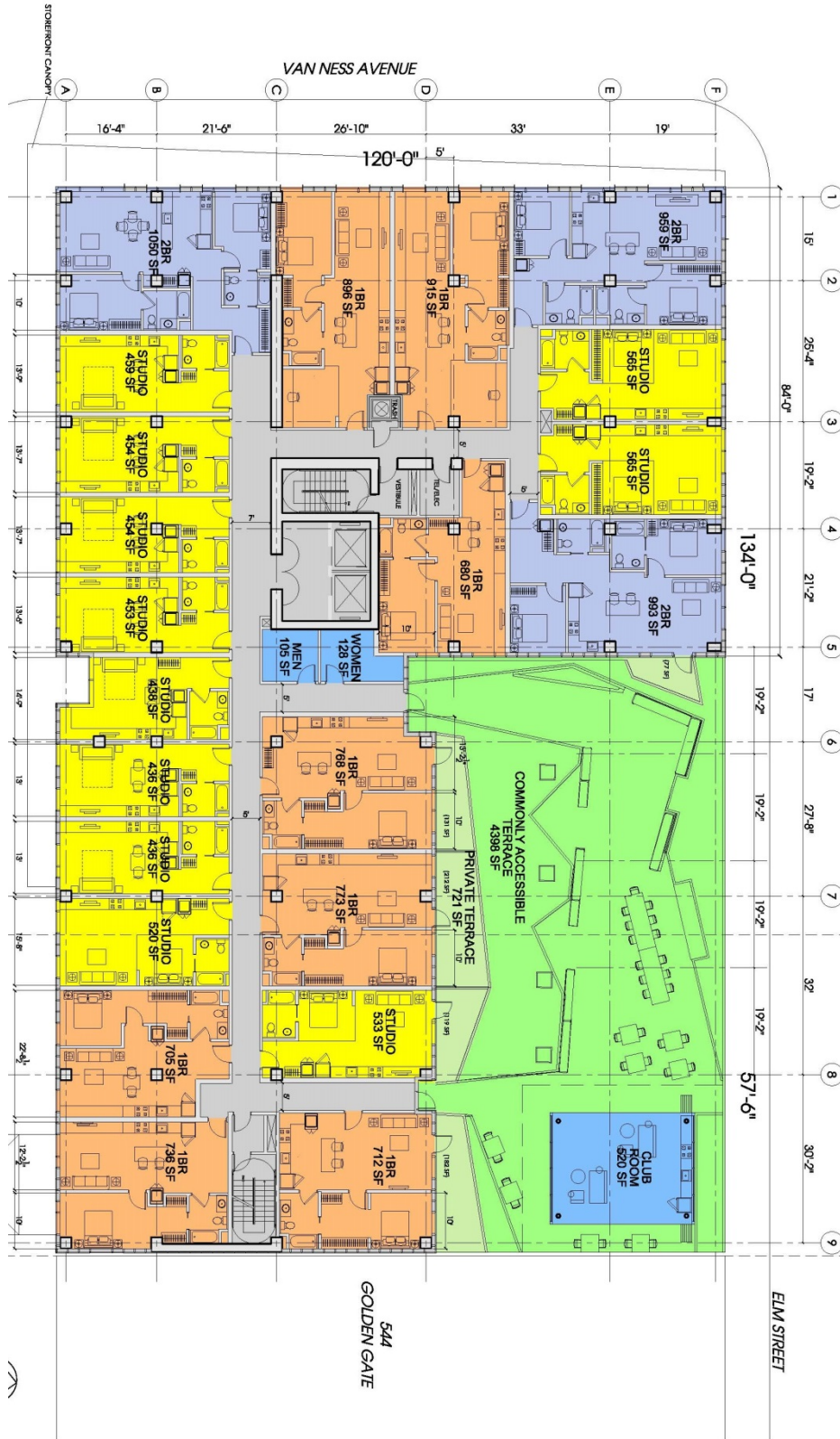


Figure 7: Proposed Third and Fourth Floor Plan



Figure 8: Proposed Fifth Floor Plan



Figure 9: Proposed Sixth Floor Plan

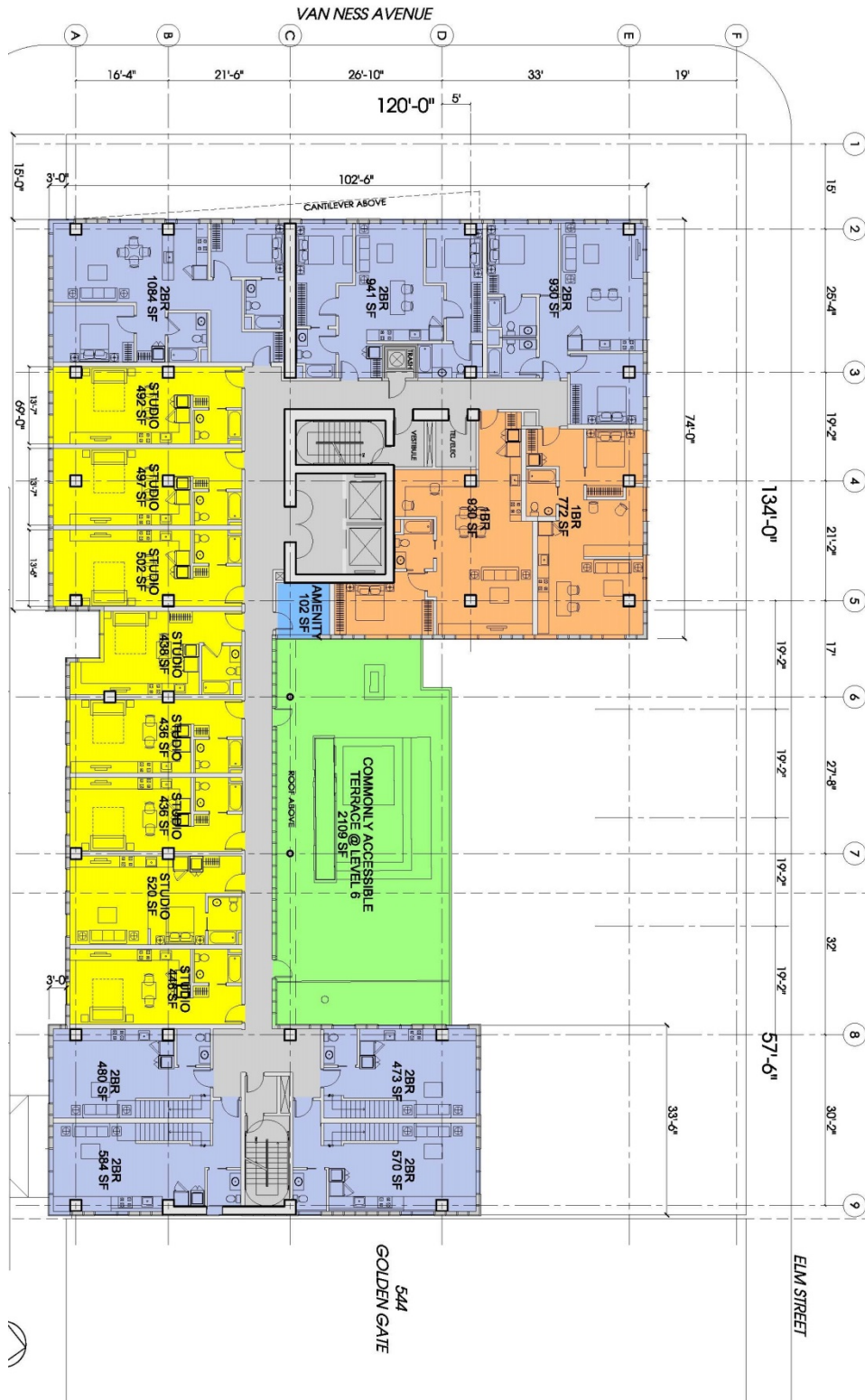


Figure 10: Proposed Seventh Floor Plan



Figure 11: Proposed Eighth Floor Plan

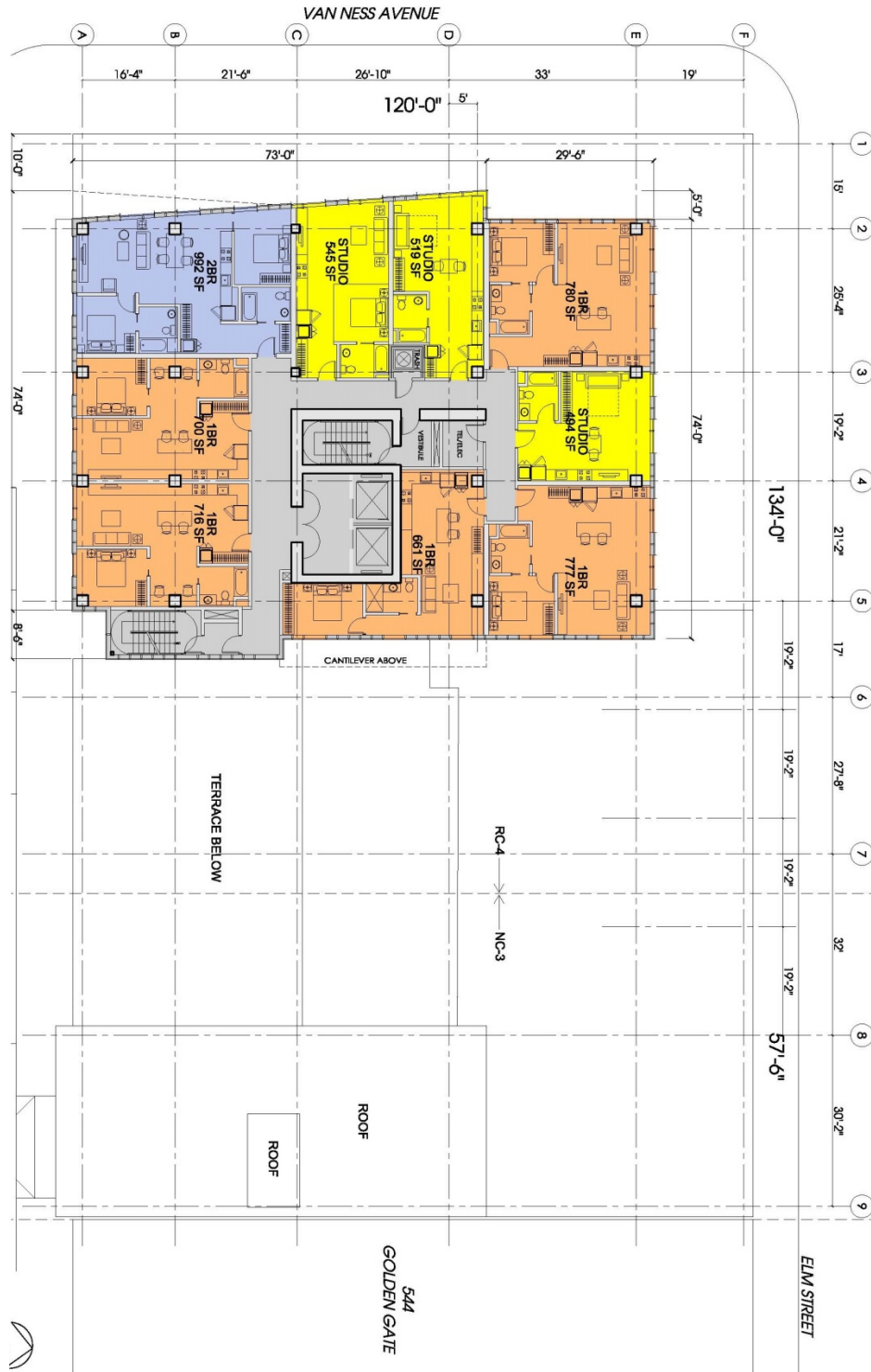


Figure 12: Proposed Ninth Floor Plan



Figure 13: Proposed Tenth Floor Plan

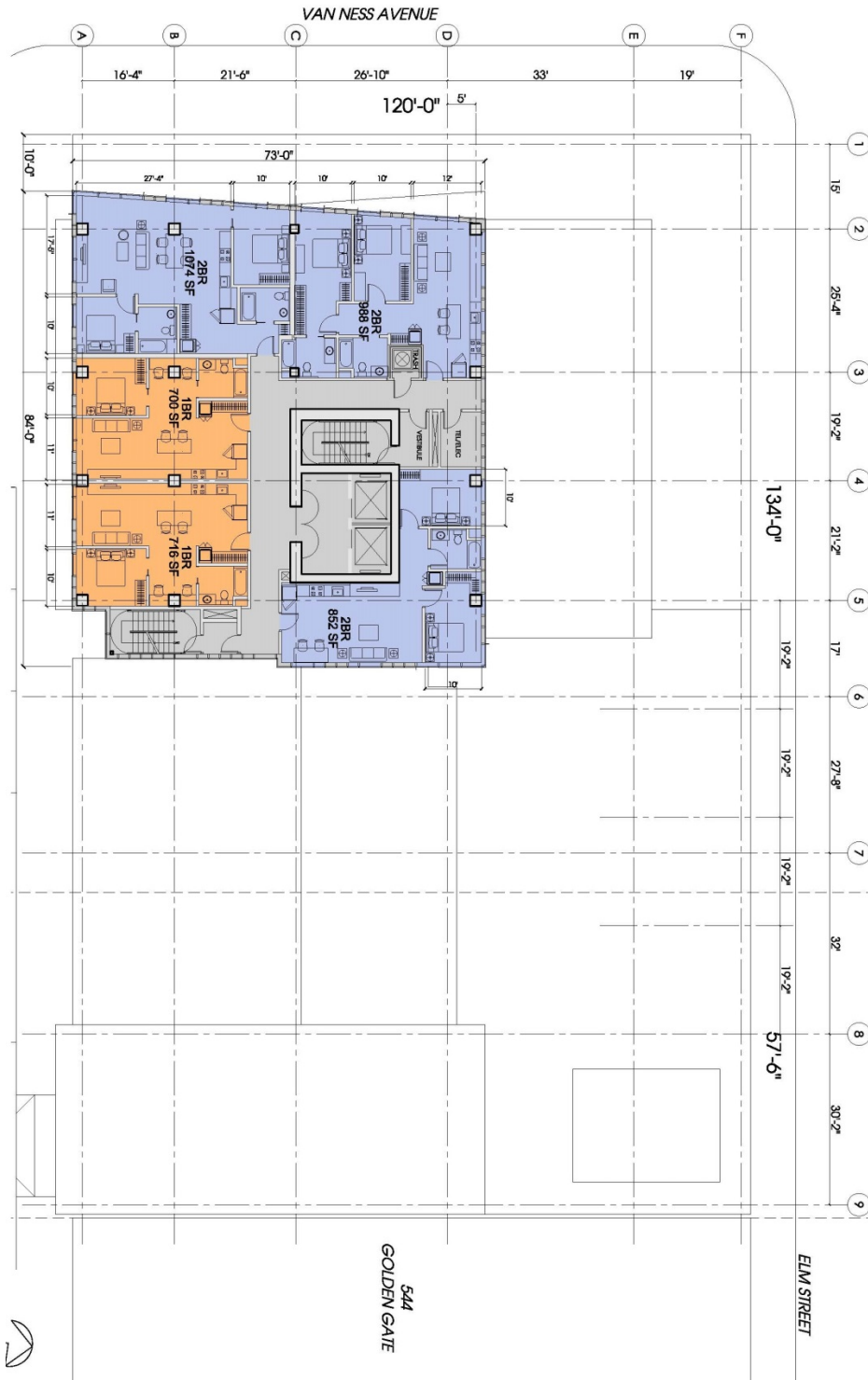


Figure 14: Proposed Eleventh Floor Plan



Figure 15: Proposed Twelfth Floor Plan

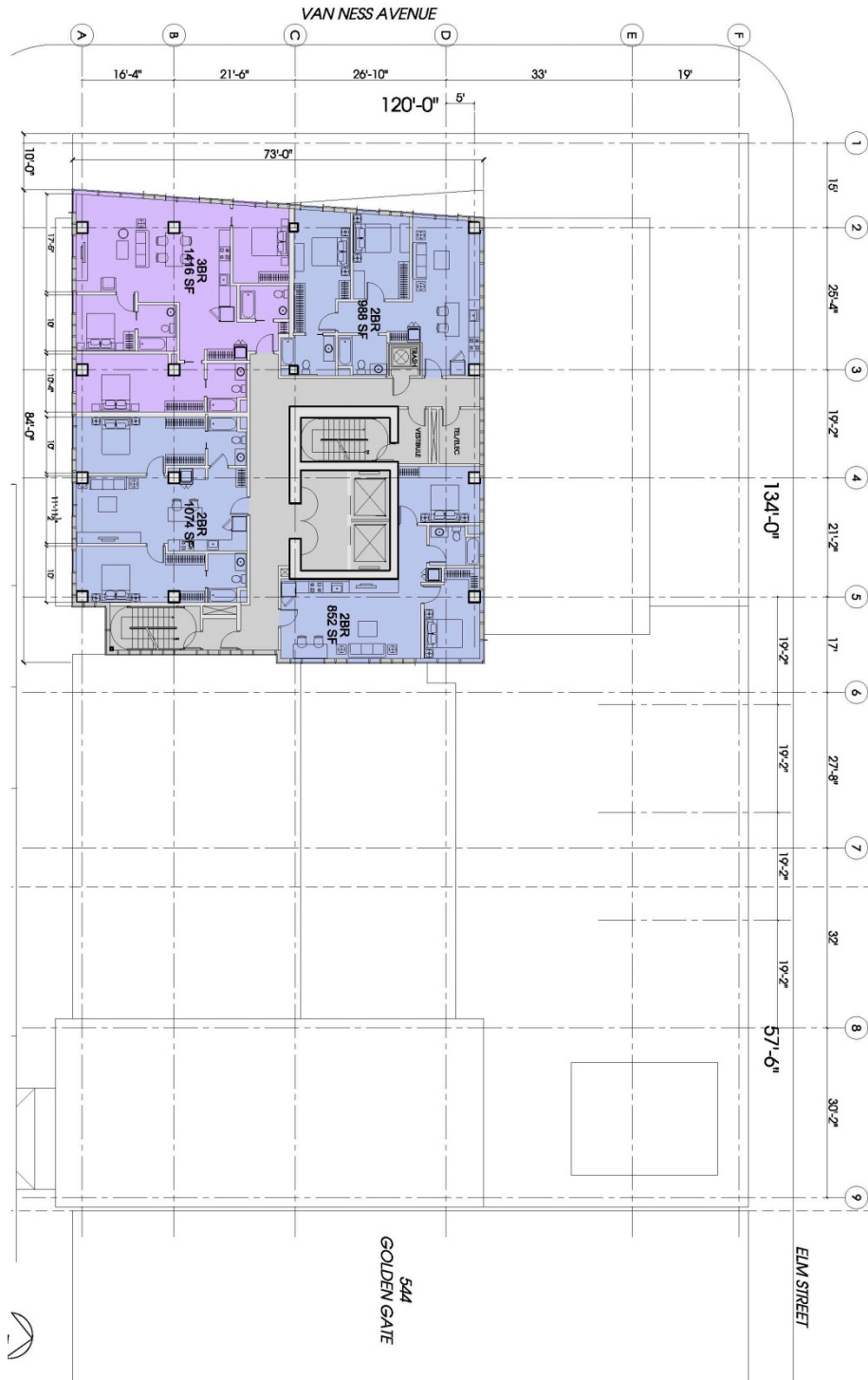


Figure 16: Proposed Roof Plan

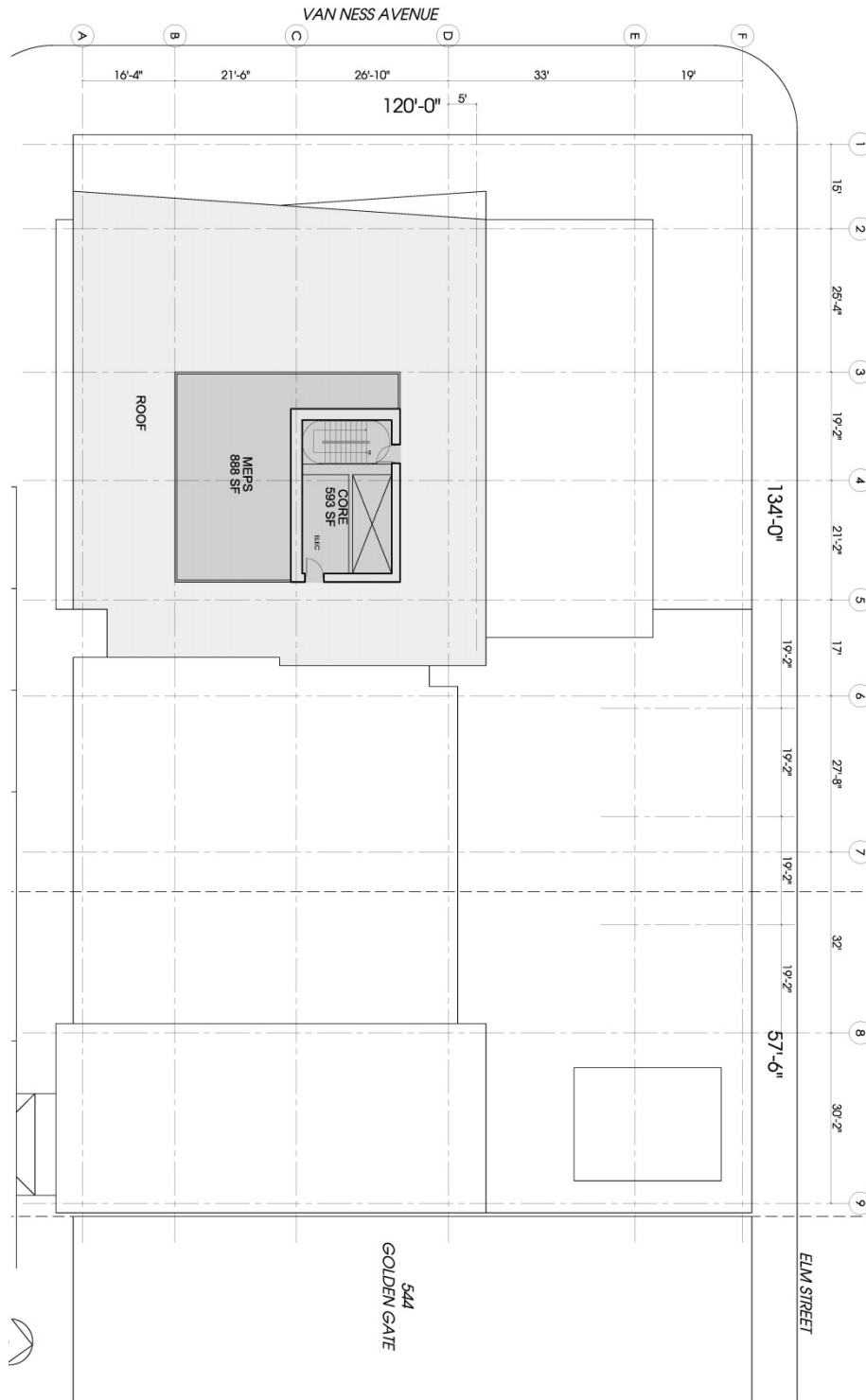


Figure 17: Proposed Van Ness Avenue Elevation



Figure 18: Proposed Golden Gate Avenue Elevation



Figure 19: Proposed Elm Street Elevation



Project Construction

San Francisco Public Works is currently using the project site as a staging area for the construction of Van Ness Bus Rapid Transit project. Staging is anticipated to end in the Autumn of 2019 at which point construction of the proposed project could commence. During the approximately 24-month construction period, the proposed project would require up to twenty-two feet of excavation below ground surface for the proposed basement garage and foundation work, resulting in approximately 17,800 cubic yards of soil disturbance. The proposed building would be supported on a mat slab foundation, and no pile driving is included in the proposed project.

Project Approvals

The proposed project would require the following approvals:

Planning Commission

- Conditional Use Authorization, pursuant to Planning Code Section 253, for the construction of a building taller than 50 feet in an RC District, and, per Planning Code Section 304, for a Planned Unit Development. As a Planned Unit Development the project would obtain the following exceptions to:
 - Exceed the maximum plan dimensions for the site's bulk designation;
 - Provide obstructions over a public right-of-way (Golden Gate Avenue);
 - Exceed the Floor Area Ratio; and
 - Reconfigure the required rear yard.

San Francisco Public Works

- Lot merger;
- Streetscape improvement permit;
- Street space permit for any sidewalk closure for construction staging or construction of pedestrian walkways in the curb lane.

San Francisco Department of Building Inspection (DBI)

- Approval of a Building Permit.

San Francisco Municipal Transportation Agency (SFMTA)

- Special traffic permit for any sidewalk closure for construction or construction staging.

San Francisco Public Utilities Commission (SFPUC)

- Approval of Erosion and Sediment Control Plan (Article 4.1 of the Public Works Code);
- Approval of Stormwater Control Plan (Article 4.2 of the Public Works Code);
- Approval of landscape and irrigation plans (Article 63 of the Administrative Code);
- Approval of Water Budget Application, in conjunction with Department of Public Health (Article 12B of San Francisco Health Code).

San Francisco Department of Public Health (DPH)

- Certification for backup diesel generator (Article 30 of the Health Code);
- Approval of Enhanced Ventilation System (Article 38 of the Health Code);
- Approval of Site Mitigation Plan (Article 22A of the Health Code);
- Approval of Water Budget Application, in conjunction with San Francisco Public Utilities Commission (Article 12B of San Francisco Health Code).

Bay Area Air Quality Management District (BAAQMD)

- Approval of permit to operate backup diesel generator.

B. PROJECT SETTING

The project site is located on the east side of Van Ness Avenue between Elm Street and Golden Gate Avenue. The project site was occupied by a two-story commercial building constructed in 1978 and demolished in February 2017 for the site to be used as a staging area for the construction of Van Ness Bus Rapid Transit (BRT). Van Ness BRT will create center-running transit-only lanes along Van Ness Avenue, signal prioritization for buses, all-door boarding, and elimination of many left turns on Van Ness Avenue. The closest BRT stops to the project site will be located two blocks north at Eddy Street, and one block south at McAllister Street on Van Ness Avenue. The topography of the project site and surrounding area generally slopes downward to the south. North of the project site, across Elm Street, is a three-story school building and campus occupied by the Tenderloin Community School. To the west of the project site, across Van Ness Avenue, is a four-story mixed-use residential building. To the south of the project site, across Golden Gate Avenue, are three commercial buildings, ranging from one to three stories in height. Adjacent to the project site to the east is a two-story commercial building.

The following transit lines are within a quarter-mile of the project site: 19-Polk, 21-Hayes, 31-Balboa, 38R-Geary Rapid, 47-Van Ness, 49-Van Ness/Mission, 5-Fulton, 5R-Fulton Rapid, 7X-Noriega Express and 90-San Bruno OWL. The closest bicycle routes are located along Polk Street, approximately 200 feet from the project site, and Golden Gate Avenue, starting at Polk Street. The nearest regional transit station, Civic Center BART, is approximately four-tenths of a mile from the project site.

The area surrounding the project site is composed of mixed uses including residential, commercial, office and school land uses in buildings ranging in height from one to fifteen stories (approximately 20 to 180 feet tall). Zoning districts in the vicinity of the project site include NC-3 (Neighborhood Commercial, Moderate Scale), RC-4 (Residential-Commercial High Density), P (Public) and C-2 (Community Business). Surrounding parcels are in 130-V, 130-E, 70-X, 80-T and 200-L Height and Bulk Districts.

C. COMPATIBILITY WITH EXISTING ZONING AND PLANS

| | <i>Applicable</i> | <i>Not Applicable</i> |
|---|-------------------------------------|-------------------------------------|
| Discuss any variances, special authorizations, or changes proposed to the Planning Code or Zoning Map, if applicable. | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| Discuss any conflicts with any adopted plans and goals of the City or Region, if applicable. | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| Discuss any approvals and/or permits from City departments other than the Planning Department or the Department of Building Inspection, or from Regional, State, or Federal Agencies. | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

San Francisco Planning Code and Zoning Maps

The Planning Code, which incorporates by reference the City’s Zoning Maps, governs permitted uses, densities, and the configuration of buildings within San Francisco. Permits to construct new buildings (or to alter or demolish existing ones) may not be issued unless: (1) the proposed project complies with the Planning Code, (2) an allowable exception or variance is granted pursuant to the provisions of the Planning Code, or (3) legislative amendments to the Planning Code are included and adopted as part of the proposed project.

Land Use

The project site is located in an RC-4, the Van Ness Special Use District and an NC-3 Zoning District. Pursuant to Planning Code Section 209.3, the RC-4 Zoning District is intended to recognize, protect, conserve, and enhance areas characterized by structures combining residential uses with neighborhood-serving commercial uses. RC-4 Districts provide for a mixture of high-density dwellings with supporting commercial uses. Open spaces are required for dwellings, except that rear yards need not be at ground level and front setback areas are not required. Pursuant to Planning Code Section 243, the Van Ness Special Use District is intended to implement the objectives and policies of the Van Ness Avenue Area Plan, a part of the General Plan, which includes (1) creation of a mix of residential and commercial uses on the boulevard, (2) preservation and enhancement of the pedestrian environment, (3) encouragement of the retention and appropriate alteration of architecturally and historically significant and contributory buildings, (4) conservation of the existing housing stock, (5) enhancement of the visual and urban design quality of the street, and (6) the establishment of an area appropriate for a medical center use to support citywide and regional health care at the transit nexus of Van Ness Avenue and Geary Boulevard. Pursuant to Planning Code Section 712, the NC-3 Zoning District

is intended in most cases to offer a wide variety of comparison and specialty goods and services to a population greater than the immediate neighborhood, additionally providing convenience goods and services to the surrounding neighborhoods. NC-3 Districts are linear districts located along heavily trafficked thoroughfares which also serve as major transit routes. NC-3 building standards permit moderately large commercial uses and buildings. Rear yards are protected at residential levels. A diversified commercial environment is encouraged for the NC-3 District, and a wide variety of uses are permitted with special emphasis on neighborhood-serving businesses. Pursuant to Planning Code Tables 209.3 and 712, the proposed residential and ground-floor retail uses are principally permitted in RC-4 and NC-3 Districts.

Height and Bulk

The project site is located in a 130-V and a 130-E Height and Bulk District, which permits a maximum building height of 130 feet. Bulk controls reduce the size of a building's floorplates as the building increases in height. Pursuant to Planning Code Section 270(a), a "V" Bulk District, bulk is regulated above the fifty feet in height along Van Ness Avenue. At a height of 129 feet and eight inches, the proposed project complies with the 130-foot height limit.

Floor Area Ratio

Pursuant to Planning Code Sections 124(a) the basic FAR shall be 3.6 to 1 for non-residential uses on the portion of the property within the NC-3 District. The project proposes a total of 1,374 gross square feet of non-residential uses within the NC-3 District and complies with this requirement. Pursuant to Planning Code Sections 124(d) and 243, the basic FAR shall be 7.0 to 1 for *both* residential and non-residential uses on the portion of the property within the Van Ness Special Use District. The project proposes a total of 24,840 gross square feet of combined uses on the 16,080-square-foot portion of the project site within the Van Ness Special Use District. Therefore, the project is seeking a modification to this requirement as a Planned Unit Development per Planning Code Section 304.

Conditional Use Authorization

Pursuant to Planning Code Section 253, new construction of a building greater than 50 feet in an RC District height requires Conditional Use Authorization by the Planning Commission. Since the project site is 129-feet-eight-inches in size, and is located in an RC-4 District, the proposed mixed-use development requires Conditional Use Authorization. Pursuant to Planning Code Section 304, the proposed project is also pursuing approval as a Planned Unit Development (PUD), which the Planning Commission approves as a Conditional Use Authorization. The Planning Commission would consider both actions under a single Conditional Use Authorization vote

Plans and Policies

San Francisco General Plan

The *San Francisco General Plan (General Plan)* establishes objectives and policies to guide land use decisions related to the physical development of San Francisco. It is comprised of ten elements, each of which addresses a particular topic that applies citywide: Air Quality; Arts; Commerce and Industry; Community Facilities; Community Safety; Environmental Protection; Housing; Recreation and Open Space; Transportation; and Urban Design. Any conflict between the proposed project and policies that relate to physical environmental issues are discussed in Section E, Evaluation of Environmental Effects. The compatibility of the proposed project with *General Plan* policies that do not relate to physical environmental issues will be considered by decision-makers as part of their decision whether to approve or disapprove the proposed project.

Proposition M – The Accountable Planning Initiative

In November 1986, the voters of San Francisco approved Proposition M, the Accountable Planning Initiative, which added Section 101.1 to the Planning Code and established eight Priority Policies. These policies, and the topics in Section E, Evaluation of Environmental Effects, that address the environmental issues associated with these policies, are: (1) preservation and enhancement of neighborhood-serving retail uses; (2) protection of neighborhood character (Question 1c, Land Use and Land Use Planning); (3) preservation and enhancement of affordable housing (Question 3b, Population and Housing, regarding housing supply and displacement issues); (4) discouragement of commuter automobiles (Questions 4a, 4b, 4f, and 4g, Transportation and Circulation); (5) protection of industrial and service land uses from commercial office development and enhancement of resident employment and business ownership (Question 1c, Land Use and Land Use Planning); (6) maximization of earthquake preparedness (Questions 13a through 13d, Geology and Soils); (7) landmark and historic building preservation (Question 3a, Cultural Resources); and (8) protection of open space (Questions 8a and 8b, Wind and Shadow, and Questions 9a and 9c, Recreation).

Prior to issuing a permit for any project that requires an Initial Study under CEQA, and prior to issuing a permit for any demolition, conversion, or change of use, and prior to taking any action that requires a finding of consistency with the *General Plan*, the City is required to find that the proposed project or legislation would be consistent with the Priority Policies.

As noted above, the compatibility of the proposed project with *General Plan* objectives and policies that do not relate to physical environmental issues will be considered by decision-makers as part of their decision whether to approve or disapprove the proposed project. Any potential conflicts identified as part of that process would not alter the physical environmental effects of the proposed project.

Regional Plans and Policies

The five principal regional planning agencies and their overarching policy-plans to guide planning in the nine-county bay area include the Association for Bay Area Governments' *Projections 2013* and *Plan Bay Area*, the Bay Area Air Quality Management District's (BAAQMD's) *Bay Area 2017 Clean Air Plan (2017 Clean Air Plan)*, the Metropolitan Transportation Commission's

Regional Transportation Plan – Transportation 2035, the San Francisco Regional Water Quality Control Board’s *San Francisco Basin Plan*, and the San Francisco Bay Conservation and Development Commission’s *San Francisco Bay Plan*. Due to the size and nature of the proposed project, no anticipated conflicts with regional plans would occur.

Required Approvals by Other Agencies

See pages 22 and 23 for a list of required approvals.

D. SUMMARY OF ENVIRONMENTAL EFFECTS

The proposed project could potentially affect the environmental factor(s) checked below. The following pages present a more detailed checklist and discussion of each environmental factor.

- | | | |
|---|--|--|
| <input type="checkbox"/> Land Use/Planning | <input type="checkbox"/> Greenhouse Gas Emissions | <input type="checkbox"/> Hydrology/Water Quality |
| <input type="checkbox"/> Aesthetics | <input type="checkbox"/> Wind and Shadow | <input type="checkbox"/> Hazards & Hazardous Materials |
| <input type="checkbox"/> Population and Housing | <input type="checkbox"/> Recreation | <input type="checkbox"/> Mineral/Energy Resources |
| <input type="checkbox"/> Cultural Resources | <input type="checkbox"/> Utilities/Service Systems | <input type="checkbox"/> Agriculture and Forestry Resources |
| <input type="checkbox"/> Transportation and Circulation | <input type="checkbox"/> Public Services | <input checked="" type="checkbox"/> Mandatory Findings of Significance |
| <input type="checkbox"/> Noise | <input type="checkbox"/> Biological Resources | |
| <input checked="" type="checkbox"/> Air Quality | <input type="checkbox"/> Geology/Soils | |

This Initial Study examines the proposed project to identify potential effects on the environment. For each item on the Initial Study checklist, the evaluation has considered the impacts of the proposed project both individually and cumulatively. All items on the Initial Study Checklist that have been checked "Less than Significant Impact with Mitigation Incorporated," "Less than Significant Impact," "No Impact" or "Not Applicable" indicate that, upon evaluation, staff has determined that the proposed project could not have a significant adverse environmental effect relating to that issue. A discussion is included for those issues checked "Less than Significant Impact with Mitigation Incorporated" and "Less than Significant Impact" and for most items checked with "No Impact" or "Not Applicable." For items checked "No Impact" or "Not Applicable" without discussion, the conclusions regarding potential significant adverse environmental effects are based upon field observation, staff experience and expertise on similar projects, and/or standard reference material available within the Planning Department, such as the *Transportation Impact Analysis Guidelines for Environmental Review* or the California Natural Diversity Data Base and maps, published by the California Department of Fish and Wildlife. For each checklist item, the evaluation has considered the impacts of the proposed project both individually and cumulatively. The items checked above have been determined to be "Less than Significant with Mitigation Incorporated."

SENATE BILL 743

Aesthetics and Parking

In accordance with CEQA Section 21099 – Modernization of Transportation Analysis for Transit Oriented Projects – aesthetics and parking shall not be considered in determining if a project has the potential to result in significant environmental effects, provided the project meets all of the following three criteria:

- a) The project is in a transit priority area;
- b) The project is on an infill site; and
- c) The project is residential, mixed-use residential, or an employment center.

The proposed project meets each of the above criteria; therefore this Initial Study does not consider aesthetics and the adequacy of parking in determining the significance of project impacts under CEQA.¹ Project elevations are included in the project description (see Figure 18, Golden Gate Avenue Elevation, Figure 17, Van Ness Avenue Elevation and Figure 19, Elm Street Elevation).

Automobile Delay and Vehicle Miles Traveled

In addition, CEQA Section 21099(b)(1) requires that the State Office of Planning and Research (OPR) develop revisions to the CEQA Guidelines establishing criteria for determining the significance of transportation impacts of projects that “promote the reduction of greenhouse gas emissions, the development of multimodal transportation networks, and a diversity of land uses.” CEQA Section 21099(b)(2) states that upon certification of the revised guidelines for determining transportation impacts pursuant to Section 21099(b)(1), automobile delay, as described solely by level of service or similar measures of vehicular capacity or traffic congestion shall not be considered a significant impact on the environment under CEQA.

In January 2016, OPR published for public review and comment a *Revised Proposal on Updates to the CEQA Guidelines on Evaluating Transportation Impacts in CEQA*² recommending that transportation impacts for projects be measured using a vehicle miles traveled (VMT) metric. On March 3, 2016, in anticipation of the future certification of the revised CEQA Guidelines, the San Francisco Planning Commission adopted OPR’s recommendation to use the VMT metric instead of automobile delay to evaluate the transportation impacts of projects (Resolution 19579). (Note: the VMT metric does not apply to the analysis of project impacts on non-automobile modes of travel such as riding transit, walking, and bicycling.) A VMT and induced automobile travel impact analysis is provided in the Transportation section.

¹ San Francisco Planning Department, *Eligibility Checklist: CEQA Section 21099 – Modernization of Transportation Analysis for 600 Van Ness Avenue*, September 12, 2017. This document (and all other documents cited in this report, unless otherwise noted), is available for review at the San Francisco Planning Department, 1650 Mission Street, Suite 400 as part of Case File No. 2014.1058E.

² This document is available online at: https://www.opr.ca.gov/s_sb743.php. Accessed June 30, 2016.

E. EVALUATION OF ENVIRONMENTAL EFFECTS

| Topics: | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|---|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 1. LAND USE AND PLANNING.— Would the project: | | | | | |
| a) Physically divide an established community? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Impact LU-1: The proposed project would not physically divide an established community. (Less than Significant)

The division of an established community typically involves the construction of a physical barrier to neighborhood access, such as a new freeway, or the removal of a means of access, such as a bridge or a roadway. Implementation of the proposed project would not result in the construction of a physical barrier to neighborhood access or the removal of an existing means of access; it would result in the construction of a new thirteen-story, 129-foot-8-inch-tall building within established lot boundaries. The proposed project would not alter the established street grid or permanently close any streets or sidewalks. Although portions of the sidewalk adjacent to the project site could be closed for periods of time during project construction, these closures would be temporary in nature. Therefore, the proposed project would not physically divide an established community and a less-than-significant impact would result.

Impact LU-2: The proposed project would not conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to, the general plan, specific plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect. (Less than Significant)

Land use impacts would be considered significant if the proposed project would conflict with any plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect. Environmental plans and policies are those, like the Bay Area Air Quality Management District’s (BAAQMD) *2017 Clean Air Plan*, which directly address environmental issues and/or contain targets or standards that must be met in order to preserve or improve characteristics of the City’s physical environment. The proposed project would not substantially conflict with any applicable land use plan, policy, or regulation such that an adverse physical change would result (see Section C, Compatibility with Existing Zoning and Plans). Furthermore, the proposed project would not conflict with the *San Francisco General Plan* policies that relate to physical environmental issues.

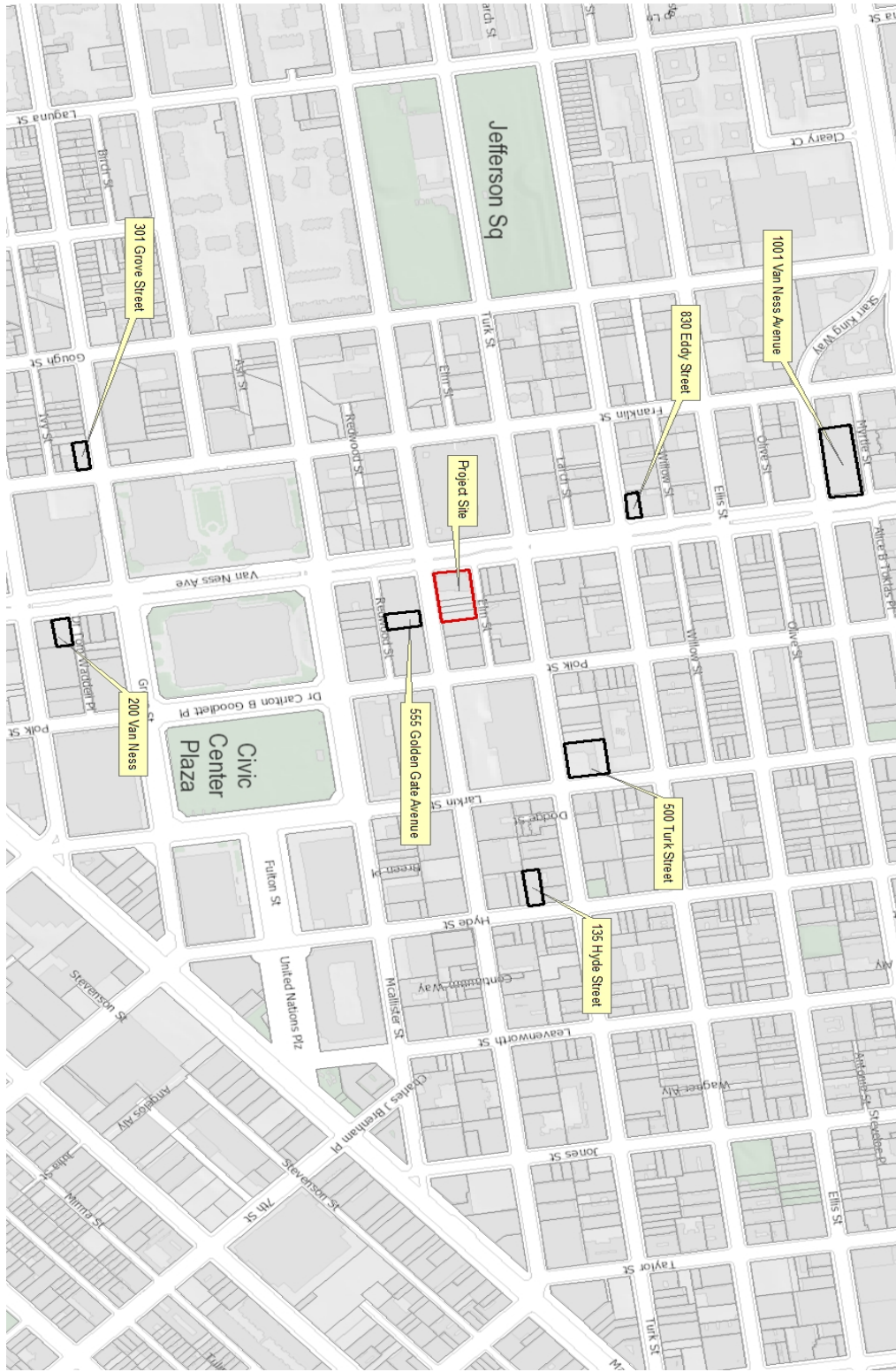
The proposed project would not conflict with any such adopted environmental plan or policy, including the *2017 Clean Air Plan*, the *Strategies to Address Greenhouse Gas Emissions* (GHG Reduction Strategy), and the City's Urban Forestry Ordinance, as discussed in Section E.6, Air Quality, E.7, Greenhouse Gas Emissions, and Section E.12, Biological Resources. Therefore, the proposed project would have a less-than-significant impact with regard to conflicts with land use plans, policies, or regulations.

Impact C-LU-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative land use impact. (Less than Significant)

The cumulative context for land use effects are typically within the immediate vicinity of the project site, or at the neighborhood level. Cumulative development in the project vicinity (within a quarter-mile radius of the project site) includes the following projects for which the Planning Department has an Environmental Evaluation Application on file (see also Figure 20):

- 1001 Van Ness Avenue (Case No. 2014-000037ENV) – the project involves the construction of a four-story, three-unit residential building on a vacant lot.
- 830 Eddy Street (Case No. 2015-009460ENV) – the project involves the construction of a new 12-story, 126-unit, 119,050 gsf residential building.
- 500 Turk Street (Case No. 2016-010340ENV) – the project involves the demolition of the existing building and construction of an eight-story residential building with ground floor commercial space, community amenity spaces, and a 5,150 square foot on-grade planted courtyard, garden, and play space.
- 135 Hyde Street (Case No. 2015-015203E) – the project involves the conversion of an existing auto repair shop, through a vertical addition, to a residential building with commercial space on the first floor.
- 200 Van Ness Avenue (Case No. 2015-012994ENV) – the project proposes to create a total of 17 residential units (one 3-bedroom unit, seven 2 bedroom units, four 1-bedroom units, and five studios).
- 301 Grove Street (Case No. 2015-015133ENV) – the project consists of additions and alterations to an existing two-story commercial building, which would include a three-story vertical addition with nine dwelling units.
- 555 Golden Gate Avenue (Case No. 2014-1102ENV) – the project consists of the demolition of the existing two-story commercial building and construction of a 10-story, 121-foot tall mixed-use building with 52 dwelling units.

Figure 20. Cumulative Projects



| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|---|---|---|---|--------------------------|---------------------------|
| 2. POPULATION AND HOUSING.— | | | | | |
| Would the project: | | | | | |
| a) Induce substantial population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Displace substantial numbers of existing housing units, necessitating the construction of replacement housing? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Impact PH-1: The proposed project would not induce substantial population growth in an area, either directly or indirectly. (Less than Significant)

The proposed project would include the construction of an infill development consisting of approximately 6,241 square feet of commercial space on the ground floor with 168 dwelling units above. The project would be located in an urbanized area and would not be expected to substantially alter existing development patterns in the Downtown/Civic Center neighborhood, or in San Francisco as a whole. Since the project site is located in an established urban neighborhood, it would not require, or create new demand for, the extension of municipal infrastructure.

According to the 2015 America Communities Survey, the proposed project is located within Census Tract 124.02, which had a reported population of 5,191 residents. The 2010 U.S. Census reported a population of 805,235 residents in the City and County of San Francisco, and a population of approximately 10,340 residents within the Downtown/Civic Center neighborhood.³ Based on the average household size in the City and County of San Francisco of 2.26 people per household, the addition of 168 new residential units, as the project proposes, would increase the citywide population by approximately 295 residents. This would represent a residential population increase of approximately 0.05 percent citywide, which is not considered to be substantial within the citywide context.

Based on the size of the proposed commercial space, the new business would employ a total of approximately 18 staff at the proposed building once it is completed.⁴ This amount of retail is not

³ The following Census Tracts are located in the Downtown/Civic Center neighborhood: 120, 121, 122.01, 122.02, 123.01, 123.02, 125.01, 125.02, 124.01, 124.02, and portions of 160 and 162.

⁴ Based on the Planning Department's *Transportation Impact Analysis Guidelines for Environmental Review*, one employee is assumed per 350 square feet of retail space.

anticipated to attract new employees to San Francisco. Therefore, it can be anticipated that most of the employees would live in San Francisco (or nearby communities), and that the project would thus not generate demand for new housing for the potential commercial employees. In light of the above, additional population and employees associated with the project would have a less-than-significant impact related to population growth, both directly and indirectly.

Impact PH-2: The proposed project would not displace substantial numbers of existing housing units or people, necessitating the construction of replacement housing. (Less than Significant)

As the project site is currently vacant, the proposed project would not displace any residents or housing units. Therefore, the proposed project would have a less-than-significant impact related to the displacement of housing units or people and would not necessitate the construction of replacement housing.

Impact C-PH-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact related to population and housing. (Less than Significant)

The cumulative context for population and housing effects are typically citywide. Over the last several years, the supply of housing has not met the demand for housing within San Francisco. In July 2013, the Association of Bay Area Governments (ABAG) projected regional housing needs in the *Regional Housing Need Plan for the San Francisco Bay Area: 2014–2022*. The jurisdictional need of San Francisco for 2014–2022 is 28,869 dwelling units consisting of 6,234 dwelling units within the very low income level (0–50 percent); 4,639 units within the low income level (51–80 percent); 5,460 units within the moderate income level (81–120 percent); and 12,536 units within the above moderate income level (120 percent plus).⁵ These numbers are consistent with the development pattern in the region’s *Plan Bay Area 2040: Sustainable Communities Strategy* (Plan Bay Area), a state-mandated, integrated long-range transportation, land use, and housing plan.⁶ As part of the planning process for *Plan Bay Area*, San Francisco identified Priority Development Areas (PDA), which are areas where new development will support the day-to-day needs of residents and workers in a pedestrian-friendly environment served by transit. The project site is located within the Downtown/Van Ness/Geary PDA. Therefore, although the proposed project, in combination with other past, present, and reasonably foreseeable future projects, would increase the population in the area, it would not induce substantial population growth, as this population growth is anticipated occur irrespective of the proposed project. The project’s 168 units would serve to meet San Francisco’s anticipated housing needs.

⁵ ABAG, *Regional Housing Need Plan for the San Francisco Bay Area: 2014 – 2022*, July 2013. Online: http://www.abag.ca.gov/planning/housingneeds/pdfs/2014-22_RHNA_Plan.pdf. Accessed on June 28, 2016.

⁶ Metropolitan Transportation Commission and ABAG, *Plan Bay Area*, 2040. Online: <https://tinyurl.com/ybmssyxr>. Accessed January 8, 2018.

For these reasons, the proposed project, in combination with other past, present, and reasonably foreseeable future projects, would not result in a cumulatively considerable population and housing impact.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|---|---------------------------------------|---|-------------------------------------|-------------------------------------|--------------------------|
| 3. CULTURAL RESOURCES.—Would the project: | | | | | |
| a) Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5, including those resources listed in Article 10 or Article 11 of the San Francisco Planning Code? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Disturb any human remains, including those interred outside of formal cemeteries? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) Cause a substantial adverse change in the significance of a tribal cultural resource as defined in Public Resources Code §21074? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Impact CR-1: The proposed project would not cause a substantial adverse change in the significance of a historical resource. (No Impact)

Historical resources are those properties that meet the definitions in Section 21084.1 of the CEQA statute and Section 15064.5 of the CEQA Guidelines. Historical resources include properties listed in, or formally determined eligible for listing in, the California Register of Historical Resources (California Register) or in an adopted local historic register. Historical resources also include resources identified as significant in a historical resource survey meeting certain criteria. Additionally, properties that are not listed but are otherwise determined to be historically significant, based on substantial evidence, would also be considered historical resources. The significance of a historical resource is materially impaired when a project “demolishes or materially alters in an adverse manner those physical characteristics of a historical resource that convey its historical significance.”

The project site is currently a surface parking lot with no structures. It is not located in a current or eligible historic district. Therefore, the proposed project would have no impact on the significance of an historical resource.

Impact CR-2: The proposed project may result in a substantial adverse change in the significance of an archeological resource. (Less than Significant)

Determining the potential for encountering archeological resources includes relevant factors such as the location, depth, and amount of excavation proposed as well as any recorded information

on known resources in the area. Construction of the proposed project would require excavation to a depth of 22 feet below ground surface and the removal of approximately 17,800 cubic yards of soil. The project vicinity has low sensitivity for prehistoric archeological resources based on distribution of previously recorded archeological sites and the distance from the shoreline. No previously recorded archeological resources are within the project site or the immediate vicinity. Review of historical maps and archival research did not identify development on the project site until the late 19th century.⁷ Therefore, there is low potential for significant archeological features to be disturbed by project activities and the effect of the proposed project on archeological resources would be less than significant.

Impact CR-3: The project may disturb human remains, including those interred outside of formal cemeteries. (Less than Significant)

As discussed under CR-2, above, the project vicinity has low sensitivity for prehistoric archeological resources based on distribution of previously recorded archeological sites and the distance from the shoreline.

The treatment of human remains and of associated or unassociated funerary objects discovered during any soils disturbing activity shall comply with applicable State and Federal Laws, including immediate notification of the Coroner of the City and County of San Francisco and in the event of the Coroner's determination that the human remains are Native American remains, notification of the California State Native American Heritage Commission who shall appoint a Most Likely Descendant (Pub. Res. Code Sec. 5097.98). State regulations shall be followed including the reinterment of the human remains and associated burial objects with appropriate dignity on the property in a location not subject to further subsurface disturbance (Pub. Res. Code Sec. 5097.98).

Therefore, as there is low potential for significant human remains to be disturbed by project activities and as any human remains discovered as a result of the proposed project would be handled and reinterred consistent with local, State and Federal law, the effect of the proposed project on human remains would be less than significant.

Impact CR-4: The proposed project may cause a substantial adverse change in the significance of a tribal cultural resource. (Less than Significant)

Tribal cultural resources are those resources that meet the definitions in Public Resources Code Section 21074. Tribal cultural resources are defined as sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are also either (a) included or determined to be eligible for inclusion in the California Register of Historical Resources or (b) included in a local register of historical resources as defined in Public Resources Code Section 5020.1(k). Based on discussions with Native American tribal

⁷ SF Planning Department, *Environmental Planning Preliminary Archeological Review 600 Van Ness*, November 29, 2017.

representatives, in San Francisco, prehistoric archeological resources are presumed to be potential tribal cultural resources. A tribal cultural resource is adversely affected when a project impacts its significance.

Pursuant to Assembly Bill 52, effective July 1, 2015, within 14 days of a determination that an application for a project is complete or a decision by a public agency to undertake a project, the lead agency is required to contact the Native American tribes that are culturally or traditionally affiliated with the geographic area in which the project is located. Notified tribes have 30 days to request consultation with the lead agency to discuss potential impacts on tribal cultural resources and measures for addressing those impacts.

On November 30, 2017, the Planning Department mailed a "Tribal Notification Regarding Tribal Cultural Resources and CEQA" to the appropriate Native American tribal representatives who have requested notification. During the 30-day comment period, no Native American tribal representatives contacted the Planning Department to request consultation.

As discussed under Impact CR-2, above, generally, the project vicinity has low sensitivity for prehistoric archeological resources based on distribution of previously recorded archeological sites and the distance from the shoreline. As discussed under Impact CR-3 above, the treatment of any human remains and of associated or unassociated funerary objects discovered during any soils disturbing activity shall comply with applicable State and Federal Laws, including immediate notification of the Coroner of the City and County of San Francisco and in the event of the Coroner's determination that the human remains are Native American remains, notification of the California State Native American Heritage Commission.

Therefore, given the above, the effect of the proposed project on Tribal Cultural Resources would be less than significant.

Impact C-CR-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in cumulative impacts on cultural resources. (Less than Significant)

As discussed above, the proposed project would have no effect on historic architectural resources and would thus not have the potential to contribute to any cumulative effects on such resources. Cumulative impacts on archeological resources and human remains are site-specific and generally limited to the immediate construction area. For these reasons, the proposed project, in combination with other past, present, and reasonably foreseeable future projects, would not result in a cumulatively considerable impact on archeological resources, tribal cultural resources, and human remains.

| <i>Topics:</i> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|---|---------------------------------------|---|-------------------------------------|--------------------------|-------------------------------------|
| 4. TRANSPORTATION AND CIRCULATION— Would the project: | | | | | |
| a) Conflict with an applicable plan, ordinance or policy establishing measures of effectiveness for the performance of the circulation system, taking into account all modes of transportation including mass transit and non-motorized travel and relevant components of the circulation system, including but not limited to intersections, streets, highways and freeways, pedestrian and bicycle paths, and mass transit? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Conflict with an applicable congestion management program, including but not limited to level of service standards and travel demand measures, or other standards established by the county congestion management agency for designated roads or highways? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| d) Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) Result in inadequate emergency access? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| f) Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

The project site is not within an airport land use plan area, or in the vicinity of a private airstrip, and would not interfere with air traffic patterns. Therefore, topic 4c is not applicable.

PROJECT SETTING

The project site is located on the east side of Van Ness Avenue between Elm Street and Golden Gate Avenue. The project site is currently vacant and is being used as a staging area for the construction of Van Ness Bus Rapid Transit (BRT). Van Ness BRT will create center-running transit-only lanes along Van Ness Avenue, signal prioritization for buses, all-door boarding, and elimination of many left turns on Van Ness Avenue. The closest BRT stops to the project site will be located two blocks north at Eddy Street, and one block south at McAllister Street on Van Ness Avenue. The topography of the project site and surrounding area generally slopes downward to the south. Immediately north of the project site, across Elm Street, is a three-story school building and campus occupied by the Tenderloin Community School. To the west of the project site,

across Van Ness Avenue, is a four-story mixed-use residential building. Adjacent to the project site to the west is a two-story commercial building. The project site is served by the following public transit lines: 19-Polk, 21-Hayes, 31-Balboa, 38R-Geary Rapid, 47-Van Ness, 49-Van Ness/Mission, 5-Fulton, 5R-Fulton Rapid, 7X-Noriega Express and 90-San Bruno OWL. Van Ness Avenue is a commercial throughway with transit importance. There are bicycle routes located along Polk Street and Golden Gate Avenue in proximity to the project site. In front of the project site, Van Ness Avenue contains three southbound lanes and three northbound lanes, which are separated by a median. Civic Center BART station is approximately four-tenths of a mile from the project site. The area surrounding the project site is composed of mixed uses including residential, commercial, office and school land uses in buildings ranging in height from one to fifteen stories (approximately 20 to 180 feet tall).

Vehicle Miles Traveled in San Francisco and Bay Area

Many factors affect travel behavior. These factors include density, diversity of land uses, design of the transportation network, access to regional destinations, distance to high-quality transit, development scale, demographics, and transportation demand management. Typically, low-density development at great distance from other land uses, located in areas with poor access to non-private vehicular modes of travel, generate more automobile travel compared to development located in urban areas, where a higher density, mix of land uses, and travel options other than private vehicles are available.

Given these travel behavior factors, San Francisco has a lower vehicle miles traveled (VMT) ratio than the nine-county San Francisco Bay Area region. In addition, some areas of the City have lower VMT ratios than other areas of the City. These areas of the City can be expressed geographically through transportation analysis zones. Transportation analysis zones are used in transportation planning models for transportation analysis and other planning purposes. The zones vary in size from single city blocks in the downtown core, multiple blocks in outer neighborhoods, to even larger zones in historically industrial areas like the Hunters Point Shipyard.

The San Francisco County Transportation Authority (Transportation Authority) uses the San Francisco Chained Activity Model Process (SF-CHAMP) to estimate VMT by private automobiles and taxis for different land use types. Travel behavior in SF-CHAMP is calibrated based on observed behavior from the California Household Travel Survey 2010-2012, Census data regarding automobile ownership rates and county-to-county worker flows, and observed vehicle counts and transit boardings. SF-CHAMP uses a synthetic population, which is a set of individual actors that represents the Bay Area's actual population, who make simulated travel decisions for a complete day. The Transportation Authority uses tour-based analysis for residential uses, which examines the entire chain of trips over the course of a day, not just trips to and from a project. For retail uses, the Transportation Authority uses trip-based analysis, which

counts VMT from individual trips to and from the project (as opposed to entire chain of trips). A trip-based approach, as opposed to a tour-based approach, is necessary for retail projects because a tour is likely to consist of trips stopping in multiple locations, and the summarizing of tour VMT to each location would over-estimate VMT.^{8,9}

For residential development, the existing regional average daily VMT per capita is 17.2.¹⁰ For retail development, existing regional average daily work-related VMT per employee is 14.9.

San Francisco 2040 cumulative conditions were projected using a SF-CHAMP model run, using the same methodology as outlined above for existing conditions, but includes residential and job growth estimates and reasonably foreseeable transportation investments through 2040. For residential development, the projected 2040 regional average daily VMT per capita is 16.1. For retail development, regional average daily retail VMT per employee is 14.6. See Table 1, Daily Vehicle Miles Traveled, which includes existing and cumulative VMT for the region and for the transportation analysis zone (TAZ) in which the project site is located, 648.

TABLE 1: DAILY VEHICLE MILES TRAVELED

| <u>Land Use</u> | <u>Existing</u> | | | <u>Cumulative 2040</u> | | |
|--------------------------|----------------------------------|--|----------------|----------------------------------|--|----------------|
| | <u>Bay Area Regional Average</u> | <u>Bay Area Regional Average minus 15%</u> | <u>TAZ 648</u> | <u>Bay Area Regional Average</u> | <u>Bay Area Regional Average minus 15%</u> | <u>TAZ 648</u> |
| Households (Residential) | 17.2 | 14.6 | 2.3 | 16.1 | 13.7 | 2.0 |
| Employment (Retail) | 14.9 | 12.6 | 7.8 | 14.6 | 12.4 | 7.8 |

VEHICLE MILES TRAVELED IMPACT ANALYSIS METHODOLOGY

Vehicle Miles Traveled Analysis

Land use projects may cause substantial additional VMT. The following identifies thresholds of significance and screening criteria used to determine if a land use project would result in significant impacts under the VMT metric.

⁸ To state another way: a tour-based assessment of VMT at a retail site would consider the VMT for all trips in the tour, for any tour with a stop at the retail site. If a single tour stops at two retail locations, for example, a coffee shop on the way to work and a restaurant on the way back home, both retail locations would be allotted the total tour VMT. A trip-based approach allows us to apportion all retail-related VMT to retail sites without double-counting.

⁹ San Francisco Planning Department, Executive Summary: Resolution Modifying Transportation Impact Analysis, Appendix F, Attachment A, March 3, 2016.

¹⁰ Includes the VMT generated by the households in the development.

Residential and Retail Projects

For residential projects, a project would generate substantial additional VMT if it exceeds the regional household VMT per capita minus 15 percent.¹¹ As documented in the OPR's *Revised Proposal on Updates to the CEQA Guidelines on Evaluating Transportation Impacts in CEQA* ("Proposed Transportation Impact Guidelines"), a 15 percent threshold below existing development is "both reasonably ambitious and generally achievable."¹² For retail projects, the Planning Department uses a VMT efficiency metric approach: a project would generate substantial additional VMT if it exceeds the regional VMT per retail employee minus 15 percent. This approach is consistent with CEQA Section 21099 and the thresholds of significance for other land uses recommended in OPR's Proposed Transportation Impact Guidelines. For mixed-use projects, each proposed land use is evaluated independently, per the significance criteria described above.

OPR's Proposed Transportation Impact Guidelines provides screening criteria to identify types, characteristics, or locations of land use projects that would not exceed these VMT thresholds of significance. OPR recommends that if a project or land use proposed as part of the project meet any of the screening criteria, then VMT impacts are presumed to be less than significant for that land use and a detailed VMT analysis is not required. The screening criteria applicable to the project and how they are applied in San Francisco are described below:

- **Map-Based Screening for Residential and Retail Projects.** OPR recommends mapping areas that exhibit where VMT is less than the applicable threshold for that land use. Accordingly, the Transportation Authority has developed maps depicting existing VMT levels in San Francisco for residential and retail land uses based on the SF-CHAMP 2012 base-year model run. The Planning Department uses these maps and associated data to determine whether a proposed project is located in an area of the City that is below the VMT threshold.
- **Proximity to Transit Stations.** OPR recommends that residential, retail, and office projects, as well projects that are a mix of these uses, proposed within ½ mile of an existing major transit stop (as defined by CEQA Section 21064.3) or an existing stop along a high quality transit corridor (as defined by CEQA 21155) would not result in a substantial increase in VMT. However, this presumption would not apply if the project would: have a floor area ratio of less than 0.75; (2) include more parking for use by residents, customers, or

¹¹ OPR's proposed transportation impact guidelines states a project would cause substantial additional VMT if it exceeds both the existing City household VMT per capita minus 15 percent and existing regional household VMT per capita minus 15 percent. In San Francisco, the City's average VMT per capita is lower (8.4) than the regional average (17.2). Therefore, the City average is irrelevant for the purposes of the analysis.

¹² This document is available online at: https://www.opr.ca.gov/s_sb743.php, page III: 20.

employees of the project than required or allowed, without a conditional use; or (3) is inconsistent with the applicable Sustainable Communities Strategy.¹³

Induced Automobile Travel Analysis

Transportation projects may substantially induce additional automobile travel. The following identifies thresholds of significance and screening criteria used to determine if transportation projects would result significant impacts by inducing substantial additional automobile travel.

Pursuant to OPR's Proposed Transportation Impact Guidelines, a transportation project would substantially induce automobile travel if it would generate more than 2,075,220 VMT per year. This threshold is based on the fair share VMT allocated to transportation projects required to achieve California's long-term greenhouse gas emissions reduction goal of 40 percent below 1990 levels by 2030.

OPR's Proposed Transportation Impact Guidelines includes a list of transportation project types that would not likely lead to a substantial or measureable increase in VMT. If a project fits within the general types of projects (including combinations of types) described in the Transportation Impact Guidelines, then it is presumed that VMT impacts would be less than significant and a detailed VMT analysis is not required. The following types of transportation projects included in the Transportation Impact Guidelines are applicable to the proposed project's modifications to sidewalks and curb cuts and proposed bicycle parking:

- Active Transportation, Rightsizing (aka Road Diet), and Transit Projects:
 - Infrastructure projects, including safety and accessibility improvements, for people walking or bicycling
 - Installation or reconfiguration of traffic calming devices
- Other Minor Transportation Projects:
 - Removal of off- or on-street parking spaces

TRAVEL DEMAND

Localized trip generation of the proposed project was calculated using a trip-based analysis and information in the 2002 *Transportation Impact Analysis Guidelines for Environmental Review* (SF Guidelines) developed by the San Francisco Planning Department.¹⁴ The proposed project would generate an estimated 2,281 person trips (inbound and outbound) on a weekday daily basis, consisting of 474 person trips by auto (262 vehicle trips accounting for vehicle occupancy data for this Census Tract), 941 transit trips, 595 walk trips and 271 trips by other modes, which includes bicycle, taxi, and motorcycle trips. During the p.m. peak hour, the proposed project would generate an estimated 317 person trips, consisting of 54 person trips by auto (34 vehicle trips

¹³ A project is considered to be inconsistent with the Sustainable Communities Strategy if development is located outside of areas contemplated for development in the Sustainable Communities Strategy.

¹⁴ CHS Consulting, *600 Van Ness Avenue Mixed-Use Residential Transportation Impact Study*, January, 2018.

accounting for vehicle occupancy data), 149 transit trips, 76 walk trips and 37 trip by other modes.

Impact TR-1: The proposed project would not cause substantial additional VMT or substantially induce automobile travel. (Less than Significant)

Vehicle Miles Traveled Analysis

As shown in Table 1, the existing average daily residential VMT per capita is 2.3 for TAZ 648, which is 87 percent below the existing regional average daily residential VMT per capita of 17.2. The existing average daily employment (retail) VMT per capita is 7.8 for TAZ 648, which is 47.7 percent below the existing regional average daily retail VMT per capita of 14.9. Given that the project site is located in an area where existing residential and retail VMT is more than 15 percent below the existing regional average, the proposed project would meet the Map-Based Screening for retail and residential projects criterion. Additionally, the project site also meets the Proximity to Transit Stations screening criterion.¹⁵ Therefore, the project's residential and retail uses would not result in substantial VMT and impacts would be less than significant.

Induced Automobile Travel Analysis

A project would have a significant effect on the environment if it would substantially induce additional automobile travel by increasing physical roadway capacity in congested areas (i.e., by adding new mixed-flow lanes) or by adding new roadways to the network. OPR's Proposed Transportation Impact Guidelines includes a list of transportation project types that would not likely lead to a substantial or measureable increase in VMT. If a project fits within the general types of projects (including combinations of types), then it is presumed that VMT impacts would be less than significant and a detailed VMT analysis is not required.

The proposed project is not a transportation project. The proposed project includes a streetscape plan that would add new streetscape features along Elm Street and Golden Gate and Van Ness avenues, including 17 new street trees. The proposed project also includes a new bulbout along the north side of the Golden Gate Avenue sidewalk at the corner of Van Ness Avenue. These features fit within the general types of projects identified above that would not substantially induce automobile travel. Thus, the proposed project would not result in a significant impact with respect to induced automobile travel.

Impact TR-2: The proposed project would not substantially increase traffic hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses. (Less than Significant)

No project design features are proposed that would substantially increase traffic-related hazards (e.g., a new sharp curve or dangerous intersections), and the proposed project does not include incompatible uses, as discussed under Topic E.1, Land Use and Land Use Planning. Therefore,

¹⁵ *Ibid.*

traffic hazard impacts due to a design feature or resulting from incompatible uses from the proposed project would be less than significant.

Impact TR-3: The proposed project would not result in inadequate emergency access. (Less than Significant)

Current emergency vehicle access to the project site is provided from Van Ness Avenue, Golden Gate Avenue, and Elm Street. Although the proposed project would generate additional traffic to the area (20 inbound vehicle trips and 15 outbound vehicle trips during the p.m. peak hour), such an increase in vehicles would not impede or hinder the movement of emergency vehicles in the project area from, for example, neighboring fire stations (Fire Department Fire Station No. 1, Fire Station No. 3, Fire Station No. 5, Fire Station No.36, and Fire Station No.38). The proposed project's bulbout would require coordination with city agencies, including the San Francisco Fire Department (to ensure adequate access), San Francisco Municipal Transportation Agency (SFMTA), and San Francisco Public Works for approvals. Therefore, the proposed bulbout and other streetscape changes (e.g., curb cut) would not reduce emergency vehicle access through the adjacent streets surrounding the project site. Therefore, the proposed project would have a less-than-significant impact on emergency access.

Impact TR-4: The proposed project would not conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities. (Less than Significant)

Transit Facilities

The project site is well served by public transit. The following transit lines are within a quarter-mile of the project site: 19-Polk, 21-Hayes, 31-Balboa, 38R-Geary Rapid, 47-Van Ness, 49-Van Ness/Mission, 5-Fulton, 5R-Fulton Rapid, 7X-Noriega Express and 90-San Bruno OWL. The proposed project would generate 941 daily transit trips, including 149 during the p.m. peak hour. These transit trips would be distributed among the multiple transit lines serving the project vicinity. Given the availability of nearby transit, the addition of 149 p.m. peak-hour transit trips would be accommodated by existing capacity. For these reasons, the proposed project would not result in unacceptable levels of transit service or cause a substantial increase in delays or operating costs such that significant adverse impacts in transit service could result. Thus, the proposed project's impact on transit service would be less than significant.

Bicycle Facilities

The project vicinity is served by existing bicycle routes within a half-mile of the project site located along 10th Street, 11th Street, Franklin Street, Grove Street, Laguna Street, Larkin Street, Market Street, McAllister Street, Mission Street, Octavia Boulevard, Page Street, Post Street and Sutter Street. It is anticipated that some of the daily person trips to and from the project site would be made by bicycle. The proposed project would include 169 Class I bicycle parking spaces at the ground floor and 14 Class II bicycle spaces would be located on the sidewalk along

Golden Gate Avenue. Implementation of the proposed project would not alter the existing street grid or result in other physical changes that would substantially affect people bicycling. The proposed project would generate 262 daily and 34 p.m. peak-hour vehicle trips. The 262 daily and 34 p.m. peak hour vehicle trips would not cause hazards with cyclists in the vicinity of the project site. No hazards with drivers entering the proposed project's garage and cyclists would occur, particularly given the driveway location off a bicycle route (Golden Gate Avenue bicycle route starts one block to the east, on the south side of the street) . While the project would increase the amount of vehicle traffic along Golden Gate Avenue and other streets in the vicinity of the project site, the expected magnitude of this increase would not be substantial enough to result in hazards with cyclists or affect overall bicycle accessibility, and therefore, impacts would be less than significant.

Pedestrian Facilities

Trips generated by the proposed project would include walk trips to and from the proposed residential and retail uses, plus walk trips to and from transit stops. The proposed project would generate 595 daily pedestrian trips to and from the project site, including 225 pedestrian trips during the weekday p.m. peak hour (includes 149 transit trips and 76 walk trips). As discussed above, sidewalk widths on Van Ness Avenue would remain 15-feet-ten-inches and eight feet along Elm Street. The proposed project includes an 18-and-a-half foot bulbout that would increase the width of the sidewalk along Golden Gate Avenue near the corner of Van Ness Avenue by eight-and-a-half feet. The remainder of the sidewalk along the proposed project's Golden Gate Avenue frontage would remain ten feet wide. The sidewalks in the project vicinity would be able to accommodate the additional pedestrian trips generated by the proposed project without becoming substantially overcrowded or substantially affecting pedestrian flows. The proposed project would also include streetscape changes to pedestrian facilities, including eliminating existing curb cuts, installing new street trees along the project site, and providing a corner bulb-out at the northeast intersection of Golden Gate and Van Ness avenues in front of the project site. The increased pedestrian activity generated by the project, in combination with the proposed streetscape improvements, would be expected to enhance the overall pedestrian conditions in the area. Additionally, project-generated vehicle traffic would not be expected to result in hazards to pedestrian conditions. Therefore, pedestrian impacts from the proposed project would be less than significant.

Loading Facilities

Field observations of loading activities were conducted during the weekday mid-afternoon period (3:00 p.m. to 4:00 p.m.) on Tuesday, June 7, 2016. In proximity to the project site, there is a 41-foot long commercial loading zone located on the south side of Golden Gate Avenue, directly across the street from the Project frontage, as well as a 140-foot long passenger loading zone located on the north side of Elm Street, directly across from the Project frontage. During field observations, the on-street commercial loading spaces on the south side of Golden Gate Avenue,

between Van Ness Avenue and Polk Street and across the street from the project site were underutilized and generally available during the observation period. No freight/delivery vehicles were observed to be double-parked in the immediate vicinity of the project site.

The proposed project would provide one off-street freight loading space located in the on-site basement parking garage accessible from Golden Gate Avenue. Vehicles would enter and exit the basement garage front-in and front-out. The new residential uses would generate up to approximately four truck freight and service vehicle trips per day, which would result in a demand of one loading vehicle during the peak hour and average hour of loading activities. The retail uses would generate approximately two truck freight and service vehicle trips per day, which would result in a demand of one loading space during the peak hour and average hour of loading activities. The proposed project's estimated loading demand for both the average loading hour and the peak loading hour would be one space. Therefore, the proposed project with one off-street freight loading space would meet the proposed project's loading demand and impacts would be less than significant. Furthermore, the proposed project would add a new 50-foot long yellow zone along the building's Golden Gate Avenue frontage.

While the proposed project would meet its projected loading demand through the provision of one off-street loading spot, instances may occur when the demand for loading is not met due to the loading space already being in use or a vehicle being too large to utilize the off-street space. These instances are not anticipated to occur frequently, the vehicle could use the proposed on-street yellow zone, and overall loading impacts would remain less-than-significant. Implementation of Improvement Measure I-TR-3: Coordination of Move-in/Move-Out Operations, Large Deliveries, and Garbage Pick-Up Operations, to which the project sponsor has agreed, would further reduce these less-than-significant loading impacts .

Improvement Measure I-TR-3: Coordination of Move-in/Move-Out Operations, Large Deliveries, and Garbage Pick-Up Operations.

To reduce the potential for parking of delivery vehicles within the travel lane adjacent to the project frontage on Golden Gate Avenue (in the event that the on- and off-street loading spaces are occupied, or the truck size exceeds 25 feet in length), residential move-in and move-out activities and larger deliveries should be scheduled and coordinated through building management. For retail uses, appropriate delivery times should be scheduled and should be restricted to occur before 7:00 a.m., between the hours of 10:00 a.m. and 4:00 p.m., and after 8:00 p.m.

The Project Sponsor should enforce strict truck size regulations for use of the off-street loading spaces in the proposed freight loading area. Truck lengths exceeding 25 feet should be prohibited from entering the parking garage and should use other loading spaces adjacent to the project site. Appropriate signage should be located at the parking garage entrance to notify drivers of truck size regulations and notify drivers of the on-street loading spaces on Golden Gate Avenue. The Project Sponsor should notify

building management and related staff, and retail tenants of imposed truck size limits in the proposed freight loading area.

The Project Sponsor should enforce appropriate move-in/move-out and loading procedures to avoid any blockages of any streets adjacent to the project site over an extended period of time and reduce potential conflicts between other vehicles and users of adjacent streets as well as movers and pedestrians walking along Golden Gate Avenue, Elm Street, or Van Ness Avenue. Curb parking for movers on Golden Gate Avenue should be reserved through SFMTA or by directly contacting the local 311 service. It is recommended that residential move-in/move-out activities be scheduled during weekday midday hours between 10:00 a.m. and 4:00 p.m. and/or on weekends.

Project Sponsor should coordinate with Recology and enforce strict garbage pick-up periods. Such pick-up times should be restricted to occur before 7:00 a.m., and between the hours of 10:00 a.m. and 2:00 p.m., and no garbage pick-up activities will occur after 3:00 p.m. Specific loading procedures (as described above) should also be enforced for Recology vehicles during garbage pick-up periods.

Construction Activities

Construction of the proposed project would take approximately 24 months. Construction staging would occur primarily on-site. The impact of construction truck traffic would be a temporary lessening of the capacities of local streets due to the slower movement and larger turning radii of trucks, which may affect traffic operations. It is anticipated that a majority of the construction-related truck traffic would use I-80/U.S. 101 and I-280 to access the project site from the East Bay and South Bay. In general, trucks and construction workers would utilize Van Ness Avenue, Harrison Street, 10th Street, 11th Street, and South Van Ness Avenue to gain access to and from U.S. 101 and I-80. Construction activities would generate construction worker trips to and from the project site and a temporary demand for parking and public transit. Any temporary traffic lane closures would be coordinated with the city in order to minimize the impacts on local traffic. In general, lane and sidewalk closures are subject to review and approval by San Francisco Public Works and the City's Transportation Advisory Staff Committee that consists of representatives of City departments including SFMTA, Public Works, Fire, Police, Public Health, Port and the Taxi Commission. Due to the temporary nature of the construction activities, the construction-related impacts on transportation and circulation would be less than significant.

Impact C-TR-1: The proposed project, in combination of past, present, and reasonably foreseeable future projects, would not result in a considerable contribution to cumulative regional VMT. (Less than Significant)

VMT by its very nature is largely a cumulative impact. The amount and distance past, present, and future projects might cause people to drive contribute to the physical secondary environmental impacts associated with VMT. It is likely that no single project by itself would be sufficient in size to prevent the region or state in meeting its VMT reduction goals. Instead, a

project's individual VMT contributes to cumulative VMT impacts. The VMT and induced automobile travel project-level thresholds are based on levels at which new projects are not anticipated to conflict with state and regional long-term greenhouse gas emission reduction targets and statewide VMT per capita reduction targets set in 2020. Therefore, because the proposed project would not exceed the project-level thresholds for VMT and induced automobile travel (Impact TR-1), the proposed project would not be considered to result in a cumulatively considerable contribution to VMT impacts.

Furthermore, as shown in Table 1, projected 2040 average daily residential VMT per capita is 2, and projected average daily retail VMT per capita is 7.8 for TAZ 648. This is approximately 88.4 and 47 percent below the projected 2040 regional average daily VMT per capita of 13.7 and 7.8 for residential and retail uses, respectively.

Impact C-TR-2: The proposed project, in combination of past, present, and reasonably foreseeable future projects, would not have a cumulative impact on transportation. (Less than Significant)

Construction of the proposed project could overlap with construction of nearby cumulative development projects. For the purposes of transportation analysis, the cumulative setting includes the development projects at 1001 Van Ness Avenue and 555 Golden Gate Avenue, as well as the following:

- **The Hub:** The Department is in the process of developing a plan for a project known as The Hub, which would encompass the eastern-most portions of the Market and Octavia Area Plan. The Hub Project falls within the boundaries formed by US 101 on its southwest edge, Howard Street on its southeast edge, Hayes, Fell, Page, and Haight Streets on the north, and Tenth and Ninth Streets on the northeast edge. It is defined by the meeting of the Mission, South of Market, and North of Market Street grids.
- **Better Market Street Plan:** San Francisco Public Works, in coordination with the San Francisco Planning Department and the SFMTA proposes to redesign and provide various transportation and streetscape changes to the 2.2-mile segment of Market Street between Octavia Boulevard and The Embarcadero, and potentially to the 2.3-mile segment of Mission Street between Valencia Street and The Embarcadero, as well as Valencia Street between McCoppin and Market Streets, and 10th Street between Market and Mission Streets. Better Market Street project elements consist of both transportation and streetscape changes, including changes to roadway configuration and private vehicle access; traffic signals; surface transit, including transit-only lanes, stop spacing, service, stop location, stop characteristics and infrastructure; bicycle facilities; pedestrian facilities; streetscapes; commercial and passenger loading; vehicular parking; plazas; and utilities.

- **Vision Zero:** Vision Zero is a coordinated effort by the San Francisco Department of Public Health, SFMTA, the San Francisco Police Department, SFCTA, and the San Francisco Planning Department to improve traffic safety in San Francisco, focusing on bike and pedestrian improvements. Many Vision Zero projects in the general vicinity of the Downtown/Civic Center area are in various stages of planning, design, and construction.^{16,17,18}
- **Polk Streetscape Project:** Polk Street is currently on San Francisco's Vision Zero High Injury Network. Therefore, the Polk Streetscape Project is an effort to increase safety for people walking and biking, as well as transit. Between McAllister and Union Streets, the project will include the following improvements to Polk Street: repaving, sidewalk corner bulb-outs, a protected bike lane, green bike lanes, traffic signals for bicycles, high visibility crosswalks, red zones to improve visibility at intersections, improvements to commercial loading, street lighting, landscaping, and alley enhancements. Detailed design finished in Winter 2016, started during Spring 2016, and is anticipated to be completed in 2018.
- **Muni Forward:** The San Francisco Municipal Transportation Agency (SFMTA) is in the process of implementing Muni Forward, formerly known as the Transit Effectiveness Project (TEP). Muni Forward components include new routes and route extensions, more service on busy routes, and elimination or consolidation of certain routes or route segments with low ridership. Muni Forward includes Service Improvements, Service-Related Capital Improvements, and Transit Travel Time Reduction Proposals. Muni Forward proposes several changes to transit lines within and in close proximity to the study area, mostly related to service.

Cumulative Construction Impacts

The construction of the proposed project may overlap with the construction of other development projects, particularly the 1001 Van Ness Avenue development (Case No. 2014-001305ENV) and 555 Golden Gate Avenue (Case No. 2014.1102ENV).

As a result, construction activities associated with this project could affect access, traffic, and pedestrians on streets used as access routes to and from the project sites (e.g., Golden Gate Avenue, Polk Street, Van Ness Avenue, etc.). The 555 Golden Gate Avenue project is located across Golden Gate Avenue from the proposed project. The 1001 Van Ness Avenue project is located approximately 1000 feet to the north of the project site. While construction vehicles may

¹⁶ SFMTA. *SFMTA Vision Zero Projects* (published April 10, 2014; reviewed online June 2016). Online: http://sfmta.com/sites/default/files/projects/SFMTA_Vision_Zero_Projects_4.10.2014.pdf.

¹⁷ SFMTA. *Vision Zero San Francisco City Team Update: 0 Traffic Deaths by 2024* (April 2014). Online: http://sfmta.com/sites/default/files/projects/Task_Force_Presentation_April_2014.pdf.

¹⁸ SFMTA. *Vision Zero Projects: September 2014 Status Report* (September 2014). Online: http://sfmta.com/sites/default/files/projects/VZIP_SSB_September_2014_update_0.pdf.

utilize the same roads at the same time, such occurrences would be infrequent and would not result in new or intensified traffic hazards. In addition, with the construction of Van Ness BRT, Van Ness Avenue would have a transit-only lane that would protect it from any delay that may result from construction vehicle traffic. Transit on Golden Gate Avenue would not be adversely impacted, as the Muni line that utilizes Golden Gate Avenue, 7X-Noriega, only runs from 6:25am to 8:30am on weekdays, which would provide only occasional opportunities for conflicts with construction equipment. Any temporary sidewalk or road closures that would be required for the proposed project and the 555 Golden Gate Avenue project would require approval and coordination with the City in order to minimize impacts on local traffic. Therefore, the construction impacts of the 1001 Van Ness Avenue and 555 Golden Gate Avenue development projects would not result in a significant cumulative construction impact.

Cumulative Transit Impacts

By 2040, ridership levels on Muni lines are projected to generally grow faster than increases in capacity, and overall p.m. peak hour ridership, as a percentage of overall capacity, would increase from existing conditions which may cause significant cumulative impacts on local and regional transit. However, the proposed project would generate a total of 23 outbound PM peak transit trips out of a total cumulative demand of 25,721 trips, or 0.1% of total cumulative growth. The proposed project's impact on regional transit would add eight new BART trips and no new ferry trips. The proposed project's addition of 23 new Muni trips, eight BART trips and no ferry trips would be less than cumulatively considerable to the significant cumulative impact.

Cumulative Pedestrian Impacts

Pedestrian circulation impacts by their nature are site-specific and generally do not contribute to impacts from other development projects. Pedestrian trips may increase between the completion of the proposed project and future conditions due to increasing effectiveness of planned pedestrian improvements in the vicinity of the project site. As described above, the proposed project would not result in overcrowding of sidewalks or create new potentially hazardous conditions for pedestrians under project conditions and therefore would not create such conditions in the cumulative setting. The Project's 221 p.m. peak hour pedestrian trips, together with the pedestrian trips associated with these additional cumulative projects, would not combine to create a significant cumulative impact. Based on these findings, the proposed project, in combination with past, present and reasonably foreseeable developments in San Francisco, would result in less-than-significant cumulative pedestrian impacts.

Cumulative Bicycle Impacts

The proposed project would not substantially contribute to cumulative bicycle circulation or conditions in the project area. Bicycle trips in the area may increase between the completion of the project and the cumulative scenario due to general growth in the area. In particular, the

proposed project would be designed to provide adequate points of access to bicycle parking, including signage indicating the location of these facilities, and would be designed to reduce any potential conflicts with private vehicles and delivery/freight vehicles accessing the off-street loading spaces. Additionally, the proposed project would not reduce access to the existing bicycle routes along McAllister, Larkin, or Polk Streets.

As described above, there is a projected increase in vehicles at intersections in the vicinity of the proposed project, which may result in an increase in vehicle-bicycle conflicts at intersections in the study area. The closest cumulative project to the project site is at 555 Golden Gate Avenue, across Golden Gate Avenue from the project site. The two combined proposed projects would not result in significant hazards or accessibility to people bicycling due to their increased vehicular activity. Based on these findings, the proposed project, in combination with past, present and reasonably foreseeable developments in San Francisco, would result in *less-than-significant* cumulative impacts on bicyclists.

Cumulative Loading Impacts

The nearest cumulative project that could combine with loading demand from the proposed project is 555 Golden Gate Avenue. The 555 Golden Gate Avenue project is an 11-story residential project with 1,000-sf of retail space on the ground floor. That project does not include off-street loading. However, loading zones exist on the south side of Golden Gate Avenue near the 555 Golden Gate Avenue project site. The proposed project would meet its loading demand with off-street loading space. Furthermore, the proposed project would include an on-street yellow zone. In addition, the 555 Golden Gate Avenue project site is across the street from the proposed project. Therefore, it is unlikely that the proposed project would result in a unmet loading demand that could combine with an unmet loading demand from the 555 Golden Gate Avenue project. Based on these findings, the proposed project, in combination with past, present and reasonably foreseeable developments in San Francisco, would result in *less-than-significant* cumulative loading impacts.

For these reasons, the proposed project in combination with past, present, or reasonably foreseeable future projects in the project vicinity would result in less than significant cumulative transportation impacts.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|-------------------------------------|
| 5. NOISE -- Would the project result in: | | | | | |
| a) Exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) A substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) For a project located within an airport land use plan area, or, where such a plan has not been adopted, in an area within two miles of a public airport or public use airport, would the project expose people residing or working in the area to excessive noise levels? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| f) For a project located in the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

The project site is not located within an airport land use plan area or in the vicinity of a private airstrip. Therefore, topics 5e and 5f are not applicable to the proposed project.

Impact NO-1: The proposed project would not result in the exposure of persons to or generation of noise levels in excess of established standards, nor would the proposed project result in a substantial permanent increase in ambient noise levels. (Less than Significant)

The project site is located in an urbanized area with ambient noise levels typical of those in San Francisco neighborhoods. The existing traffic noise levels on Van Ness Avenue and surrounding streets in the vicinity of the project site are above 70 dBA (Ldn).^{19, 20, 21}

¹⁹ San Francisco General Plan. *Environmental Protection Element, Map 1, Background Noise Levels – 2009*. Available online at: http://generalplan.sfplanning.org/images/16.environmental/ENV_Map1_Background_Noise%20Levels.pdf. Accessed on August 22, 2016

²⁰ The dBA, or A-weighted decibel, refers to a scale of noise measurement that approximates the range of sensitivity of the human ear to sounds of different frequencies. On this scale, the normal range of human hearing extends from about 0 dBA to about 140 dBA. A 10-dBA increase in the level of a continuous noise represents a perceived doubling of loudness.

Ambient noise levels in the project vicinity are typical of noise levels found in San Francisco, which are dominated by vehicular traffic, including cars, Muni buses, and emergency vehicles. Van Ness Avenue is a heavily traveled street that generates moderate to high levels of traffic noise. While land uses in the project site vicinity do not generate a substantial amount of noise, high traffic volumes along the surrounding roads result in a relatively loud noise environment.

The nearest existing sensitive receptors are the residences located across Van Ness Avenue from the project site (approximately 120 feet to the west). There is also a school located across Elm Street from the project site (approximately 40 feet to the north).

The proposed project would include residential and retail uses, which are common uses in the neighborhood. The project would not generate noise that could result in a substantial permanent, temporary or periodic increase in ambient noise levels. Vehicular traffic makes the greatest contribution to ambient noise levels throughout most of San Francisco. Generally, traffic must double in volume to produce a noticeable 3 dBA increase in the ambient noise level in the project vicinity.²² The proposed project would generate approximately 262 daily vehicle trips, with 34 of those trips occurring in the p.m. peak hour. This increase in vehicle trips would not cause traffic volumes to double on nearby streets, and project generated traffic noise would not have a noticeable effect on ambient noise levels in the project site vicinity.

In addition to vehicle-related noise, building equipment and ventilation are also noise sources. Specifically, mechanical equipment produces operational noise, such as noise from heating and ventilation systems. Mechanical equipment would be subject to Section 2909 of the Noise Ordinance. Section 2909 prohibits fixed mechanical equipment noise and music in excess of 5 dBA more than ambient noise from residential land uses 8 dBA more than ambient noise from commercial land uses. Section 2909(d) establishes maximum noise levels for fixed noise sources (e.g., mechanical equipment) of 55 dBA (7:00 a.m. to 10:00 p.m.) and 45 dBA (10:00 p.m. to 7:00 a.m.) inside any sleeping or living room in any dwelling unit located on residential property to prevent sleep disturbance. The proposed project's mechanical and HVAC systems would be required to meet these noise standards.

Given that the proposed project's vehicle trips would not cause a doubling of traffic volumes on nearby streets and that proposed mechanical equipment would be required to comply with the Noise Ordinance, operational noise from the proposed project would not result in a noticeable increase in ambient noise levels. Therefore, the proposed project would not result in exposure of

²¹ The DNL or Ldn is the Leq, or Energy Equivalent Level, of the A-weighted noise level over a 24-hour period with a 10 dB penalty applied to noise levels between 10:00 p.m. to 7:00 a.m. Leq is the level of a steady noise which would have the same energy as the fluctuating noise level integrated over the time period of interest.

²² United States Department of Transportation, Federal Highway Administration, *Highway Traffic Noise: Analysis and Abatement Guidance*, December 2011, p. 9. Available online at http://www.fhwa.dot.gov/environment/noise/regulations_and_guidance/analysis_and_abatement_guidance/revguidance.pdf, accessed June 24, 2016.

existing noise sensitive uses (other residential uses, schools, etc.) to noise levels in excess of established standards.

In the *California Building Industry Association v. Bay Area Air Quality Management District* case decided in 2015,²³ the California Supreme Court held that CEQA does not generally require lead agencies to consider how existing environmental conditions might impact a project's users or residents, except where the project would significantly exacerbate an existing environmental condition. Accordingly, the significance criteria above related to exposure of persons to noise levels in excess of standards in the *General Plan* or Noise Ordinance, exposure of persons to excessive groundborne vibration or groundborne noise levels, and people being substantially affected by existing noise levels are relevant only to the extent that a project significantly exacerbates the existing noise environment. As discussed above, the proposed project would not significantly exacerbate existing noise conditions; however, the following is provided for informational purposes.

The Environmental Protection Element of the *San Francisco General Plan* contains Land Use Compatibility Guidelines for Community Noise.²⁴ These guidelines, which are similar to state guidelines promulgated by the Governor's Office of Planning and Research, indicate maximum acceptable noise levels for various newly developed land uses. These guidelines present a range of noise levels that are considered compatible or incompatible with various land uses, the maximum "satisfactory, with no special noise insulation" exterior noise level is 60 dBA (Ldn) for residential and hotel uses, 65 dBA (Ldn) for school classrooms, libraries, churches and hospitals, 70 dBA (Ldn) for playgrounds, parks, office buildings, retail commercial uses and noise-sensitive manufacturing/communications uses, and 77 dBA (Ldn) for other commercial uses such as wholesale, some retail, industrial/manufacturing, transportation, communications, and utilities.

The proposed project's residential uses would be subject to the noise insulation requirements in both the California Building Code and the San Francisco Building Code. The 2013 California Building Code (Title 24, Part 2 of the California Code of Regulations [CCR]) requires that interior noise levels from outside sources not exceed 45 dBA (Ldn or CNEL) in any habitable room (rooms for sleeping, living, cooking, and eating, but excluding bathrooms, closets, and the like) or a residential unit, except for residential additions to structures constructed before 1974 (Building Code Section 1207.4). The Building Code (Section 1207.2) also mandates that walls and floor/ceiling assemblies separating dwelling units from each other or from public or service areas have a Sound Transmission Class (STC) of at least 50, meaning they can reduce noise by a minimum of 50 decibels (dB).

²³ *California Building Industry Association v. Bay Area Air Quality Management District*, 62 Cal.4th 369. Opinion Filed December 17, 2015. Case No. S213478. Available at: <http://www.courts.ca.gov/33098.htm>. Accessed August 22, 2016.

²⁴ Environmental Protection Element, Policy 11.1.

The San Francisco Building Code was amended in 2015 to incorporate language included in Section 1207.4 (interior noise standards) of the State Building Code. San Francisco's current Section 1207.6.2 accordingly reads the same as Section 1207.4 of the State Building Code. The San Francisco Building Code also includes a requirement that residential structures in "noise critical areas, such as in proximity to highways, county roads, city streets, railroads, rapid transit lines, airports, nighttime entertainment venues, or industrial areas," be designed to exceed the Code's quantitative noise reduction requirements, and specifies, "Proper design to accomplish this goal shall include, but not be limited to, orientation of the residential structure, setbacks, shielding, and sound insulation of the building" (Section 1207.6.1). Section 1207.7 requires submittal of an acoustical report along with a project's building permit application to demonstrate compliance with the Building Code's interior noise standards.

While the proposed project would include residential uses that would place sensitive receptors in the vicinity of a noisy environment, compliance with Title 24 standards and the San Francisco Building Code would ensure that appropriate insulation is included in the project to meet the 45 dBA interior noise standard in the San Francisco Building Code.

Impact NO-2: The proposed project would not result in construction activities that could expose persons to temporary increases in noise or vibration levels substantially in excess of ambient levels. (Less than Significant)

Demolition, excavation, and building construction would cause a temporary increase in noise levels within the project vicinity. Construction equipment would generate noise and possibly vibrations that could be considered an annoyance by occupants of nearby properties. According to the project sponsor, the construction period would last approximately 24 months. Construction noise levels would fluctuate depending on construction phase, equipment type and duration of use, distance between noise source and affected receptor, and the presence (or absence) of barriers. Impacts would generally be limited to the periods during which new foundations and exterior structural and facade elements would be constructed. Interior construction noise would be substantially reduced by exterior walls. However, there would be times when noise could interfere with indoor activities in nearby residences, schools, and businesses.

The nearest sensitive receptors to construction activities would be the school located approximately 40 feet north of the project site across Elm Street. There are also residences located approximately 120 feet west of the project site across Van Ness Avenue. These uses would experience temporary and intermittent noise and vibration associated with site clearance and construction activities as well as the passage of construction trucks in and out of the project site. Site excavation would involve removal of approximately 17,800 cubic yards of soil. The proposed building would be supported by a building foundation that would include a mat slab. Pile driving would not occur.

Additionally, the geotechnical report prepared for the proposed project recommends that no heavy equipment be used within 10 horizontal feet of the adjacent shallow foundations and

basement walls of the property at 544 Golden Gate Avenue, and that only jumping jack or hand-operated vibratory plate compactors should be used for compacting fill in that area.²⁵ As the construction equipment to be used for the proposed project's excavation would not result in vibration levels that could harm the adjacent property, and that work within 10 feet of the adjacent property would be conducted with specialized equipment to further reduce vibration, the vibration impacts of the proposed project would be less than significant.

In addition, the Department of Building Inspection (DBI) is responsible for reviewing the building permit application to ensure that proposed construction activities, including shoring and underpinning, comply with all applicable procedures and requirements and would not materially impair adjacent or nearby buildings.

Construction noise is regulated by the San Francisco Noise Ordinance (Article 29 of the Police Code). The ordinance requires that noise levels from individual pieces of construction equipment, other than impact tools, not exceed 80 dBA at a distance of 100 feet from the source. Impact tools (e.g., jackhammers, hoe rams, impact wrenches) must have manufacturer-recommended and City-approved mufflers for both intake and exhaust. Section 2908 of the Noise Ordinance prohibits construction work between 8:00 p.m. and 7:00 a.m., if noise would exceed the ambient noise level by 5 dBA at the project property line, unless a special permit is authorized by the Director of the Department of Public Works or the Director of Building Inspection. The project would be required to comply with regulations set forth in the Noise Ordinance.

Ambient noise levels in the proximity of the project site exceed 70 ldn along Van Ness and Golden Gate avenues, which are the streets near the project site that have the highest traffic volumes, and vary along the proposed project's Elm Street frontage from 70 ldn closest to Van Ness Avenue to 55 ldn in the proximity of the Tenderloin Neighborhood School. These noise levels do not include construction activity for Van Ness BRT or for the Polk Street Improvement Project, which may occur at the same time as construction of the proposed project. The environmental review for the Polk Street Improvement Project found no significant noise impact associated with the project and environmental review of the Van Ness BRT found less than significant noise impacts.²⁶ Construction of Van Ness BRT includes improvement measures to reduce construction-related noise, including the use of new equipment, turning off idling equipment, restricting hours of operation, and measures to assure that construction-related truck traffic avoids residential neighborhoods or areas with other sensitive receptors. For the construction of the proposed project, average noise levels at the nearest noise-sensitive uses would vary by construction phase, and would depend on the type of equipment used, the

²⁵ Rockridge Geotechnical, *Geotechnical Investigation Proposed Residential Building 600 Van Ness Avenue San Francisco California*, January 27, 2016, p.15.

²⁶ SF Planning Department, *Certificate of Exemption from Environmental Review, SFMTA Polk Street Improvement Project* (Case# 2013-1721ENV), January 15, 2015; SF Planning Department; SF County Transportation Authority, *Van Ness Avenue Bus Rapid Transit Project Final EIS/EIR*, July, 2013.

duration of the construction phase, and the proximity of construction activity to the noise-sensitive receptors. Table 4 lists typical noise levels expected from construction equipment from the project.

Table 4: Typical Noise Levels from Construction Equipment

| Construction Equipment | Noise Level (dBA, Leq at 50 feet) | Noise Level (dBA, Leq at 100 feet) |
|--|--|---|
| Jackhammer (Pavement Breaker) ¹ | 88 | 82 |
| Loader | 79 | 73 |
| Dozer | 82 | 76 |
| Excavator | 81 | 75 |
| Grader | 85 | 79 |
| Dump Truck | 76 | 70 |
| Flatbed Truck | 74 | 68 |
| Concrete Truck | 81 | 75 |
| Forklift (gas-powered) | 83 | 77 |
| Generator | 81 | 75 |
| Compressor | 78 | 72 |
| San Francisco Noise Ordinance Limit | 86 | 80 |

Notes: The above Leq noise levels are calculated assuming a 100 percent usage factor at full load (i.e., Lmax noise level 100 percent) for the 1-hour measurement period. Noise levels in **bold** exceed the above ordinance limit, but as indicated, two of the three exceedances are exempt from this limit.

¹ Exempt from the ordinance noise limit of 86 dBA at 50 feet or 80 dBA at 100 feet.

The Tenderloin Community School is located across Elm Street, approximately 50 feet from the project site. It is likely that construction activity would overlap with school hours and that construction noise would be heard by students and school staff. Project construction activities would be required to comply with the Noise Ordinance requirements. Although construction noise could rise to the level of an annoyance at times, it would not be expected to exceed noise levels commonly experienced in this urban environment, and therefore, would not be considered significant. Although no significant construction noise impacts would occur, **Improvement Measure I-NO-2**, which has been agreed to by the project sponsor, and has been identified to minimize construction-related noise effects further.

Improvement Measure I-NO-2: Construction Noise

The project sponsor will develop a set of site-specific noise attenuation measures under the supervision of a qualified acoustical consultant. Prior to commencing construction, a plan

for such measures should be submitted to the DBI to ensure that maximum feasible noise attenuation should be achieved. Noise attenuation measures should include as many of the following control strategies as feasible:

- Erect temporary plywood noise barriers around the construction site.
- Utilize noise control blankets on the building as the building is erected to reduce noise emission from the site.
- Monitor the effectiveness of noise attenuation measures by taking noise measurements.
- Post signs on-site with information regarding permitted construction days and hours, complaint procedures, and the name(s) and telephone number(s) of the individual(s) to be contacted in the event of a problem.

Impact C-NO-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would result in less-than-significant cumulative impacts related to noise and vibration. (Less than Significant)

Project construction-related noise would not substantially increase ambient noise levels at locations greater than a few hundred feet from the project site, and there is only one project identified (555 Golden Gate Avenue) that is close enough to result in any cumulative construction noise impact. While it is not certain at this time whether construction of the project at 555 Golden Gate Avenue would occur simultaneous with the proposed project, the project at 555 Golden Gate Avenue would not include pile driving and would be located farther away from both the school to the north of the project site and the residences to the west of the project site than the proposed project. Additionally, there are intervening buildings between the 555 Golden Gate project site and the residences to the west of the proposed project which could dampen construction-related noise from the 555 Golden Gate project site. As such, construction noise effects associated with the proposed project are not anticipated to combine with those associated with other proposed and ongoing projects located near the project site. Therefore, cumulative construction-related noise impacts would be less than significant.

The proposed project, along with the other cumulative projects in the vicinity, would not result in a doubling of traffic volumes along nearby streets. The proposed project would add approximately 34 vehicle trips during the p.m. peak hour. Cumulative vehicle trips would be distributed along the local roadways and would not all be on Elm Street, or Van Ness and Golden Gate avenues. In combination with reasonably foreseeable cumulative projects, the project would not result in significant cumulative traffic noise impacts. Moreover, the proposed project's mechanical equipment and mechanical equipment from reasonably foreseeable cumulative projects would be required to comply with the Noise Ordinance.

In light of the above, the proposed project in combination with reasonably foreseeable projects would result in less-than-significant cumulative impacts related to noise.

| <i>Topics:</i> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 6. AIR QUALITY.—Would the project: | | | | | |
| a) Conflict with or obstruct implementation of the applicable air quality plan? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Violate any air quality standard or contribute substantially to an existing or projected air quality violation? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal, state, or regional ambient air quality standard (including releasing emissions which exceed quantitative thresholds for ozone precursors)? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) Expose sensitive receptors to substantial pollutant concentrations? | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) Create objectionable odors affecting a substantial number of people? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Setting

Overview

The Bay Area Air Quality Management District (air district) is the regional agency with jurisdiction over the nine-county San Francisco Bay Area Air Basin (air basin), which includes San Francisco, Alameda, Contra Costa, Marin, San Mateo, Santa Clara, and Napa counties and portions of Sonoma and Solano counties. The air district is responsible for attaining and maintaining federal and state air quality standards in the air basin, as established by the federal Clean Air Act and the California Clean Air Act, respectively. Specifically, the air district has the responsibility to monitor ambient air pollutant levels throughout the air basin and to develop and implement strategies to attain the applicable federal and state standards. The federal and state clean air acts require plans to be developed for areas that do not meet air quality standards, generally. The most recent air quality plan, the 2017 Clean Air Plan, was adopted by the air district on April 19, 2017. The 2017 Clean Air Plan updates the most recent Bay Area ozone plan, the 2010 Clean Air Plan, in accordance with the requirements of the state Clean Air Act to implement all feasible measures to reduce ozone; provide a control strategy to reduce particulate matter, air toxics, and greenhouse gases in a single, integrated plan; and establish emission control measures to be adopted or implemented. The 2017 Clean Air Plan contains the following primary goals:

- Protect air quality and health at the regional and local scale: Attain all state and national air quality standards, and eliminate disparities among Bay Area communities in cancer health risk from toxic air contaminants; and
- Protect the climate: Reduce Bay Area greenhouse gas emissions to 40 percent below 1990 levels by 2030 and 80 percent below 1990 levels by 2050.

The 2017 Clean Air Plan is the most current applicable air quality plan for the air basin. Consistency with this plan is the basis for determining whether the proposed project would conflict with or obstruct implementation of an air quality plan.

Criteria Air Pollutants

In accordance with the state and federal clean air acts, air pollutant standards are identified for the following six *criteria air pollutants*: ozone, carbon monoxide (CO), particulate matter (PM), nitrogen dioxide (NO₂), sulfur dioxide (SO₂), and lead. These air pollutants are termed criteria air pollutants because they are regulated by developing specific public health- and welfare-based criteria as the basis for setting permissible levels. In general, the air basin experiences low concentrations of most pollutants when compared to federal or state standards. The air basin is designated as either in attainment²⁷ or unclassified for most criteria air pollutants with the exception of ozone, PM_{2.5}, and PM₁₀, for which these pollutants are designated as non-attainment for either the state or federal standards. By its very nature, regional air pollution is largely a cumulative impact in that no single project is sufficient in size to, by itself, result in non-attainment of air quality standards. Instead, a project’s individual emissions contribute to existing cumulative air quality impacts. If a project’s contribution to cumulative air quality impacts is considerable, then the project’s impact on air quality would be considered significant.²⁸

Land use projects may contribute to regional criteria air pollutants during the construction and operational phases of a project. Table 3 identifies air quality significance thresholds followed by a discussion of each threshold. Projects that would result in criteria air pollutant emissions below these significance thresholds would not violate an air quality standard, contribute substantially to an air quality violation, or result in a cumulatively considerable net increase in criteria air pollutants within the air basin.

²⁷ “Attainment” status refers to those regions that are meeting federal and/or state standards for a specified criteria pollutant. “Non-attainment” refers to regions that do not meet federal and/or state standards for a specified criteria pollutant. “Unclassified” refers to regions where there is not enough data to determine the region’s attainment status for a specified criteria air pollutant.

²⁸ Bay Area Air Quality Management District (BAAQMD), *California Environmental Quality Act Air Quality Guidelines*, May 2017, page 2-1.

Table 5: Criteria Air Pollutant Significance Thresholds²⁹

| Pollutant | Construction Thresholds | Operational Thresholds | |
|-------------------|--|------------------------------------|--------------------------------------|
| | Average Daily Emissions (lbs./day) | Average Daily Emissions (lbs./day) | Maximum Annual Emissions (tons/year) |
| ROG | 54 | 54 | 10 |
| NO _x | 54 | 54 | 10 |
| PM ₁₀ | 82 (exhaust) | 82 | 15 |
| PM _{2.5} | 54 (exhaust) | 54 | 10 |
| Fugitive Dust | Construction Dust Ordinance or other Best Management Practices | | |

Ozone Precursors. As discussed previously, the air basin is currently designated as non-attainment for ozone and particulate matter. Ozone is a secondary air pollutant produced in the atmosphere through a complex series of photochemical reactions involving reactive organic gases (ROG) and oxides of nitrogen (NO_x). The potential for a project to result in a cumulatively considerable net increase in criteria air pollutants, which may contribute to an existing or projected air quality violation, are based on the state and federal clean air acts emissions limits for stationary sources. To ensure that new stationary sources do not cause or contribute to a violation of an air quality standard, air district regulation 2, rule 2 requires that any new source that emits criteria air pollutants above a specified emissions limit must offset those emissions. For ozone precursors ROG and NO_x, the offset emissions level is an annual average of 10 tons per year (or 54 pounds (lbs.) per day).³⁰ These levels represent emissions below which new sources are not anticipated to contribute to an air quality violation or result in a considerable net increase in criteria air pollutants.

Although this regulation applies to new or modified stationary sources, land use development projects result in ROG and NO_x emissions as a result of increases in vehicle trips, architectural coating, and construction activities. Therefore, the above thresholds can be applied to the construction and operational phases of land use projects and those projects that result in emissions below these thresholds would not be considered to contribute to an existing or projected air quality violation or result in a considerable net increase in ROG and NO_x emissions. Due to the temporary nature of construction activities, only the average daily thresholds are applicable to construction phase emissions.

Particulate Matter (PM₁₀ and PM_{2.5}).³¹ The air district has not established an offset limit for PM_{2.5}. However, the emissions limit in the federal New Source Review for stationary sources in nonattainment areas is an appropriate significance threshold. For PM₁₀ and PM_{2.5}, the emissions

²⁹ *Ibid.* Page 2-2.

³⁰ BAAQMD, *Revised Draft Options and Justification Report, California Environmental Quality Act Thresholds of Significance*, October 2009, page 17.

³¹ PM₁₀ is often termed “coarse” particulate matter and is made of particulates that are 10 microns in diameter or smaller. PM_{2.5}, termed “fine” particulate matter, is composed of particles that are 2.5 microns or less in diameter.

limit under New Source Review is 15 tons per year (82 lbs. per day) and 10 tons per year (54 lbs. per day), respectively. These emissions limits represent levels below which a source is not expected to have an impact on air quality.³² Similar to ozone precursor thresholds identified above, land use development projects typically result in particulate matter emissions as a result of increases in vehicle trips, space heating and natural gas combustion, landscape maintenance, and construction activities. Therefore, the above thresholds can be applied to the construction and operational phases of a land use project. Again, because construction activities are temporary in nature, only the average daily thresholds are applicable to construction-phase emissions.

Fugitive Dust. Fugitive dust emissions are typically generated during construction phases. Studies have shown that the application of best management practices at construction sites significantly control fugitive dust³³ and individual measures have been shown to reduce fugitive dust by anywhere from 30 to 90 percent.³⁴ The air district has identified a number of best management practices to control fugitive dust emissions from construction activities.³⁵ The City's Construction Dust Control Ordinance (ordinance 176-08, effective July 30, 2008) requires a number of measures to control fugitive dust and the best management practices employed in compliance with the ordinance are an effective strategy for controlling construction-related fugitive dust.

Other Criteria Pollutants. Regional concentrations of CO in the Bay Area have not exceeded the state standards in the past 11 years and SO₂ concentrations have never exceeded the standards. The primary source of CO emissions from development projects is vehicle traffic. Construction-related SO₂ emissions represent a negligible portion of the total basin-wide emissions and construction-related CO emissions represent less than five percent of the Bay Area total basin-wide CO emissions. As discussed previously, the Bay Area is in attainment for both CO and SO₂. Furthermore, the air district has demonstrated, based on modeling, that to exceed the California ambient air quality standard of 9.0 ppm (parts per million) (8-hour average) or 20.0 ppm (1-hour average) for CO, project traffic in addition to existing traffic would need to exceed 44,000 vehicles per hour at affected intersections (or 24,000 vehicles per hour where vertical and/or horizontal mixing is limited). Therefore, given the Bay Area's attainment status and the limited CO and SO₂ emissions that could result from development projects, development projects would not result in a cumulatively considerable net increase in CO or SO₂ emissions, and quantitative analysis is not required.

³² BAAQMD, *Revised Draft Options and Justification Report, California Environmental Quality Act Thresholds of Significance*, October 2009, page 16.

³³ Western Regional Air Partnership. 2006. *WRAP Fugitive Dust Handbook*. September 7, 2006. This document is available online at http://www.wrapair.org/forums/dejffidh/content/FDHandbook_Rev_06.pdf, accessed February 16, 2012.

³⁴ BAAQMD, *CEQA Air Quality Guidelines*, May 2017, page D-47.

³⁵ *Ibid.*

Local Health Risks and Hazards

In addition to criteria air pollutants, individual projects may emit toxic air contaminants (TACs). TACs collectively refer to a diverse group of air pollutants that are capable of causing chronic (i.e., of long-duration) and acute (i.e., severe but short-term) adverse effects to human health, including carcinogenic effects. Human health effects of TACs include birth defects, neurological damage, cancer, and mortality. There are hundreds of different types of TACs with varying degrees of toxicity. Individual TACs vary greatly in the health risk they present; at a given level of exposure, one TAC may pose a hazard that is many times greater than another.

Unlike criteria air pollutants, TACs do not have ambient air quality standards but are regulated by the air district using a risk-based approach to determine which sources and pollutants to control as well as the degree of control. A *health risk assessment* is an analysis in which human health exposure to toxic substances is estimated, and considered together with information regarding the toxic potency of the substances, to provide quantitative estimates of health risks.³⁶

Air pollution does not affect every individual in the population in the same way, and some groups are more sensitive to adverse health effects than others. Land uses such as residences, schools, children's day care centers, hospitals, and nursing and convalescent homes are considered to be the most sensitive to poor air quality because the population groups associated with these uses have increased susceptibility to respiratory distress or, as in the case of residential receptors, their exposure time is greater than that for other land uses. Therefore, these groups are referred to as sensitive receptors. Exposure assessment guidance typically assumes that residences would be exposed to air pollution 24 hours per day, seven days a week, for 30 years.³⁷ Therefore, assessments of air pollutant exposure to residents typically result in the greatest adverse health outcomes of all population groups.

Exposures to fine particulate matter (PM_{2.5}) are strongly associated with mortality, respiratory diseases, and lung development in children, and other endpoints such as hospitalization for cardiopulmonary disease.³⁸ In addition to PM_{2.5}, diesel particulate matter (DPM) is also of concern. The California Air Resources Board (California air board) identified DPM as a TAC in 1998, primarily based on evidence demonstrating cancer effects in humans.³⁹ The estimated cancer risk from exposure to diesel exhaust is much higher than the risk associated with any other TAC routinely measured in the region.

³⁶ In general, a health risk assessment is required if the air district concludes that projected emissions of a specific air toxic compound from a proposed new or modified source suggest a potential public health risk. The applicant is then subject to a health risk assessment for the source in question. Such an assessment generally evaluates chronic, long-term effects, estimating the increased risk of cancer as a result of exposure to one or more TACs.

³⁷ California Office of Environmental Health Hazard Assessment, *Air Toxics Hot Spot Program Risk Assessment Guidelines*, February, 2015. Pg. 4-44, 8-6

³⁸ SFDPH, *Assessment and Mitigation of Air Pollutant Health Effects from Intra-Urban Roadways: Guidance for Land Use Planning and Environmental Review*, May 2008.

³⁹ California Air Resources Board (ARB), Fact Sheet, "The Toxic Air Contaminant Identification Process: Toxic Air Contaminant Emissions from Diesel-fueled Engines," October 1998.

In an effort to identify areas of San Francisco most adversely affected by sources of TACs, San Francisco partnered with the BAAQMD to conduct a citywide health risk assessment based on an inventory and assessment of air pollution and exposures from mobile, stationary, and area sources within San Francisco. Areas with poor air quality, termed the “Air Pollutant Exposure Zone” (APEZ) were identified based on health-protective criteria that consider estimated cancer risk, exposure to fine particulate matter, proximity to freeways, and locations with particularly vulnerable populations. The project site is located within an APEZ. Each of the APEZ criteria is discussed below.

Excess Cancer Risk. The Air Pollution Exposure Zone includes areas where modeled cancer risk exceeds 100 incidents per million persons exposed. This criterion is based on United States Environmental Protection Agency (EPA) guidance for conducting air toxic analyses and making risk management decisions at the facility and community-scale level.⁴⁰ As described by the air district, the EPA considers a cancer risk of 100 per million to be within the “acceptable” range of cancer risk. Furthermore, in the 1989 preamble to the benzene National Emissions Standards for Hazardous Air Pollutants rulemaking,⁴¹ the EPA states that it “...strives to provide maximum feasible protection against risks to health from hazardous air pollutants by (1) protecting the greatest number of persons possible to an individual lifetime risk level no higher than approximately one in one million and (2) limiting to no higher than approximately one in ten thousand [100 in one million] the estimated risk that a person living near a plant would have if he or she were exposed to the maximum pollutant concentrations for 70 years.” The 100 per one million excess cancer cases is also consistent with the ambient cancer risk in the most pristine portions of the Bay Area based on air district regional modeling.⁴²

Fine Particulate Matter. EPA staff’s 2011 review of the federal PM_{2.5} standard concluded that the then current federal annual PM_{2.5} standard of 15 µg/m³ (micrograms per cubic meter) should be revised to a level within the range of 13 to 11 µg/m³, with evidence strongly supporting a standard within the range of 12 to 11 µg/m³.⁴³ The Air Pollutant Exposure Zone for San Francisco is based on the health protective PM_{2.5} standard of 11 µg/m³, as supported by the EPA’s assessment, although lowered to 10 µg/m³ to account for uncertainty in accurately predicting air pollutant concentrations using emissions modeling programs.

Proximity to Freeways. According to the California air board, studies have shown an association between the proximity of sensitive land uses to freeways and a variety of respiratory symptoms, asthma exacerbations, and decreases in lung function in children. Siting sensitive uses in close

⁴⁰ BAAQMD, *Revised Draft Options and Justification Report, California Environmental Quality Act Thresholds of Significance*, October 2009, page 67.

⁴¹ 54 Federal Register 38044, September 14, 1989.

⁴² BAAQMD, *Clean Air Plan*, May 2017, page D-43.

⁴³ U.S. EPA, *Policy Assessment for the Review of the Particulate Matter National Ambient Air Quality Standards*. “Particulate Matter Policy Assessment.” April 2011. Available online at: <https://www3.epa.gov/ttn/naaqs/standards/pm/data/20110419pmpafinal.pdf>.

proximity to freeways increases both exposure to air pollution and the potential for adverse health effects. As evidence shows that sensitive uses in an area within a 500-foot buffer of any freeway are at an increased health risk from air pollution,⁴⁴ parcels that are within 500 feet of freeways are included in the Air Pollutant Exposure Zone.

Health Vulnerable Locations. Based on the air district's evaluation of health vulnerability in the Bay Area, those zip codes (94102, 94103, 94105, 94124, and 94130) in the worst quintile of Bay Area health vulnerability scores as a result of air pollution-related causes were afforded additional protection by lowering the standards for identifying parcels in the Air Pollutant Exposure Zone to: (1) an excess cancer risk greater than 90 per one million persons exposed, and/or (2) PM_{2.5} concentrations in excess of 9 µg/m³.⁴⁵

The above citywide health risk modeling was also used as the basis in approving amendments to the San Francisco Building and Health codes, referred to as the Enhanced Ventilation Required for Urban Infill Sensitive Use Developments or Health Code, article 38 (ordinance 224-14, effective December 8, 2014) (article 38). The purpose of article 38 is to protect the public health and welfare by establishing an Air Pollutant Exposure Zone and imposing an enhanced ventilation requirement for all urban infill sensitive use development within the Air Pollutant Exposure Zone. In addition, projects within the Air Pollutant Exposure Zone require special consideration to determine whether the project's activities would add a substantial amount of emissions to areas already adversely affected by poor air quality.

Construction Air Quality Impacts

Project-related air quality impacts fall into two categories: short-term impacts from construction and long-term impacts from project operation. The following addresses construction-related air quality impacts resulting from the proposed project.

Impact AQ-1: The proposed project's construction activities would generate fugitive dust and criteria air pollutants but would not violate an air quality standard, contribute substantially to an existing or projected air quality violation, or result in a cumulatively considerable net increase in criteria air pollutants. (Less than Significant)

Construction activities (short-term) typically result in emissions of ozone precursors and PM in the form of dust (fugitive dust) and exhaust (e.g., vehicle tailpipe emissions). Emissions of ozone precursors and PM are primarily a result of the combustion of fuel from on-road and off-road vehicles. However, ROG_s are also emitted from activities that involve painting, other types of architectural coatings, or asphalt paving. The proposed project consists of the construction of a

⁴⁴ California Air Resources Board, *Air Quality and Land Use Handbook: A Community Health Perspective*. April 2005. Available online at: <http://www.arb.ca.gov/ch/landuse.htm>.

⁴⁵ San Francisco Planning Department and San Francisco Department of Public Health, *2014 Air Pollutant Exposure Zone Map (Memo and Map)*, April 9, 2014. These documents are part of San Francisco Board of Supervisors File No. 14806, Ordinance No. 224-14; Amendment to Health Code Article 38.

13-story building containing 168 dwelling units and approximately 6,241 square feet of commercial space. During the project's approximately 24-month construction period, construction activities would have the potential to result in emissions of ozone precursors and PM, as discussed below.

Fugitive Dust

Project-related excavation, grading, and other construction activities may cause wind-blown dust that could contribute particulate matter into the local atmosphere. Although there are federal standards for air pollutants and implementation of state and regional air quality control plans, air pollutants continue to have impacts on human health throughout the country. California has found that particulate matter exposure can cause health effects at lower levels than national standards. The current health burden of particulate matter demands that, where possible, public agencies take feasible available actions to reduce sources of particulate matter exposure. According to the California ARB, reducing PM_{2.5} concentrations to state and federal standards of 12 µg/m³ in the San Francisco Bay Area would prevent between 200 and 1,300 premature deaths.⁴⁶

Dust can be an irritant causing watering eyes or irritation to the lungs, nose, and throat. Demolition, excavation, grading, and other construction activities can cause wind-blown dust that adds particulate matter to the local atmosphere. Depending on exposure, adverse health effects can occur due to this particulate matter in general and also due to specific contaminants such as lead or asbestos that may be constituents of soil.

In response, the San Francisco Board of Supervisors approved a series of amendments to the San Francisco Building and Health Codes generally referred to as the Construction Dust Control Ordinance (Ordinance No. 176-08, effective August 29, 2008) with the intent of reducing the quantity of dust generated during site preparation, demolition, and construction work in order to protect the health of the general public and of on-site workers, minimize public nuisance complaints, and avoid orders to stop work by DBI.

The Construction Dust Control Ordinance requires that all site preparation work, demolition, or other construction activities within San Francisco that have the potential to create dust or to expose or disturb more than 10 cubic yards or 500 square feet of soil comply with specified dust control measures whether or not the activity requires a permit from DBI. The Director of DBI may waive this requirement for activities on sites less than one-half-acre that are unlikely to result in any visible wind-blown dust.

In compliance with the Construction Dust Control Ordinance, the project sponsor and the contractor responsible for construction activities at the project site would be required to use the

⁴⁶ ARB, Methodology for Estimating Premature Deaths Associated with Long-term Exposure to Fine Airborne Particulate Matter in California, Staff Report, Table 4c, October 24, 2008.

following practices to control construction dust on the site or other practices that result in equivalent dust control that are acceptable to the director. Dust suppression activities may include watering all active construction areas sufficiently to prevent dust from becoming airborne; increased watering frequency may be necessary whenever wind speeds exceed 15 miles per hour. During excavation and dirt-moving activities, contractors shall wet sweep or vacuum the streets, sidewalks, paths, and intersections where work is in progress at the end of the workday. Inactive stockpiles (where no disturbance occurs for more than seven days) greater than 10 cubic yards or 500 square feet of excavated material, backfill material, import material, gravel, sand, road base, and soil shall be covered with a 10 mil (0.01 inch) polyethylene plastic (or equivalent) tarp, braced down, or use other equivalent soil stabilization techniques. San Francisco ordinance 175-91 restricts the use of potable water for soil compaction and dust control activities undertaken in conjunction with any construction or demolition project occurring within the boundaries of San Francisco, unless permission is obtained from the San Francisco Public Utilities Commission. Non-potable water must be used for soil compaction and dust control activities during project construction and demolition. The San Francisco Public Utilities Commission operates a recycled water truck-fill station at the Southeast Water Pollution Control Plant that provides recycled water for these activities at no charge.

Compliance with the regulations and procedures set forth by the Dust Control Ordinance would ensure that potential dust-related air quality impacts would be reduced to a *less-than-significant* level.

Criteria Air Pollutants

As discussed above, construction activities would result in emissions of criteria air pollutants from the use of off- and on-road vehicles and equipment. To assist lead agencies in determining whether short-term construction-related air pollutant emissions require further analysis as to whether the project may exceed the criteria air pollutant significance thresholds shown in Table 5, above, the air district, in its CEQA Air Quality Guidelines (May 2017), developed screening criteria. If a proposed project meets the screening criteria, then construction of the project would result in less-than-significant criteria air pollutant impacts. A project that exceeds the screening criteria may require a detailed air quality assessment to determine whether criteria air pollutant emissions would exceed significance thresholds. The CEQA Air Quality Guidelines note that the screening levels are generally representative of new development on greenfield⁴⁷ sites without any form of mitigation measures taken into consideration. In addition, the screening criteria do not account for project design features, attributes, or local development requirements that could also result in lower emissions.

The proposed project consists of the construction of a 13-story building containing 168 dwelling units and approximately 6,241 gsf of commercial space, including 17,800 cubic feet of excavation

⁴⁷ A greenfield site refers to agricultural or forest land or an undeveloped site earmarked for commercial, residential, or industrial projects.

to a depth of approximately 22 feet below grade. The proposed project is above the construction screening criteria because it proposes excavation of more than 10,000 cubic yards of soil. Thus, quantification of construction-related criteria air pollutant emissions is required.

An Air Quality Memorandum was prepared for the proposed project to examine construction and operations-related criteria pollutants.⁴⁸ For construction emissions, the total criteria air pollutant emissions from construction equipment were estimated using the California Emissions Estimator Model (CalEEMod)⁴⁹ based on the construction phasing schedule provided by the project sponsor.⁵⁰ This analysis utilized CalEEMod's defaults for the types of equipment used, and the duration of their use, during each phase.

- 1) A 578-day project completion period was assumed, which includes the proposed project's site preparation, grading, building construction and architectural coating phases, the durations of which were provided by the project sponsor.
- 2) The total construction-related criteria air pollutant emissions were modeled using CalEEMod. The CalEEMod results were then converted from tons to pounds and divided by the assumed number of working days (578) to yield average daily construction emissions calculation. The average daily emissions were then compared to the BAAQMD thresholds of significance for construction CAPs.

Table 6 shows the total criteria air pollutant emissions associated with unmitigated project construction and provides a comparison to the BAAQMD thresholds of significance. As demonstrated in the table, the proposed project's unmitigated daily construction-related criteria air pollutant emissions would not exceed BAAQMD thresholds of significance.

⁴⁸ SF Planning, *Air Quality Memorandum Project File 2015-012729ENV 600 Van Ness Avenue*, October 30, 2017.

⁴⁹ CalEEMod version 2016.3.1, available online at <http://www.caleemod.com>. CalEEMod was used to estimate CAP emissions from construction vehicle activity.

⁵⁰ Project phasing information provided by project team on October 25, 2017. This email and attachment are included in Attachments A and are available for review at the Planning Department, 1650 Mission Street, 4th Floor, as part of Case File 2015-012729ENV.

Table 6 Construction CAP Emissions

| Pollutant ⁵¹ | Construction Thresholds ⁵² Average Daily Emissions (lbs./day) | Proposed Project Construction Emissions Average Daily Emissions (lbs./day) |
|--------------------------------|---|--|
| ROG | 54 | 4.23 |
| NO _x | 54 | 5.93 |
| PM ₁₀ | 82 (exhaust) | 0.29 |
| PM _{2.5} | 54 (exhaust) | 0.26 |
| Fugitive Dust | Construction Dust Ordinance or other Best Management Practices | San Francisco Construction Dust Control Ordinance (Ordinance No. 176-08) applies to the proposed project |

Therefore, while the proposed project’s construction activities would generate fugitive dust and criteria air pollutants, they would not violate an air quality standard, contribute substantially to an existing or projected air quality violation, or result in a cumulatively considerable net increase in criteria air pollutants, and the effect would be less than significant.

Impact AQ-2: The proposed project’s construction activities would generate toxic air contaminants, including diesel particulate matter, which would expose sensitive receptors to substantial pollutant concentrations. (Less than Significant with Mitigation)

As discussed above, the project site is located within an APEZ. Existing sensitive land uses in the project vicinity include residential uses to the west and a school to the north of the project site.

With regards to construction emissions, off-road equipment (which includes construction-related equipment) is a large contributor to diesel particulate matter emissions in California, although since 2007, the California air board has found the emissions to be substantially lower than previously expected.⁵³

Newer and more refined emission inventories have substantially lowered the estimates of DPM emissions from off-road equipment such that off-road equipment is now considered the sixth largest source of diesel particulate matter emissions in California.⁵⁴ For example, revised PM emission estimates for the year 2010, which diesel particulate matter is a major component of

⁵¹ ROG: reactive organic gases; NO_x: nitrogen oxides; PM₁₀: inhalable coarse particulate matter; PM_{2.5}: fine particulate matter

⁵² Bay Area Air Quality Management District (BAAQMD), *California Environmental Quality Act Air Quality Guidelines*, May 2017.

⁵³ ARB, *Staff Report: Initial Statement of Reasons for Proposed Rulemaking, Proposed Amendments to the Regulation for In-Use Off-Road Diesel-Fueled Fleets and the Off-Road Large Spark-Ignition Fleet Requirements*, p.1 and p. 13 (Figure 4), October 2010.

⁵⁴ ARB, *Staff Report: Initial Statement of Reasons for Proposed Rulemaking, Proposed Amendments to the Regulation for In-Use Off-Road Diesel-Fueled Fleets and the Off-Road Large Spark-Ignition Fleet Requirements*, October 2010.

total PM, have decreased by 83 percent from previous 2010 emissions estimates for the air basin.⁵⁵ Approximately half of the reduction in emissions can be attributed to the economic recession and half to updated methodologies used to better assess construction emissions.⁵⁶

Additionally, a number of federal and state regulations are requiring cleaner off-road equipment. Specifically, both the EPA and California air board have set emissions standards for new off-road equipment engines, ranging from Tier 1 to Tier 4. Tier 1 emission standards were phased in between 1996 and 2000 and Tier 4 Interim and Final emission standards for all new engines were phased in between 2008 and 2015. To meet the Tier 4 emission standards, engine manufacturers are required to produce new engines with advanced emission-control technologies. Although the full benefits of these regulations will not be realized for several years, the EPA estimates that by implementing the federal Tier 4 standards, NO_x and PM emissions will be reduced by more than 90 percent.⁵⁷

In addition, construction activities do not lend themselves to analysis of long-term health risks because of their temporary and variable nature. As explained in the air district's CEQA Air Quality Guidelines:

“Due to the variable nature of construction activity, the generation of TAC emissions in most cases would be temporary, especially considering the short amount of time such equipment is typically within an influential distance that would result in the exposure of sensitive receptors to substantial concentrations. Concentrations of mobile-source diesel PM emissions are typically reduced by 70 percent at a distance of approximately 500 feet (ARB 2005). In addition, current models and methodologies for conducting health risk assessments are associated with longer-term exposure periods of 9, 40, and 70 years, which do not correlate well with the temporary and highly variable nature of construction activities. This results in difficulties with producing accurate estimates of health risk.”⁵⁸

Therefore, project-level analyses of construction activities have a tendency to produce overestimated assessments of long-term health risks. However, within the Air Pollutant Exposure Zone, as discussed above, additional construction activity may adversely affect populations that are already at a higher risk for adverse long-term health risks from existing sources of air pollution.

The proposed project would require construction activities for the approximate 24-month construction period. Project construction activities would result in short-term emissions of DPM

⁵⁵ ARB, “In-Use Off-Road Equipment, 2011 Inventory Model,” Query accessed online, April 2, 2012, http://www.arb.ca.gov/msei/categories.htm#inuse_or_category.

⁵⁶ ARB, *Staff Report: Initial Statement of Reasons for Proposed Rulemaking, Proposed Amendments to the Regulation for In-Use Off-Road Diesel-Fueled Fleets and the Off-Road Large Spark-Ignition Fleet Requirements*, October 2010.

⁵⁷ USEPA, “Clean Air Nonroad Diesel Rule: Fact Sheet,” May 2004.

⁵⁸ BAAQMD, *CEQA Air Quality Guidelines*, May 2017, page 8-7.

and other TACs. The project site is located in an area that already experiences poor air quality and project construction activities would generate additional air pollution, affecting nearby sensitive receptors and resulting in a significant impact. Implementation of **Mitigation Measure M-AQ-2, Construction Air Quality**, would reduce the magnitude of this impact to a less-than-significant level. While emission reductions from limiting idling, educating workers and the public and properly maintaining equipment are difficult to quantify, other measures, specifically the requirement for equipment with Tier 2 engines and Level 3 Verified Diesel Emission Control Strategy (VDECS) can reduce construction emissions by 89 to 94 percent compared to equipment with engines meeting no emission standards and without VDECS.⁵⁹ Emissions reductions from the combination of Tier 2 equipment with level 3 VDECS is almost equivalent to requiring only equipment with Tier 4 Final engines. Therefore, compliance with **Mitigation Measure M-AQ-2** would reduce construction emissions impacts on nearby sensitive receptors to a *less-than-significant* level.

Mitigation Measure M-AQ-2: Construction Air Quality

The project sponsor or the project sponsor's Contractor shall comply with the following:

A. *Engine Requirements.*

1. All off-road equipment greater than 25 hp and operating for more than 20 total hours over the entire duration of construction activities shall have engines that meet or exceed either U.S. Environmental Protection Agency (USEPA) or California Air Resources Board (ARB) Tier 2 off-road emission standards, and have been retrofitted with an ARB Level 3 Verified Diesel Emissions Control Strategy. Equipment with engines meeting Tier 4 Interim or Tier 4 Final off-road emission standards automatically meet this requirement.
2. Where access to alternative sources of power are available, portable diesel engines shall be prohibited.
3. Diesel engines, whether for off-road or on-road equipment, shall not be left idling for more than two minutes, at any location, except as provided in

⁵⁹ PM emissions benefits are estimated by comparing off-road PM emission standards for Tier 2 with Tier 1 and 0. Tier 0 off-road engines do not have PM emission standards, but the United States Environmental Protection Agency's *Exhaust and Crankcase Emissions Factors for Nonroad Engine Modeling – Compression Ignition* has estimated Tier 0 engines between 50 hp and 100 hp to have a PM emission factor of 0.72 g/hp-hr and greater than 100 hp to have a PM emission factor of 0.40 g/hp-hr. Therefore, requiring off-road equipment to have at least a Tier 2 engine would result in between a 25 percent and 63 percent reduction in PM emissions, as compared to off-road equipment with Tier 0 or Tier 1 engines. The 25 percent reduction comes from comparing the PM emission standards for off-road engines between 25 hp and 50 hp for Tier 2 (0.45 g/bhp-hr) and Tier 1 (0.60 g/bhp-hr). The 63 percent reduction comes from comparing the PM emission standards for off-road engines above 175 hp for Tier 2 (0.15 g/bhp-hr) and Tier 0 (0.40 g/bhp-hr). In addition to the Tier 2 requirement, ARB Level 3 VDECSs are required and would reduce PM by an additional 85 percent. Therefore, the mitigation measure would result in between an 89 percent (0.0675 g/bhp-hr) and 94 percent (0.0225 g/bhp-hr) reduction in PM emissions, as compared to equipment with Tier 1 (0.60 g/bhp-hr) or Tier 0 engines (0.40 g/bhp-hr).

exceptions to the applicable state regulations regarding idling for off-road and on-road equipment (e.g., traffic conditions, safe operating conditions). The Contractor shall post legible and visible signs in English, Spanish, and Chinese, in designated queuing areas and at the construction site to remind operators of the two-minute idling limit.

4. The Contractor shall instruct construction workers and equipment operators on the maintenance and tuning of construction equipment, and require that such workers and operators properly maintain and tune equipment in accordance with manufacturer specifications.

B. Waivers.

1. The Planning Department’s Environmental Review Officer (ERO) or designee may waive the alternative source of power requirement of Subsection (A)(2) if an alternative source of power is limited or infeasible at the project site. If the ERO grants the waiver, the Contractor must submit documentation that the equipment used for on-site power generation meets the requirements of Subsection (A)(1).
2. The ERO may waive the equipment requirements of Subsection (A)(1) if: a particular piece of off-road equipment with an ARB Level 3 VDECS is technically not feasible; the equipment would not produce desired emissions reduction due to expected operating modes; installation of the equipment would create a safety hazard or impaired visibility for the operator; or, there is a compelling emergency need to use off-road equipment that is not retrofitted with an ARB Level 3 VDECS. If the ERO grants the waiver, the Contractor must use the next cleanest piece of off-road equipment, according to the table below.

Table – Off-Road Equipment Compliance Step-down Schedule

| Compliance Alternative | Engine Emission Standard | Emissions Control |
|-------------------------------|---------------------------------|--------------------------|
| 1 | Tier 2 | ARB Level 2 VDECS |
| 2 | Tier 2 | ARB Level 1 VDECS |
| 3 | Tier 2 | Alternative Fuel* |

How to use the table: If the ERO determines that the equipment requirements cannot be met, then the project sponsor would need to meet Compliance Alternative 1. If the ERO determines that the Contractor cannot supply off-road equipment meeting Compliance Alternative 1, then the Contractor must meet Compliance Alternative 2. If the ERO determines that the Contractor cannot supply off-road equipment meeting Compliance Alternative 2, then the Contractor must meet Compliance Alternative 3. Alternative fuels are not a VDECS.

C. Construction Emissions Minimization Plan. Before starting on-site construction

activities, the Contractor shall submit a Construction Emissions Minimization Plan (Plan) to the ERO for review and approval. The Plan shall state, in reasonable detail, how the Contractor will meet the requirements of Section A.

1. The Plan shall include estimates of the construction timeline by phase, with a description of each piece of off-road equipment required for every construction phase. The description may include, but is not limited to: equipment type, equipment manufacturer, equipment identification number, engine model year, engine certification (Tier rating), horsepower, engine serial number, and expected fuel usage and hours of operation. For VDECS installed, the description may include: technology type, serial number, make, model, manufacturer, ARB verification number level, and installation date and hour meter reading on installation date. For off-road equipment using alternative fuels, the description shall also specify the type of alternative fuel being used.
 2. The project sponsor shall ensure that all applicable requirements of the Plan have been incorporated into the contract specifications. The Plan shall include a certification statement that the Contractor agrees to comply fully with the Plan.
 3. The Contractor shall make the Plan available to the public for review on-site during working hours. The Contractor shall post at the construction site a legible and visible sign summarizing the Plan. The sign shall also state that the public may ask to inspect the Plan for the project at any time during working hours and shall explain how to request to inspect the Plan. The Contractor shall post at least one copy of the sign in a visible location on each side of the construction site facing a public right-of-way.
- D. *Monitoring.* After start of construction activities, the Contractor shall submit quarterly reports to the ERO documenting compliance with the Plan. After completion of construction activities and prior to receiving a final certificate of occupancy, the project sponsor shall submit to the ERO a final report summarizing construction activities, including the start and end dates and duration of each construction phase, and the specific information required in the Plan.

Operational Air Quality Impacts

Land use projects typically result in emissions of criteria air pollutants and TACs primarily from an increase in motor vehicle trips. However, land use projects may also result in emissions of criteria air pollutants and TACs from combustion of natural gas, landscape maintenance, use of consumer products, and architectural coating. The following discussion addresses air quality impacts resulting from operation of the proposed project.

Impact AQ-3: During project operations, the proposed project would result in emissions of criteria air pollutants, but not at levels that would violate an air quality standard, contribute to an existing or projected air quality violation, or result in a cumulatively considerable net increase in criteria air pollutants. (Less than Significant)

As discussed above in Impact AQ-1, the air district, in its CEQA Air Quality Guidelines (May 2017), has developed screening criteria to determine whether a project requires an analysis of project-generated criteria air pollutants. If all the screening criteria are met by a proposed project, then the lead agency or applicant does not need to perform a detailed air quality assessment.

The proposed project consists of the construction of a 13-story building containing 168 dwelling units and approximately 6,241 square feet of commercial spaces. The proposed project is below the operational screening criteria for the “apartment, high-rise, 510 dwelling units” and the “regional shopping center, 99,000 square feet” land use types identified in the CEQA Air Quality Guidelines. Thus, the proposed project would not exceed any of the significance thresholds for criteria air pollutants, and quantification of the proposed project’s operational criteria air pollutant emissions is not required. For these reasons, the proposed project’s operation would result in a less-than-significant impact related to criteria air pollutants.

Impact AQ-4: The proposed project would generate toxic air contaminants, including diesel particulate matter, which would expose sensitive receptors to substantial air pollutant concentrations. (Less than Significant with Mitigation)

As discussed above, the project site is located within an APEZ. The proposed project consists of constructing a 13-story building containing residential uses. Existing sensitive land uses in the project vicinity include residential uses to the west and a school to the north of the project site.

Vehicle Trips

Individual projects result in emissions of TACs primarily as a result of an increase in vehicle trips. The air district considers roads with fewer than 10,000 vehicles per day “minor, low-impact” sources that do not pose a significant health impact even in combination with other nearby sources and recommends that these sources be excluded from the environmental analysis. The proposed project’s 262 daily vehicle trips would be well below this level and would be distributed among the local roadway network. Therefore an assessment of project-generated TACs resulting from vehicle trips is not required.

Backup Emergency Generators

The proposed project would include, on the roof, a backup diesel generator of no more than 500 kW and an 8-hour-day fuel tank. Emergency generators are regulated by the air district through their New Source Review (Regulation 2, Rule 5) permitting process. The project applicant would be required to obtain applicable permits to operate an emergency generator from the air district. Although emergency generators are intended only to be used in periods of power outages,

monthly testing of the generator would be required. The air district limits testing to no more than 50 hours per year. Additionally, as part of the permitting process, the air district would limit the excess cancer risk from any facility to no more than ten per one million population and requires any source that would result in an excess cancer risk greater than one per one million population to install Best Available Control Technology for Toxics (TBACT). However, because the project site is located in an area that already experiences poor air quality, the proposed emergency back-up generator has the potential to expose sensitive receptors to substantial concentrations of diesel emissions, a known TAC, resulting in a significant air quality impact. Implementation of **Mitigation Measure AQ-4a, Best Available Control Technology for Diesel Generators**, would reduce the magnitude of this impact to a less-than-significant level by reducing emissions by 89 to 94 percent compared to equipment with engines that do not meet any emission standards and without a VDECS. Therefore, although the proposed project would add a new source of TACs within an area that already experiences poor air quality, implementation of M-AQ-4 would reduce this impact to a *less-than-significant* level.

M-AQ-4. Best Available Control Technology for Diesel Generators. The project sponsor shall ensure that the backup diesel generator meet or exceed one of the following emission standards for particulate matter: (1) Tier 4 certified engine, or (2) Tier 2 or Tier 3 certified engine that is equipped with a California Air Resources Board (ARB) Level 3 Verified Diesel Emissions Control Strategy (VDECS). A non-verified diesel emission control strategy may be used if the filter has the same particulate matter reduction as the identical ARB verified model and if the Bay Area Air Quality Management District (BAAQMD) approves of its use. The project sponsor shall submit documentation of compliance with the BAAQMD New Source Review permitting process (Regulation 2, Rule 2, and Regulation 2, Rule 5) and the emission standard requirement of this mitigation measure to the Planning Department for review and approval prior to issuance of a permit for a backup diesel generator from any City agency.

Siting Sensitive Land Uses

The proposed project consists of constructing a 13-story building containing residential uses, which are considered sensitive land uses for the purpose of air quality evaluation. For sensitive use projects within the APEZ as defined by article 38, such as the proposed project, article 38 requires that the project sponsor submit an Enhanced Ventilation Proposal for approval by the Department of Public Health that achieves protection from PM_{2.5} equivalent to that associated with a Minimum Efficiency Reporting Value 13 (MERV) filtration. The Department of Building Inspection will not issue a building permit without written notification from the Director of Public Health that the applicant has an approved Enhanced Ventilation Proposal.

In compliance with article 38, the project sponsor has submitted an initial application to the Department of Public Health.⁶⁰ The regulations and procedures set forth by article 38 would reduce exposure of sensitive receptors to substantial pollutant concentrations.

Impact AQ-5: The proposed project would not conflict with, or obstruct implementation of, the 2017 Clean Air Plan. (Less than Significant)

The most recently adopted air quality plan for the air basin is the 2017 Clean Air Plan. The 2017 Clean Air Plan is a road map that demonstrates how the San Francisco Bay Area will achieve compliance with the state ozone standards as expeditiously as practicable and how the region will reduce the transport of ozone and ozone precursors to neighboring air basins. In determining consistency with the plan, this analysis considers whether the project would: (1) support the primary goals of the plan, (2) include applicable control measures from the plan, and (3) avoid disrupting or hindering implementation of control measures identified in the plan.

The primary goals of the plan are to: (1) Protect air quality and health at the regional and local scale; (2) eliminate disparities among Bay Area communities in cancer health risk from toxic air contaminants; and (3) protect the climate by reducing greenhouse gas emissions. To meet the primary goals, the plan recommends specific control measures and actions. These control measures are grouped into various categories and include stationary and area source measures, mobile source measures, transportation control measures, land use measures, and energy and climate measures. The plan recognizes that to a great extent, community design dictates individual travel mode, and that a key long-term control strategy to reduce emissions of criteria pollutants, air toxics, and greenhouse gases from motor vehicles is to channel future Bay Area growth into vibrant urban communities where goods and services are close at hand, and people have a range of viable transportation options. To this end, the plan includes 85 control measures aimed at reducing air pollution in the air basin.

The measures most applicable to the proposed project are transportation control measures and energy and climate control measures. The proposed project's impact with respect to greenhouse gases are discussed in Section E.7, Greenhouse Gas Emissions, which demonstrates that the proposed project would comply with the applicable provisions of the city's Greenhouse Gas Reduction Strategy.

The compact development of the proposed project and high availability of viable transportation options ensure that residents could bicycle, walk, and ride transit to and from the project site instead of taking trips via private automobile. These features ensure that the project would avoid substantial growth in automobile trips and vehicle miles traveled. The proposed project's anticipated 262 net new vehicle trips would result in a negligible increase in air pollutant emissions. Furthermore, the proposed project would be generally consistent with the San Francisco General Plan. Transportation control measures that are identified in the 2017 Clean Air

⁶⁰ *Application for Article 38 Compliance Assessment, 600 Van Ness Avenue*, submitted December 11, 2017

Plan are implemented by the San Francisco General Plan and the San Francisco Planning Code, for example, through the city's Transit First Policy, bicycle parking requirements, and transit impact development fees. Compliance with these requirements would ensure the project includes relevant transportation control measures specified in the 2017 Clean Air Plan. Therefore, the proposed project would include applicable control measures identified in the 2017 Clean Air Plan to meet the 2017 Clean Air Plan's primary goals.

Examples of a project that could cause the disruption or delay of 2017 Clean Air Plan control measures are projects that would preclude the extension of a transit line or bike path, or projects that propose excessive parking beyond parking requirements. The proposed project would add 168 dwelling units and 6,241 square feet of retail space to a dense, walkable urban area near a concentration of regional and local transit service. It would not preclude the extension of a transit line or a bike path or any other transit improvement, and thus would not disrupt or hinder implementation of control measures identified in the 2017 Clean Air Plan.

For the reasons described above, the proposed project would not interfere with implementation of the 2017 Clean Air Plan, and because the proposed project would be consistent with the applicable air quality plan that demonstrates how the region will improve ambient air quality and achieve the state and federal ambient air quality standards, this impact would be less than significant.

Impact AQ-6: The proposed project would not create objectionable odors that would affect a substantial number of people. (Less than Significant)

Typical odor sources of concern include wastewater treatment plants, sanitary landfills, transfer stations, composting facilities, petroleum refineries, asphalt batch plants, chemical manufacturing facilities, fiberglass manufacturing facilities, auto body shops, rendering plants, and coffee roasting facilities. During construction, diesel exhaust from construction equipment would generate some odors. However, construction-related odors would be temporary and would not persist upon project completion. Observation indicates that the project site is not substantially affected by sources of odors.⁶¹ Additionally, the proposed project includes residential, commercial, and parking uses that would not create significant sources of new odors. Therefore, odor impacts would be less than significant.

Impact C-AQ-1: The proposed project, in combination with past, present, and reasonably foreseeable future development in the project area would contribute considerably to cumulative air quality impacts. (Less than Significant with Mitigation)

As discussed above, regional air pollution is by its very nature largely a cumulative impact. Emissions from past, present, and future projects contribute to the region's adverse air quality on a cumulative basis. No single project by itself would be sufficient in size to result in regional nonattainment of ambient air quality standards. Instead, a project's individual emissions

⁶¹ Field observation on December 6, 2017.

contribute to existing cumulative adverse air quality impacts.⁶² The project-level thresholds for criteria air pollutants are based on levels below which new sources are not anticipated to contribute to an air quality violation or result in a considerable net increase in criteria air pollutants. Therefore, because the proposed project's construction and operational emissions (Impacts AQ-1 and AQ-3, respectively) would not exceed the project-level thresholds for criteria air pollutants, the proposed project would not result in a cumulatively considerable contribution to regional air quality impacts.

As discussed above, the project site is located in an area that already experiences poor air quality. The proposed project would introduce new sources of TACs in the form of vehicle trips within an area already adversely affected by air quality. However, as discussed in Impact AQ-4, the proposed project's 262 daily vehicle trips would not pose a significant health impact even in combination with other nearby sources. However, the proposed project's construction emissions would contribute considerably to cumulative health risk impacts, as would the project's on-site backup diesel generator. Implementation of **Mitigation Measure M-AQ-2** and **Mitigation Measure M-AQ-4** would reduce the proposed project's contribution to cumulative air quality impacts to a less-than-significant level.

⁶² BAAQMD, *CEQA Air Quality Guidelines*, 2017

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 7. GREENHOUSE GAS EMISSIONS.— Would the project: | | | | | |
| a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Conflict with any applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Greenhouse gas (GHG) emissions and global climate change represent cumulative impacts. GHG emissions cumulatively contribute to the significant adverse environmental impacts of global climate change. No single project could generate enough GHG emissions to noticeably change the global average temperature; instead, the combination of GHG emissions from past, present, and future projects have contributed and will continue to contribute to global climate change and its associated environmental impacts.

The air district has prepared guidelines and methodologies for analyzing GHGs. These guidelines are consistent with CEQA Guidelines Sections 15064.4 and 15183.5 which address the analysis and determination of significant impacts from a proposed project’s GHG emissions. CEQA Guidelines Section 15064.4 allows lead agencies to rely on a qualitative analysis to describe GHG emissions resulting from a project. CEQA Guidelines Section 15183.5 allows for public agencies to analyze and mitigate GHG emissions as part of a larger plan for the reduction of GHGs and describes the required contents of such a plan. Accordingly, *San Francisco has prepared Strategies to Address Greenhouse Gas Emissions*⁶³ which presents a comprehensive assessment of policies, programs, and ordinances that collectively represent San Francisco’s qualified GHG reduction strategy in compliance with the CEQA guidelines. These GHG reduction actions have resulted in a 23.3 percent reduction in GHG emissions in 2012 compared to 1990 levels,⁶⁴ exceeding the year 2020 reduction goals outlined in the BAAQMD’s *Bay Area 2010 Clean Air Plan*, Executive Order (EO) S-3-05, and Assembly Bill (AB) 32 (also known as the Global Warming Solutions Act).⁶⁵

⁶³ San Francisco Planning Department, *Strategies to Address Greenhouse Gas Emissions in San Francisco*, 2010. This document is available online at: <http://www.sf-planning.org/index.aspx?page=2627>.

⁶⁴ ICF International, *Technical Review of the 2012 Community-wide GHG Inventory for the City and County of San Francisco*, January 21, 2015. Available at http://sfenvironment.org/sites/default/files/fliers/files/icf_verificationmemo_2012sfcommunityinventory_2015-01-21.pdf, accessed March 16, 2015.

⁶⁵ Executive Order S-3-05, Assembly Bill 32, and the *Bay Area 2010 Clean Air Plan* set a target of reducing GHG emissions to below 1990 levels by year 2020.

Given that the City' has met the State and region's 2020 GHG reduction targets and San Francisco's GHG reduction goals are consistent with, or more aggressive than, the long-term goals established under EO S-3-05⁶⁶, EO B-30-15,^{67,68} and Senate Bill (SB) 32^{69,70} the City's GHG reduction goals are consistent with EO S-3-05, EO B-30-15, AB 32, SB 32 and the *Bay Area 2010 Clean Air Plan*. Therefore, proposed projects that are consistent with the City's GHG reduction strategy would be consistent with the aforementioned GHG reduction goals, would not conflict with these plans or result in significant GHG emissions, and would therefore not exceed San Francisco's applicable GHG threshold of significance.

The following analysis of the proposed project's impact on climate change focuses on the project's contribution to cumulatively significant GHG emissions. Because the analysis is in a cumulative context, this section does not include an individual project-specific impact statement.

Impact C-GG-1: The proposed project would generate greenhouse gas emissions, but not at levels that would result in a significant impact on the environment or conflict with any policy, plan, or regulation adopted for the purpose of reducing greenhouse gas emissions. (Less than Significant)

Individual projects contribute to the cumulative effects of climate change by directly or indirectly emitting GHGs during construction and operational phases. Direct emissions include GHG emissions from new vehicle trips and area sources (natural gas combustion). Indirect emissions include emissions from electricity providers, energy required to pump, treat, and convey water, and emissions associated with waste removal, disposal, and landfill operations.

⁶⁶ Office of the Governor, Executive Order S-3-05, June 1, 2005. Available at <http://www.pcl.org/projects/2008symposium/proceedings/Coatsworth12.pdf>, accessed March 16, 2016. Executive Order S-3-05 sets forth a series of target dates by which statewide emissions of GHGs need to be progressively reduced, as follows: by 2010, reduce GHG emissions to 2000 levels (approximately 457 million metric tons of carbon dioxide equivalents (MTCO₂E)); by 2020, reduce emissions to 1990 levels (approximately 427 million MTCO₂E); and by 2050 reduce emissions to 80 percent below 1990 levels (approximately 85 million MTCO₂E). Because of the differential heat absorption potential of various GHGs, GHG emissions are frequently measured in "carbon dioxide-equivalents," which present a weighted average based on each gas's heat absorption (or "global warming") potential.

⁶⁷ Office of the Governor, *Executive Order B-30-15*, April 29, 2015. Available at <https://www.gov.ca.gov/news.php?id=18938>, accessed March 3, 2016. Executive Order B-30-15, issued on April 29, 2015, sets forth a target of reducing GHG emissions to 40 percent below 1990 levels by 2030 (estimated at 2.9 million MTCO₂E).

⁶⁸ San Francisco's GHG reduction goals are codified in Section 902 of the Environment Code and include: (i) by 2008, determine City GHG emissions for year 1990; (ii) by 2017, reduce GHG emissions by 25 percent below 1990 levels; (iii) by 2025, reduce GHG emissions by 40 percent below 1990 levels; and by 2050, reduce GHG emissions by 80 percent below 1990 levels.

⁶⁹ Senate Bill 32 amends California Health and Safety Code Division 25.5 (also known as the California Global Warming Solutions Act of 2006) by adding Section 38566, which directs that statewide greenhouse gas emissions to be reduced by 40 percent below 1990 levels by 2030.

⁷⁰ Senate Bill 32 was paired with Assembly Bill 197, which would modify the structure of the State Air Resources Board; institute requirements for the disclosure of greenhouse gas emissions criteria pollutants, and toxic air contaminants; and establish requirements for the review and adoption of rules, regulations, and measures for the reduction of greenhouse gas emissions.

The proposed project would increase the activity onsite through the construction of a 13-story, 129-foot-tall building containing 168 dwelling units and 6,241 square feet of retail. Therefore, the proposed mixed-use project would contribute to annual long-term increases in GHGs as a result of increased vehicle trips (mobile sources) and residential operations that result in an increase in energy use, water use, wastewater treatment, and solid waste disposal. Construction activities would also result in temporary increases in GHG emissions.

The proposed project would be subject to regulations adopted to reduce GHG emissions as identified in the GHG reduction strategy. As discussed below, compliance with the applicable regulations would reduce the project's GHG emissions related to transportation, energy use, waste disposal, wood burning, and use of refrigerants.

Compliance with the City's Commuter Benefits Program, Transportation Sustainability Fee, and bicycle parking requirements, would reduce the proposed project's transportation-related emissions. These regulations reduce GHG emissions from single-occupancy vehicles by promoting the use of other transportation modes with zero or lower GHG emissions on a per capita basis.

The proposed project would be required to comply with the energy efficiency requirements of the City's Green Building Code, Stormwater Management Ordinance, Residential Water Conservation Ordinance, and light pollution reduction regulations which would promote energy and water efficiency, thereby reducing the proposed project's energy-related GHG emissions.⁷¹

The proposed project's waste-related emissions would be reduced through compliance with the City's Recycling and Compositing Ordinance and the Construction and Demolition Debris Recovery and Recycling ordinances. These regulations reduce the amount of materials sent to a landfill, reducing GHGs emitted by landfill operations. These regulations also promote reuse of materials, conserving their embodied energy⁷² and reducing the energy required to produce new materials.

Compliance with other regulations, including those limiting refrigerant emissions and the Wood Burning Fireplace Ordinance would reduce emissions of GHGs and black carbon, respectively. Regulations requiring low-emitting finishes would reduce volatile organic compounds (VOCs).⁷³

⁷¹ Compliance with water conservation measures reduce the energy (and GHG emissions) required to convey, pump and treat water required for the project.

⁷² Embodied energy is the total energy required for the extraction, processing, manufacture and delivery of building materials to the building site.

⁷³ While not a GHG, VOCs are precursor pollutants that form ground level ozone. Increased ground level ozone is an anticipated effect of future global warming that would result in added health effects locally. Reducing VOC emissions would reduce the anticipated local effects of global warming.

Thus, the proposed project was determined to be consistent with San Francisco's GHG reduction strategy.⁷⁴

The project sponsor is required to comply with these regulations, which have proven effective as San Francisco's GHG emissions have measurably decreased when compared to 1990 emissions levels, demonstrating that the City has met and exceeded EO S-3-05, AB 32, and the *Bay Area 2010 Clean Air Plan* GHG reduction goals for the year 2020. Other existing regulations, such as those implemented through AB 32, will continue to reduce a proposed project's contribution to climate change. In addition, San Francisco's local GHG reduction targets are consistent with the long-term GHG reduction goals of EO S-3-05, EO B-30-15, AB 32, SB 32 and the *Bay Area 2010 Clean Air Plan*. Therefore, because the proposed projects is consistent with the City's GHG reduction strategy, it is also consistent with the GHG reduction goals of EO S-3-05, EO B-30-15, AB 32, SB 32 and the *Bay Area 2010 Clean Air Plan*, would not conflict with these plans, and would therefore not exceed San Francisco's applicable GHG threshold of significance. As such, the proposed project would result in a less-than-significant impact with respect to GHG emissions. No mitigation measures are necessary.

⁷⁴ San Francisco Planning Department, *Greenhouse Gas Analysis: Compliance Checklist for 600 Van Ness Avenue*, October 31, 2017.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 8. WIND AND SHADOW.—Would the project: | | | | | |
| a) Alter wind in a manner that substantially affects public areas? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Create new shadow in a manner that substantially affects outdoor recreation facilities or other public areas? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Impact WS-1: The proposed project would not alter wind in a manner that substantially affects public areas. (Less than Significant)

Average wind speeds in San Francisco are the highest in the summer and lowest in winter. However, the strongest peak winds occur in winter. Throughout the year, the highest wind speeds occur in midafternoon and the lowest in the early morning. West-northwest, west, northwest, and west-southwest are the most frequent and strongest of primary wind directions during all seasons (referred to as prevailing winds).

Tall buildings and exposed structures can strongly affect the wind environment for pedestrians. A building that stands alone or is much taller than the surrounding buildings can intercept and redirect winds that might otherwise flow overhead and bring them down the vertical face of the building to ground level, where they create ground-level wind and turbulence. These redirected winds can be relatively strong, turbulent, and incompatible with the intended uses of nearby ground-level spaces. A building with a height that is similar to the heights of surrounding buildings typically would cause little or no additional ground level wind acceleration and turbulence. Thus, wind impacts are generally caused by large building masses extending substantially above their surroundings, and by buildings oriented such that a large wall catches a prevailing wind, particularly if such a wall includes little or no articulation. In general, new buildings less than approximately 80 feet in height are unlikely to result in substantial adverse effects on ground level winds such that pedestrians would be uncomfortable. Such winds may exist under existing conditions, but shorter buildings typically do not cause substantial changes in ground-level winds. The Planning Code sets criteria for comfort and hazards. For the purposes of evaluating impacts under CEQA, the analysis uses the hazard criterion to determine whether the proposed project would alter wind in a manner that substantially affects public areas.

The Planning Code pedestrian comfort criterion of 11 miles per hour (mph) is based on wind speeds measured and averaged over a period of 1 minute. In contrast, the Planning Code wind hazard criterion of 26 mph is defined by a wind speed that is measured and averaged over a period of 1 hour. When stated on the same time basis as the comfort criterion wind speed, the hazard criterion wind speed (26 mph averaged over 1 hour) is equivalent to a 1-minute average of 36 mph, which is a speed where wind gusts can blow people over, and therefore, are

hazardous. The project site is located in the Van Ness Special Use District (SUD). Pursuant to San Francisco Planning Code Section 243(c)(15)(B)(ii), “no building or addition shall be permitted that causes equivalent wind speeds to reach or exceed the hazard level of 26 miles per hour (mph) for a single hour of the year.” As stated previously, the analysis uses the hazard criterion to determine significant effects under CEQA. The project’s effects related to the comfort criterion are presented for informational purposes.

A wind study, which included a wind tunnel test, was prepared for the proposed project.⁷⁵ The following discussion relies on the information provided in that report. The wind tunnel testing followed San Francisco Planning Department protocols. Wind tunnel testing was conducted at 90 wind speed sensor locations under existing conditions, within a 1,200-foot radius of the project site, at a pedestrian height of approximately five feet. The results of the wind tunnel testing indicate that 13 of the 90 locations, primarily around the Federal Building, located approximately 500 feet east of the project site, and the California Public Utilities Commission building, located approximately 450 feet to the southwest of the project site, currently exceed the hazard criterion under existing conditions.

The addition of the proposed project would not increase the total number of locations exceeding the wind hazard criterion, and would reduce the total hours of hazardous wind speeds from 124 hours under existing conditions to 99 hours with the addition of the proposed project. Absolute hours of hazardous wind speeds would decrease between one and three hours at locations at the intersections of Polk Street and Golden Gate Avenue and would decrease between three and sixteen hours at the intersection of Polk and Turk streets, both east of the project site. Absolute hours of hazardous wind speeds would increase by between one and four hours at locations on the north side of Golden Gate Avenue, between Polk Street and Larkin Street, east of the project site, and by one hour at the corner of Van Ness Avenue and McAllister Street, in front of the California Public Utilities Commission Building, southwest of the project site. Implementation of the proposed project would improve wind conditions at six locations with existing wind hazard exceedances, including substantial improvements at the intersection of Polk and Turk streets, while making wind conditions worse for one hour at two locations and by four hours at one location with existing wind exceedances. The proposed project would result in an overall decrease of 25 hours of hazardous wind conditions in the proximity of the project site, with no new exceedances. For these reasons, the proposed project would have less than significant wind impacts.

The results of the wind tunnel testing indicate that 58 of the 90 sensor locations exceed the Planning Code’s 11 mph pedestrian comfort criterion under existing conditions. Wind speeds of 10 percent exceedance (i.e., the wind speed exceeded 10 percent of the time) are 14 mph on average over the 90 sensor locations. The nearest comfort criterion exceedances to the project site

⁷⁵ RWDI, *600 Van Ness Avenue Pedestrian Wind Study*, November 7, 2017.

are along the entire length of the east side of Van Ness Avenue from Turk Street to McAllister Street and along stretches of Golden Gate Avenue between Polk Street and Van Ness Avenue. Wind tunnel testing conducted for existing plus project conditions indicate that the number of sensor locations that exceed the Planning Code's 11 mph comfort criterion would increase from 58 under existing conditions to 60 under existing plus project conditions. These two additional sensor locations are located along the Van Ness Avenue frontage of the proposed project.

Impact WS-2: The proposed project would not create new shadow in a manner that substantially affects outdoor recreation facilities or other public areas. (Less than Significant)

In 1984, San Francisco voters approved an initiative known as "Proposition K, The Sunlight Ordinance," which was codified as Planning Code Section 295 in 1985. Planning Code Section 295 generally prohibits new structures above 40 feet in height that would cast additional shadows on open space that is under the jurisdiction of the San Francisco Recreation and Park Commission between one hour after sunrise and one hour before sunset, at any time of the year, unless that shadow would not result in a significant adverse effect on the use of the open space. Public open spaces that are not under the jurisdiction of the Recreation and Park Commission as well as private open spaces are not subject to Planning Code Section 295.

Implementation of the proposed project would result in the construction of a 129-foot-8-inch-tall (138 feet 8 inches tall with elevator penthouse and equipment), thirteen-story-over-basement mixed-use residential building. The Planning Department prepared a preliminary shadow fan analysis to determine whether the proposed project would have the potential to cast new shadow on nearby parks or open spaces. The initial shadow fan analysis prepared by the Planning Department determined that the project as proposed had the potential to cast new shadow on Civic Center Plaza. However, this initial analysis did not take into account any intervening buildings or building articulation. 525 Golden Gate Avenue and 350 McAllister Avenue, both of which are approximately 180 feet tall, are located to the south of the project site, between the project site and the portion of Civic Center Plaza onto which the initial shadow fan indicated potential new shadow would fall. As both buildings are taller than the proposed project, the proposed project's new shadow would be blocked by these two buildings and would not contribute any new shadow to Civic Center Plaza.

The proposed project would shade portions of streets, sidewalks, and private properties in the project vicinity at various times of the day throughout the year. Shadows on streets and sidewalks would not exceed levels commonly expected in urban areas and would be considered a less-than-significant effect under CEQA. Although occupants of nearby properties may regard the increase in shadow as undesirable, the limited increase in shading of private properties as a result of the proposed project would not be considered a significant impact under CEQA.

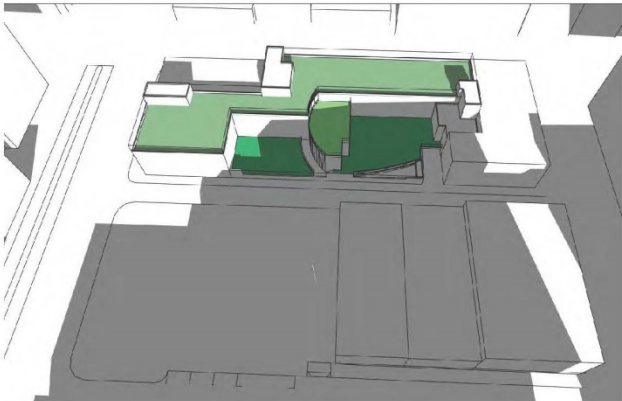
For these reasons, the proposed project would not create new shadow in a manner that substantially affects outdoor recreation facilities or other public areas, and this impact would be less than significant.

The project site is located across Elm Street from Tenderloin Community School, a San Francisco Unified School District (SFUSD) elementary school. The school operates on a regular SFUSD academic calendar, from the middle of August to the beginning of June, with weeks off in November, December, January and March for school holidays. The school is not otherwise open to the public as it is locked before and after school hours and on weekends. Information about new shadow cast by the proposed project on the school is presented here for informational purposes.

The school currently has four playground open spaces, two of which are located on the roofs of existing school buildings (the Upper and Middle playgrounds) and two of which are located at ground level along Elm Street (Lower playgrounds). The school's playgrounds are currently shaded throughout the year by existing buildings to the south and west of the school. The proposed project would increase the shadow cast on the school's playgrounds, primarily in the winter months, with the Lower playgrounds experiencing the most new shadow and the Upper playgrounds experiencing the least. The greatest amount of new shadow occurs in late December, where, on average, the Upper playground would experience 18% more shadow, the Middle playground 20% more shadow, and the Lower playgrounds 41% more shadow, with new shadow on all playgrounds beginning at 9:30 a.m. and lasting until 3:30 p.m., the end of the school day (see Figure 21). In January and November, on average, the Upper Playground would experience 10% more shadow, the Middle playground 15% more shadow, and the Lower playgrounds 34% more shadow, with new shadow beginning on the Upper playground around 10:00 a.m., on the Lower playgrounds around 11:00 a.m., and on the Middle Playground around 1:30 p.m., lasting until 3:30 p.m., the end of the school day (see Figure 22). In October and February, on average, the Upper Playground would experience 5% more shadow, the Middle playground an average of 3% more shadow, and the Lower playgrounds 18% more shadow, with new shadow on the upper playground beginning at 9:30 a.m., on the Lower playground around 10:00 a.m., and on the Middle playground by around 1:30 p.m., lasting until 3:30 p.m., the end of the school day (see Figure 23). From April to August of each year, the proposed project would cast no new shadow on any of the playgrounds.⁷⁶

⁷⁶ AI Ltd, *600 Van Ness Shadow Study*, January 11, 2018.

Figure 21: December 21 Shadow Diagrams

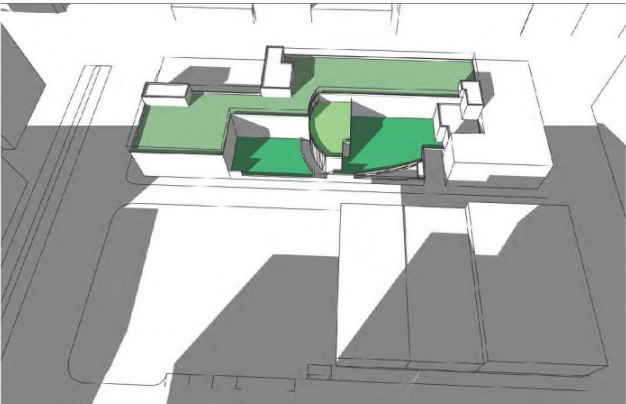


WITHOUT 600 VAN NESS



WITH 600 VAN NESS

DECEMBER 21 10:30 AM



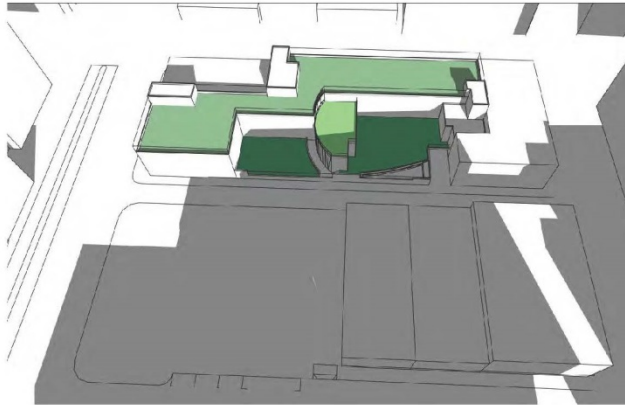
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DECEMBER 21 2:00 PM

Figure 22: January 21 Shadow Diagrams



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WITH 600 VAN NESS

JANUARY 21 10:30 AM



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JANUARY 21 1:00 PM

Figure 23: February 21 Shadow Diagrams

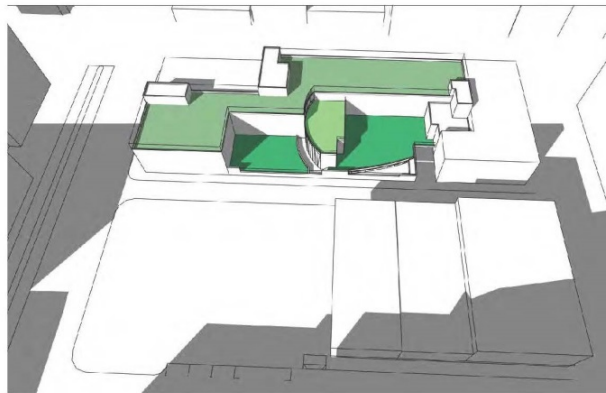


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FEBRUARY 21 10:00 AM



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Impact C-WS-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative wind impact. (Less than Significant)

The wind study prepared for the proposed project also analyzed the proposed project in the context of other proposed and in-construction projects. Under cumulative conditions, no new exceedances of the hazard criterion would occur in comparison to existing conditions, and the total number of hours where wind speeds exceed the wind hazard criterion would be reduced from 124 hours under existing conditions to 99 hours under cumulative conditions (same as existing plus project). The number of hours where the duration of wind exceedances would decrease between existing and cumulative conditions include two hours on the southern side of Golden Gate Avenue, between Polk and Larkin streets; an average of five hours at two sensors at the intersection of Turk and Polk streets; and sixteen hours along the east side of the Polk Street sidewalk adjacent to the plaza at the Federal Building. The number of hours where the duration of wind exceedances would increase between existing and cumulative conditions are for an average of about an hour-and-a half along the sidewalk on the north side of Golden Gate Avenue, between Polk and Larkin streets. Under cumulative conditions, wind conditions at four locations with existing wind hazard exceedances would improve, including improvements at the intersection of Polk and Turk streets, while wind conditions would be worse for one hour at three locations and for two hours at one location with existing wind exceedances. Under cumulative conditions, there would be an overall decrease of 25 hours of hazardous wind conditions in the proximity of the project site, with no new exceedances. For these reasons, the proposed project would not combine with past, present, and reasonably foreseeable future projects in the project vicinity to create a significant cumulative wind impact.

Wind tunnel testing conducted for cumulative conditions indicate that the number of sensor locations that exceed the Planning Code's 11 mph comfort criterion would increase from 58 under existing conditions to 61 under cumulative conditions (four sensor locations added, one eliminated). Locations that would experience new comfort exceedances include the Van Ness Avenue frontage of the proposed project, the Golden Gate Avenue frontage of the proposed project and a location on Redwood Street between Van Ness Avenue and Polk Street. Locations that would no longer experience comfort exceedances include both sides of Golden Gate Avenue east of the project site.

Impact C-WS-2: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative shadow impact. (Less than Significant)

As discussed above, the proposed project would not shadow any nearby parks or open spaces. Therefore, the proposed project would not contribute to any potential cumulative shadow impact on parks and open spaces.

The sidewalks in the project vicinity are already shaded for periods of the day by the densely developed, multi-story buildings. Although implementation of the proposed project and nearby cumulative development projects would add net new shadow to the sidewalks in the project vicinity, these shadows would be transitory in nature, would not substantially affect the use of the sidewalks, and would not increase shadows above levels that are common and generally expected in a densely developed urban environment.

For these reasons, the proposed project would not combine with past, present, and reasonably foreseeable future projects in the project vicinity to create a significant cumulative shadow impact.

| <i>Topics:</i> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 9. RECREATION. | | | | | |
| a) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facilities would occur or be accelerated? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Does the project include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Impact RE-1: The proposed project would not result in substantial increase in the use of existing parks and recreational facilities, the deterioration of such facilities, include recreation facilities, or require the expansion of recreational facilities. (Less than Significant)

The neighborhood parks or other recreational facilities closest to the project site are Civic Center Plaza (780 feet south east of the project site), James K Lang Field and Jefferson Square Park (1,100 feet west of the project site), and the Turk and Hyde Mini Park (1,320 feet north east of the project site).

The proposed project includes an approximately 4,398-square-foot common open space at the second floor, an approximately 2,109-square-foot common open space on the sixth floor, and an approximately 1,133-square-foot common open space on the ninth floor. Six of the proposed units would each include a private patio ranging from 525 to 1,331 square feet in size. In addition, residents of the proposed units would be within walking distance of the above-noted open spaces.

Although the proposed project would introduce a new permanent population (approximately 295 residents) to the project site, the number of new residents projected would not be large

enough to substantially increase demand for, or use of, neighborhood parks or recreational facilities, such that substantial physical deterioration would be expected. The permanent residential population on the site and the incremental on-site daytime population growth that would result from the proposed commercial use would not require the construction of new recreational facilities or the expansion of existing facilities. Additionally, project-related construction activities would occur within the boundaries of the project site, which does not include any existing recreational resources.

For these reasons, the proposed project would have a less-than-significant impact on recreational facilities and resources.

Impact C-RE-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact on recreational facilities or resources. (Less than Significant)

Cumulative development in the project vicinity would result in an intensification of land uses and a cumulative increase in the demand for recreational facilities and resources. The City has accounted for such growth as part of the Recreation and Open Space Element of the *General Plan*.⁷⁷ In addition, San Francisco voters passed two bond measures, in 2008 and 2012, to fund the acquisition, planning, and renovation of the City's network of recreational resources. As discussed above, there are three parks, open spaces, or other recreational facilities within 1,300 feet of the project site. It is expected that these existing recreational facilities would be able to accommodate the increase in demand for recreational resources generated by nearby cumulative development projects. For these reasons, the proposed project would not combine with past, present, and reasonably foreseeable future projects in the project vicinity to create a significant cumulative impact on recreational facilities or resources.

⁷⁷ San Francisco Planning Department, *San Francisco General Plan*, Recreation and Open Space Element, April 2014, pp. 20-36. Available online at http://www.sf-planning.org/ftp/General_Plan/Recreation_OpenSpace_Element_ADOPTED.pdf, accessed May 20, 2016.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|---|---|---|---|--------------------------|---------------------------|
| 10. UTILITIES AND SERVICE SYSTEMS. | | | | | |
| Would the project: | | | | | |
| a) Exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Require or result in the construction of new storm water drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) Have sufficient water supply available to serve the project from existing entitlements and resources, or are new expanded entitlements needed? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has inadequate capacity to serve the project's projected demand in addition to the provider's existing commitments? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| f) Be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| g) Comply with federal, state, and local statutes and regulations related to solid waste? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

Impact UT-1: Implementation of the proposed project would not exceed wastewater treatment requirements of the applicable Regional Water Quality Control Board, would not exceed the capacity of the wastewater treatment provider that would serve the project, and would not require the construction of new, or expansion of existing, wastewater treatment or stormwater drainage facilities. (Less than Significant)

The project site is served by San Francisco's combined sewer system, which handles both sewage and stormwater runoff. The Southeast Water Pollution Control Plant provides wastewater and stormwater treatment and management for the east side of the city, including the project site. The proposed project would add approximately 295 residents and 18 employees, which would not substantially increase the amount of wastewater generated at the project site. In addition, the proposed project would incorporate water-efficient fixtures, as required by Title 24 of the California Code of Regulations and the San Francisco Green Building Ordinance. Compliance

with these regulations would reduce wastewater flows and the amount of potable water used for building functions. The incorporation of water-efficient fixtures into new development is also accounted for by the SFPUC in their *2015 Urban Water Management Plan*,⁷⁸ because widespread adoption can lead to more efficient use of existing capacity.

The proposed project would also meet the wastewater pre-treatment requirements of the SFPUC, as required by the San Francisco Industrial Waste Ordinance in order to meet Regional Water Quality Control Board requirements (see discussion under Impact HY-1, under Topic 14, for additional stormwater management requirements).⁷⁹ Although the proposed project would add new residents and employees to the project site, this additional population is not beyond the growth projections included in long range plans for the city's wastewater system. Therefore, the incremental increase in the demand for wastewater would not require construction of new wastewater treatment facilities or expansion of existing facilities.

The proposed project would not substantially increase the amount of impervious surfaces at the project site. Compliance with the City's Stormwater Management Ordinance, adopted in 2010 and amended in 2016, and the 2016 Stormwater Management Requirements and Design Guidelines would require the proposed project to reduce or eliminate the existing volume and rate of stormwater runoff discharged from the project site. Since the project site is previously developed and entirely covered in impervious surfaces, the proposed project must include stormwater features that will reduce the stormwater runoff rate and volume by 25% relative to pre-development conditions for the 2-year, 24-hour design storm. The Stormwater Management Requirements set forth a hierarchy of best management practices (BMPs) to meet the stormwater runoff requirements. First priority BMPs involve reduction in stormwater runoff through approaches such as rainwater harvesting and reuse (e.g., for toilets and urinals and/or irrigation); infiltration through a rain garden, swale, trench, or basin; or through the use of permeable pavement or a green roof. Second priority BMPs include biotreatment approaches such as the use of flow-through planters or, for large sites, constructed wetlands. Third priority BMPs, only permitted under special circumstances, involve use of a filter to treat stormwater.

To achieve compliance with the Stormwater Management Requirements, the proposed project would implement and install appropriate stormwater management systems, such as permeable pavers and landscaping, that would manage stormwater on-site and limit demand on both the collection system and wastewater facilities. A Stormwater Control Plan would be required for review and approval by the SFPUC. The Stormwater Control Plan would also include a maintenance agreement that must be signed by the project sponsor to ensure proper care of the necessary stormwater controls. Therefore, the proposed project would not substantially increase

⁷⁸ San Francisco Public Utilities Commission, *2015 Urban Water Management Plan for the City and County of San Francisco*, June 2016.

⁷⁹ City and County of San Francisco, Ordinance No. 19-92, *San Francisco Municipal Code* (Public Works), Part II, Chapter X, Article 4.1 (amended), January 13, 1992.

the amount of stormwater runoff to the extent that existing facilities would need to be expanded or new facilities would need to be constructed; as such, the impacts would be less than significant.

Overall, while the proposed project would add to sewage flows in the area, it would not cause collection treatment capacity of the sewer system in the city to be exceeded. The proposed project also would not exceed wastewater treatment requirements of the Regional Water Quality Control Board, and would not require the construction of new wastewater/stormwater treatment facilities or expansion of existing ones. Therefore, since the proposed project would not require the construction of new or expanded wastewater or stormwater collection, conveyance or treatment facilities that could have a significant impact on the environment, the impact would be less than significant.

Impact UT-2: The SFPUC has sufficient water supply and entitlements to serve the proposed project, and approval of the proposed project would not require expansion or construction of new water supply or treatment facilities. (Less than Significant)

Implementation of the proposed project, which consists of 168 dwelling units and approximately 6,241 square feet of commercial space, would add approximately 295 residents and 18 employees to the site and incrementally increase the demand for water in San Francisco. However, the proposed project would not result in a population increase and corresponding water demand beyond that assumed for planning purposes by the SFPUC's *2015 Urban Water Management Plan* (2015 UWMP).⁸⁰

The 2015 UWMP uses year 2035 growth projections prepared by the Planning Department and the Association of Bay Area Governments to estimate future water demand. The proposed project is within the demand projections of the 2015 UWMP and would not exceed the water supply projections.

Although the total amount of water demand would increase at the project site, the proposed building would be designed to incorporate water-efficient fixtures as required by Title 24 of the California Code of Regulations and the City's Green Building Ordinance. Section 4.303 of the Green Building Code requires plumbing fixtures and fixture fittings that would reduce the overall use of potable water use within the proposed building by at least 20 percent. Because the proposed water demand could be accommodated by existing and planned water supply anticipated under the 2015 UWMP, the proposed project would not result in a substantial increase in water use and would be served from existing water supply entitlements and resources. In addition, the proposed project would include water conservation devices such as low-flow showerheads and low-flush toilets. For these reasons, there would be sufficient water supply available to serve the proposed project from existing water supply entitlements and resources, and new or expanded resources or entitlements would not be required. This impact would be less than significant.

⁸⁰ San Francisco Public Utilities Commission, *2015 Urban Water Management Plan for the City and County of San Francisco*, June 2016.

Impact UT-3: The proposed project would be served by a landfill with sufficient permitted capacity to accommodate the project's solid waste disposal needs, and would follow all applicable statutes and regulations related to solid waste. (*Less than Significant*)

In September 2015, the City approved an Agreement with Recology, Inc. for the transport and disposal of the City's municipal solid waste at the Recology Hay Road Landfill in Solano County. The City began disposing its municipal solid waste at Recology Hay Road Landfill in January 2016, and that practice is anticipated to continue for approximately nine years, with an option to renew the agreement thereafter for an additional six years. San Francisco had a goal of 75 percent solid waste diversion by 2010, which it exceeded at 80 percent diversion, and has a goal of 100 percent solid waste diversion or "zero waste" to landfill or incineration by 2020. San Francisco Ordinance No. 27-06 requires mixed construction and demolition debris be transported by a Registered Transporter and taken to a Registered Facility that must recover for reuse or recycling and divert from landfill at least 65 percent of all received construction and demolition debris. San Francisco's Mandatory Recycling and Composting Ordinance No. 100-09 requires all properties and everyone in the City to separate their recyclables, compostables, and landfill trash.

The proposed project would incrementally increase total waste generation from the City; however, the proposed project would be required to comply with San Francisco Ordinance Nos. 27-06 and 100-09. Due to the existing and anticipated increase of solid waste recycling in the City and the agreement with Recology for diversion of solid waste to the Hay Road Landfill, any increase in solid waste resulting from the proposed project would be accommodated by the existing landfill. Thus, the proposed project would have less-than-significant impacts related to solid waste.

Impact C-UT-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact on utilities and service systems. (*Less than Significant*)

The proposed project would not substantially impact utility supply or service. Nearby development would not contribute to a cumulatively substantial effect on the utility infrastructure of the Downtown/Civic Center neighborhood. Furthermore, existing service management plans address anticipated growth in the surrounding area and the region. Therefore, the proposed project, in combination with other past, present, and reasonably foreseeable future projects, have been accounted for in these plans and would not result in a cumulative utilities and service systems impact.

| <u>Topics:</u> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|---|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 11. PUBLIC SERVICES. | | | | | |
| a) Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered government facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times, or other performance objectives for any of the public services such as fire protection, police protection, schools, parks, or other public facilities? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

For a discussion of impacts on parks, refer to Section E.9, Recreation.

Impact PS-1: The proposed project would increase demand for police protection, fire protection, and other government services, but not to an extent that would require new or physically altered governmental facilities, the construction of which could cause significant environmental impacts. (Less than Significant)

The project site receives fire protection and emergency medical services from the San Francisco Fire Department’s Fire Station No. 36 at 109 Oak Street, approximately 0.4 mile southwest of the project site.⁸¹ The project site receives police protection services from the San Francisco Police Department’s Tenderloin Station at 301 Eddy Street, approximately 0.4 mile northeast of the project site.⁸² Implementation of the proposed project would add about 295 residents and 18 employees on the project site, which would increase the demand for fire protection, emergency medical, and police protection services. This increase in demand would not be substantial given the overall demand for such services on a citywide basis. Fire protection, emergency medical, and police protection resources are regularly redeployed based on need in order to maintain acceptable service ratios. Moreover, the proximity of the project site to Fire Station No. 36 and the Tenderloin Police Station would help minimize Fire Department and Police Department response times should incidents occur at the project site. The proposed project would also incrementally increase the demand for other governmental services and facilities, such as libraries. The San Francisco Public Library operates 27 branches throughout San Francisco,⁸³ and the Main Library Branch, approximately 0.25 miles southeast of the project site, would accommodate the minor increase in demand for library services generated by the proposed project. Therefore, impacts on police, fire, and other governmental services would be less than significant.

⁸¹ San Francisco Fire Department website, <http://www.sf-fire.org/index.aspx?page=176#divisions>, accessed December 7, 2017.

⁸² San Francisco Police Department website, <http://sanfranciscopolice.org/index.aspx?page=796>, accessed December 7, 2017.

⁸³ San Francisco Public Library website, <http://sfpl.org/pdf/libraries/sfpl421.pdf>, accessed May 19, 2016.

Impact PS-2: The proposed project would not substantially increase the population of school-aged children and would not require new or physically altered school facilities. (Less than Significant)

Implementation of the proposed project would result in the construction of 168 dwelling units and an anticipated population increase of about 295 residents. Some of the new residents of the could consist of families with school-aged children who might attend schools operated by the San Francisco Unified School District (SFUSD), while others might attend private schools. It is anticipated that existing SFUSD schools in the project vicinity would be able to accommodate this minor increase in demand. Furthermore, the proposed project would be required to pay a school impact fee based on the construction of net new residential square footage to fund SFUSD facilities and operations. For these reasons, implementation of the proposed project would not result in a substantial unmet demand for school facilities and would not require the construction of new, or alteration of existing, school facilities.

For a discussion of impacts of shadow on schools, refer to Section E.8, Wind and Shadow.

Impact C-PS-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact on public services. (Less than Significant)

Cumulative development in the project vicinity would result in an intensification of land uses and a cumulative increase in the demand for fire protection, police protection, school services, and other public services. The Fire Department, the Police Department, the SFUSD, and other City agencies have accounted for such growth in providing public services to the residents of San Francisco. Nearby cumulative development projects would be subject to many of the same development impact fees applicable to the proposed project. For these reasons, the proposed project would not combine with past, present, and reasonably foreseeable future projects in the project vicinity to create a significant cumulative impact on public services.

| <u>Topics:</u> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|--|---------------------------------------|---|-------------------------------------|-------------------------------------|-------------------------------------|
| 12. BIOLOGICAL RESOURCES:— Would the project: | | | | | |
| a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| c) Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

The project site is not located within an adopted Habitat Conservation Plan, a Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plans. The project site is not located within a federally protected wetland, as defined by Section 404 of the Clean Water Act, and does not contain riparian habitat or other sensitive natural communities. Therefore, topics 12b, 12c, and 12f are not applicable to the proposed project.

Impact BI-1: The proposed project would not have a substantial adverse effect, either directly or through habitat modifications, on any special-status species. (No Impact)

The proposed project area is located in an urban environment with high levels of human activity, and only common bird species are likely to nest in the area. The project site is a previously

developed lot and thus, any special-status species have been extirpated from the project area. The project site does not provide habitat for any rare or endangered plant or wildlife species. The proposed project includes five new trees and does not include the removal of any trees or any other features that may contain habitat for any special-status species. Therefore, the proposed project would have no impact on special-status species.

Impact BI-2: The proposed project would not interfere with the movement of native resident or wildlife species or with established native resident or migratory wildlife corridors. (No Impact)

San Francisco is within the Pacific Flyway, a major north-south route of travel for migratory birds along the western portion of the Americas. Nesting birds, their nests, and eggs are fully protected by the California Fish and Game Code (Sections 3503, 3503.5) and the federal Migratory Bird Treaty Act (MBTA). The proposed project includes the removal of four trees from the project site. Tree removal activities could potentially disturb nesting birds that are protected under the California Fish and Game Code or the MBTA. For the purposes of CEQA, a project that has the potential to substantially reduce the habitat, restrict the range, or cause a population of a native bird species to drop below self-sustaining levels could be considered a potentially significant biological resource impact requiring mitigation.⁸⁴ As the proposed project does not include the removal of any trees, there would be no adverse impacts on nesting birds.

The location, height, and material of buildings, particularly transparent or reflective glass, may present risks for birds as they travel along their migratory paths. The City has adopted guidelines to address this issue and provided regulations for bird-safe design within San Francisco. Planning Code, Section 139, Standards for Bird-Safe Buildings, establishes building design standards to reduce avian mortality rates associated with bird strikes.⁸⁵ The project site is not located in an Urban Bird Refuge, so the standards concerning location-related hazards are not applicable to the proposed project.⁸⁶ The proposed project would comply with the building feature-related hazard standards of Section 139 by using bird-safe glazing treatment on 100 percent of any building feature-related hazard.

Overall, the proposed project would be subject to and would be required comply with City-adopted regulations for bird-safe buildings and federal and State migratory bird regulations. For these reasons, the proposed project would not interfere with the movement of any native resident or wildlife species or with established native resident or migratory wildlife corridors. Therefore, the proposed project would result in No Impact on migratory species movement.

⁸⁴ California Fish and Game Code Section 3503; Section 681, Title 14, California Code of Regulations.

⁸⁵ San Francisco Planning Department, *Standards for Bird-Safe Buildings*, July 14, 2001. Available online at http://208.121.200.84/ftp/files/publications_reports/bird_safe_bldgs/Standards%20for%20Bird%20Safe%20Buildings%20-%2011-30-11.pdf, accessed on August 23, 2016.

⁸⁶ San Francisco Planning Department, *Urban Bird Refuge Map*. Available online at http://www.sf-planning.org/ftp/files/publications_reports/library_of_cartography/Urban_Bird_Refuge_Poster.pdf, accessed May 28, 2016.

Impact BI-3: The proposed project would not conflict with the City’s local tree ordinance. (No Impact)

The City’s Urban Forestry Ordinance, *Public Works Code* Sections 801 et. seq., requires a permit from Public Works to remove any protected trees. Protected trees include landmark trees, significant trees, or street trees located on private or public property anywhere within the territorial limits of the City and County of San Francisco. The proposed project does not include the removal of any trees.

The proposed project includes the planting of 26 new street trees on Golden Gate and Van Ness avenues. Because the proposed project would not conflict with the City’s local tree ordinance and would not include the removal of any trees, there would be no effect on trees.

Impact C-BI-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact related to biological resources. (Less than Significant)

The project vicinity does not currently support any candidate, sensitive, or special-status species, any riparian habitat, or any other sensitive natural community identified in local or regional plans, policies, or regulations or by the California Department of Fish and Wildlife or the U.S. Fish and Wildlife Service. As with the proposed project, nearby cumulative development projects would also be subject to the MBTA, which protects special-status bird species; the California Fish and Game Code; and the bird-safe building and urban forestry ordinances. As with the proposed project, compliance with these ordinances would reduce the effects of development projects to less-than-significant levels.

The proposed project would not modify any natural habitat and would have no impact on any candidate, sensitive, or special-status species, any riparian habitat, or other sensitive natural community; and/or would not conflict with any local policy or ordinance protecting biological resources or an approved conservation plan. For these reasons, the proposed project would not have the potential to combine with past, present, and reasonably foreseeable future projects in the project vicinity to result in a significant cumulative impact related to biological resources. Therefore, cumulative impacts to biological resources would be less than significant.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|--|---|---|---|-------------------------------------|-------------------------------------|
| 13. GEOLOGY AND SOILS.— | | | | | |
| Would the project: | | | | | |
| a) Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving: | | | | | |
| i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42. | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| ii) Strong seismic ground shaking? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| iii) Seismic-related ground failure, including liquefaction? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| iv) Landslides? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Result in substantial soil erosion or the loss of topsoil? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Be located on geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial risks to life or property? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |

The proposed project would connect to the combined sewer system, which is the wastewater conveyance system for San Francisco, and would not use septic tanks or other on-site land disposal systems for sanitary sewage. Therefore, topic 13e is not applicable to the proposed project.

Impact GE-1: The proposed project would not expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving rupture of a known earthquake fault, strong seismic ground shaking, seismic-related ground failure, or

landslides, and would not be located on unstable soil that could result in lateral spreading, subsidence, liquefaction, or collapse. (Less than Significant)

A geotechnical investigation was conducted to assess the geologic conditions underlying the project site and provide recommendations related to the proposed project's design and construction. The findings and recommendations, presented in a geotechnical report, are discussed below.⁸⁷

The geotechnical investigation included the drilling of four test borings on the project site to depths of 41 feet, 46.5 feet, 55 feet and 59 feet below ground surface (bgs). The project site is underlain by fill overlying native Dune sand. Where explored, the fill is 7 to 14 feet thick and consists of medium dense to dense sand and clayey sand and very stiff to hard sandy clay with variable amounts of gravel and brick and concrete rubble, and the Dune sand extends to depths of 25 to 33 feet bgs. The Dune sand is underlain by dense to very dense sand with varying amounts of clay, deposits known locally as the Colma formation. The Colma formation extends to the maximum depth explored in the investigation of 59 feet bgs. As the site is underlain with dense Dune sand and Colma formation, which are capable of supporting moderate to high foundation loads without excessive settlement, the proposed building can be supported on a reinforced mat foundation.

The San Francisco Bay Area is a seismically active region. The project site is not within an Alquist-Priolo Earthquake Fault Zone, and there are no known active faults that run underneath the project site or in the project vicinity. The closest active fault to the project site is the San Andreas Fault, which is about 6.8 miles to the west. Nonetheless, the project site is subject to strong seismic ground shaking. The project site has not been mapped within a liquefaction zone, and is not in a landslide zone or located on unstable soil. The geotechnical report concludes that the potential for lateral spreading or liquefaction at the project site is very low. The geotechnical report includes recommendations related to foundation support, seismic design, foundations, underpinning, temporary shoring, and site drainage. Implementation of these recommendations would ensure that the proposed project would not cause the soil underlying the project site to become unstable and result in on- or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse.

The proposed project, which would be supported by a reinforced mat foundation, would be required to comply with the seismic safety standards set forth in the San Francisco Building Code (Building Code). DBI is the City agency responsible for reviewing the proposed project's building permit application, structural drawings and calculations, and geotechnical report and ensuring that the proposed project complies with the seismic safety standards and other applicable requirements of the Building Code. Project compliance with the Building Code would ensure that

⁸⁷ Rockridge Geotechnical, *Geotechnical Investigation, Proposed Residential Building 600 Van Ness Avenue, San Francisco, California*, January 27, 2016.

the risk of loss, injury, or death involving rupture of a known earthquake fault, strong seismic ground shaking, seismic-related ground failure, or landslides would be less than significant, and no mitigation measures are necessary.

Therefore, the proposed project would not result in exposure of people and structures to potential substantial adverse effects. Impacts from seismic events or geologic hazards would be considered less than significant.

Impact GE-2: The proposed project would not result in substantial soil erosion or the loss of topsoil. (Less than Significant)

The project site is currently a staging area for construction equipment and is almost entirely covered with impervious surfaces. For these reasons, construction of the proposed project would not result in the loss of substantial topsoil. Site preparation and excavation activities would disturb soil to a depth of approximately twenty-two feet below ground surface, creating the potential for windborne and waterborne soil erosion. While the topography of the project site slopes downward towards the south, construction activities would not result in substantial soil erosion because the project sponsor and its contractor would be required to implement BMPs that include erosion and sedimentation control measures (see Section E.14, Hydrology and Water Quality). Therefore, the proposed project's short-term construction-related erosion impacts would be less than significant. Similarly, no long-term erosion impacts are anticipated from the proposed project.

Impact GE-3: The proposed project site would not be located on a geologic unit or soil that is unstable, or that could become unstable as a result of the project. (Less than Significant)

San Francisco is within an area where less than 50 percent of the soil consists of clay with high swelling potential (i.e., expansive soils). Expansive soils shrink or swell substantially with changes in moisture content and generally contain a high percentage of clay particles. As discussed above, the project site is underlain by fill overlying native Dune sand. Groundwater is about 30 to 36 feet below ground surface and would not be encountered at the planned excavation depth of twenty-two feet; thus, dewatering for the proposed project is not anticipated to be necessary during construction. In addition, the area around the project site does not include hills or cut slopes likely to be subject to landslide, and the project site is not within a state designated seismic hazard zone for liquefaction.

DBI would review the detailed geotechnical report to ensure that the potential settlement and subsidence impacts of excavation are appropriately addressed in accordance with Section 1704.15 of the San Francisco Building Code. DBI would also require that the report include a determination as to whether a lateral movement and settlement survey should be done to monitor any movement or settlement of surrounding buildings and adjacent streets during construction. If a monitoring survey were recommended, DBI would require that a Special

Inspector be retained by the project sponsor to perform this monitoring. If, in the judgment of the Special Inspector, unacceptable movement were to occur during construction, corrective actions would be used to halt this settlement. Further, the final building plans would be reviewed by DBI, which would determine if additional site-specific reports would be required. Therefore, impacts related to unstable soils at the project site would be less than significant.

Impact GE-4: The proposed project would not directly or indirectly destroy a unique paleontological resource or site. (No Impact)

The project site is already developed and implementation of the proposed project would not substantially change the topography of the site. Paleontological resources include fossilized remains or traces of animals, plants, and invertebrates, including their imprints, from a previous geological period. Collecting localities and the geological formations containing those localities are also considered paleontological resources; they represent a limited, nonrenewable, and impact-sensitive scientific and educational resource. There are no unique geologic or physical features at the project site and construction activities are not anticipated to encounter any below-grade paleontological resources. Therefore, no impact would occur to topographic, unique geologic or physical features, and paleontological resources.

Impact C-GE-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact related to geology and soils. (Less than Significant)

Environmental impacts related to geology and soils are generally site-specific. Nearby cumulative development projects would be subject to the same seismic safety standards and design review procedures applicable to the proposed project. Compliance with the seismic safety standards and the design review procedures would ensure that the effects from nearby cumulative development projects would be reduced to less-than-significant levels. For these reasons, the proposed project would not combine with past, present, and reasonably foreseeable future projects in the project vicinity to create a significant cumulative impact related to geology and soils.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|---|---|---|---|--------------------------|-------------------------------------|
| 14. HYDROLOGY AND WATER QUALITY.— Would the project: | | | | | |
| a) Violate any water quality standards or waste discharge requirements? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level which would not support existing land uses or planned uses for which permits have been granted)? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner that would result in substantial erosion or siltation on- or off-site? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner that would result in flooding on- or off-site? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| f) Otherwise substantially degrade water quality? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| g) Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other authoritative flood hazard delineation map? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| h) Place within a 100-year flood hazard area structures that would impede or redirect flood flows? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| i) Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| j) Expose people or structures to a significant risk of loss, injury or death involving inundation by seiche, tsunami, or mudflow? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

The project site is not located within a 100-year Flood Hazard Zone,⁸⁸ a dam failure area,⁸⁹ or a tsunami hazard area.⁹⁰ No mudslide hazards exist on the proposed project site because this part of the City is not located near any landslide-prone areas.⁹¹ A seiche is an oscillation of a waterbody, such as a bay, that may cause local flooding. A seiche could occur in the San Francisco Bay due to seismic or atmospheric activity. However, the proposed project site is located approximately 0.8 miles from San Francisco Bay, and thus, would not be subject to a seiche. Therefore, topics 14g, 14h, 14i, and 14j are not applicable to the proposed project.

Impact HY-1: The proposed project would not violate any water quality standards or waste discharge requirements. (Less than Significant)

As discussed under Topic 10, Utilities and Service Systems, wastewater and stormwater from the project site would continue to flow into the City's combined stormwater and sewer system and would be treated to the standards contained within the City's National Pollutant Discharge Elimination System (NPDES) Permit for the Southeast Water Pollution Control Plant, prior to discharge into the San Francisco Bay. Treatment would be provided pursuant to the effluent discharge standards included within the City's NPDES permit for the plant. Additionally, as new construction, the proposed project would be required to meet the standards for stormwater management identified in the San Francisco Stormwater Management Ordinance and meet the SFPUC stormwater management requirements per the 2016 Stormwater Management Requirements and Design Guidelines.

The project sponsor would be required to submit and have approved by the SFPUC a Stormwater Control Plan that complies with the City's 2016 Stormwater Management Requirements and Design Guidelines using a variety of best management practices (BMPs). As described under Topic 10, Utilities and Service Systems, for the proposed project, the stormwater management approach must reduce the existing runoff flow rate and volume by 25 percent for a two-year 24-hour design storm through employment of a hierarchy of BMPs set forth in the Stormwater Management Requirements. Therefore, the proposed project would not substantially degrade water quality and water quality standards or waste discharge requirements would not be violated. Thus, the proposed project would have a less than significant impact on water quality.

Impact HY-2: The proposed project would not substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level. (Less than Significant)

As discussed under Section E.13, Geology and Soils, groundwater is about 30 to 36 feet below ground surface and would not be encountered at the planned excavation depth of 22 feet; thus,

⁸⁸ Federal Emergency Management Agency. 2007. *Draft Special Flood Hazard Areas (San Francisco)*. September 21.

⁸⁹ City of San Francisco. 2012. *General Plan*. Community Safety Element, October 2012, Map 6.

⁹⁰ *Ibid*, Map 5.

⁹¹ *Ibid*, Map 4.

dewatering for the proposed project is not anticipated to be necessary during construction. The proposed project would be required to comply with all applicable regulations, including the San Francisco Stormwater Management Ordinance. The proposed project would not result in the use of groundwater; if groundwater were to be encountered, construction dewatering would be required. Therefore, the proposed project would not substantially deplete groundwater supplies or interfere substantially with groundwater recharge, and impacts would be less than significant.

Impact HY-3: The proposed project would not result in alterations to the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner that would result in substantial erosion or siltation on-site or off-site, or substantially increase the rate or amount of surface runoff in a manner that would result in flooding on site or off site. (Less than Significant)

The project site is located in the Downtown/Civic Center neighborhood and no streams or rivers exist at the project site. Therefore, the proposed project would not alter the course of a stream or river, or substantially alter the existing drainage pattern of the project site or area.

The proposed project would be designed to incrementally reduce the amount of impervious surface on the project site through implementation of low impact design features (such as permeable pavers and planting areas) and other measures identified in the Stormwater Management Ordinance, which also requires a decrease in the amount of stormwater runoff associated with the proposed project per the City's drainage control requirement. Impervious surfaces on the site would not substantially change as part of the proposed project and drainage patterns would generally remain the same. As such, the proposed project would not be expected to result in substantial erosion or flooding associated with changes in drainage patterns; and potential erosion and flooding impacts would be less than significant.

Impact HY-4: The proposed project would not create or contribute runoff water that would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff. (Less than Significant)

During construction and operation of the proposed project, all wastewater and stormwater runoff from the project site would be treated at the Southeast Water Pollution Control Plant. As noted above, treatment would be provided pursuant to the effluent discharge standards contained in the City's NPDES permit for the plant. During construction and operation, the proposed project would be required to comply with all local wastewater discharge, stormwater runoff, and water quality requirements, including the 2016 San Francisco Stormwater Management Requirements and Design Guidelines, described above under Impact HY-1, and the Stormwater Management Ordinance. Compliance with the Stormwater Management Requirements and Design Guidelines would ensure that stormwater generated by the proposed project would be managed on-site to reduce the existing runoff flow rate and volume by 25 percent for a two-year 24-hour design storm, such that the proposed project would not contribute additional volumes of polluted runoff

to the City's stormwater infrastructure. Compliance with the Stormwater Management Ordinance would ensure that the design of the proposed project would include installation of appropriate stormwater management systems that retain runoff on site, promote stormwater reuse, and limit discharges from the site from entering the City's combined stormwater/sewer system. Therefore, the proposed project would not exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff. Therefore, this impact would be less than significant and no mitigation measures are necessary.

Impact C-HY-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects in the site vicinity, would not have a cumulative impact on hydrology and water quality. (Less than Significant)

As stated above, the proposed project would result in no impacts or less-than-significant impacts related to water quality, groundwater levels, alteration of drainage patterns, capacity of drainage infrastructure, 100-year flood zones, failure of dams or levees, and/or seiche, tsunami, and/or mudflow hazards. The proposed project would adhere to the same water quality and drainage control requirements that apply to all land use development projects in San Francisco. Since all new development projects would be required to follow the same drainage, dewatering and water quality regulations, as the proposed project, peak stormwater drainage rates and volumes for the design storm would gradually decrease over time with the implementation of new, conforming development projects, meaning that no substantial adverse cumulative effects with respect to drainage patterns, water quality, stormwater runoff, or stormwater capacity of the combined sewer system would occur.

Further, San Francisco's limited use of groundwater would preclude any significant adverse cumulative effects to groundwater levels, and the proposed project would not contribute to any cumulative effects with respect to groundwater. Cumulative impacts are not anticipated since all development projects would be required to follow the same drainage, dewatering and water quality regulations as the proposed project. Thus, cumulative hydrology and water quality impacts would be less than significant.

| <i>Topics:</i> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|-------------------------------------|
| 15. HAZARDS AND HAZARDOUS MATERIALS.— Would the project: | | | | | |
| a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard for people residing or working in the project area? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| f) For a project within the vicinity of a private airstrip, would the project result in a safety hazard for people residing or working in the project area? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| g) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| h) Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

The project site is not located within an airport land use plan area or in the vicinity of a private airstrip. Therefore, topics 15e and 15f are not applicable to the proposed project.

Impact HZ-1: The proposed project would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials. (Less than Significant)

The primary use of hazardous materials for the proposed project's residential and retail uses would most likely be for building maintenance, particularly cleaning. These materials would be properly labeled, to inform the user of potential risks as well as handling procedures. The majority of these hazardous materials would be consumed upon use, and would produce very little waste. Any hazardous wastes that are produced would be managed in accordance with Article 22 of the San Francisco Health Code. In addition, transportation of hazardous materials are regulated by the California Highway Patrol and the California Department of Transportation. These hazardous materials are not expected to cause any substantial health or safety hazards. Therefore, potential impacts related to the routine use, transport, and disposal of hazardous materials would be less than significant.

Impact HZ-2: The project site is not included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5, and the proposed project would not create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment. (Less than Significant)

The project site is not included on a list of hazardous materials sites compiled by the California Department of Toxic Substance Control pursuant to Government Code Section 65962.5. The project site is located in a Maher Area, meaning that it is known or suspected to contain contaminated soil and/or groundwater.⁹² The over-arching goal of the Maher Ordinance is to protect public health and safety by requiring appropriate handling, treatment, disposal and when necessary, remediation of contaminated soils that are encountered in the building construction process. Projects that disturb 50 cubic yards or more of soil that are located on sites with potentially hazardous soil or groundwater are subject to this ordinance. The proposed project would require excavation to a depth of 22 feet below ground surface and the disturbance of approximately 17,800 cubic yards of soil. Therefore, the proposed project is subject to Health Code Article 22A (also known as the Maher Ordinance), which is administered and overseen by the Department of Public Health (DPH). The project sponsor submitted an application to the Maher Program and retained the services of a qualified professional to prepare a Phase I Environmental Site Assessment (ESA) that meets the requirements of Health Code Section 22.A.6.⁹³ A Phase I ESA has been prepared to assess the potential for site contamination, and the findings are discussed below.⁹⁴

⁹² San Francisco Planning Department, *Expanded Maher Area Map*, March 2015. Available online at http://www.sf-planning.org/ftp/files/publications_reports/library_of_cartography/Maher%20Map.pdf, accessed December 11, 2017.

⁹³ 600 Van Ness Avenue Maher Ordinance Application, April 13, 2016.

⁹⁴ Michael E. Gingrass, *Phase I Environmental Site Assessment, 6424 – 3rd Street, San Francisco*, January 7, 2014.

The project site currently contains no structures and is being used as a staging area for the construction of Van Ness Bus Rapid Transit project. According to the Phase I ESA, the project site was most recently developed as a McDonald's restaurant, but was developed as early as the 1870s with single-family residential units. By 1910, all the parcels on the project site had been converted to commercial structures. The Phase I ESA examined the project site before the demolition of the McDonald's restaurant; the building at the time of the report's preparation was vacant.

The Phase I ESA concluded that there were no hazardous materials of any kind found on the project site. There was one potential Recognized Environmental Condition (REC) on the project site, related to the McDonald's building materials. The building has since been demolished. The ESA states that while there are no current REC's within a one hundred foot radius of the project site, there are a number of historic REC's within 100 feet of the project site, none of which are determined to be an immediate threat to the subject property.

Nevertheless, since the project site is located within the Maher area, the project sponsor is required to submit a SMP to DPH, in compliance with Article 22A of the Health Code. In addition, the sponsor would be required to conduct soil, groundwater and soil vapor testing at the project site. The proposed project would be required to remediate any potential soil contamination in accordance with Article 22A. Required compliance with the Maher Ordinance would ensure that implementation of the proposed project would not create a significant hazard to the public or the environment. This impact would be less than significant, and no mitigation measures are necessary.

Impact HZ-3: The proposed project would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school. (Less than Significant)

Four schools exist within a quarter-mile of the project site: the Tenderloin Community School at 627 Turk Street (approximately 40 feet to the north of the project site across Elm Street), Civic Center Secondary School at 727 Golden Gate Avenue (750 feet to the west), Sacred Heart Cathedral Preparatory at 1055 Ellis Street (1,230 feet to the northwest), and the Millennium School at 380 Fulton Street (1,300 feet to the southwest). As discussed under Impact HZ-1, the proposed project would include the use of common household items in quantities too small to create a significant hazard to the public or the environment. The proposed residential and retail uses would not produce hazardous emissions and would not involve the handling of hazardous or acutely hazardous materials, substances, or waste. This impact would be less than significant, and no mitigation measures are necessary.

Impact HZ-4: The proposed project would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan and would not expose people or structures to a significant risk of loss, injury, or death involving wildland fires (Less than Significant)

San Francisco ensures fire safety through provisions of the Building and Fire Codes. The additional residents, employees, and visitors could contribute to congestion if an emergency evacuation of the greater downtown area were required. Construction of the proposed project would conform to the provisions of the Building Code and Fire Code. Final building plans would be reviewed by the San Francisco Fire Department and DBI to ensure conformance with the applicable life-safety provisions, including development of an emergency procedure manual and an exit drill plan. Therefore, the proposed project would not obstruct implementation of the City's Emergency Response Plan, and potential emergency response and fire hazard impacts would be less than significant. No mitigation measures are necessary.

Impact C-HZ-1: The proposed project, in combination with past, present, and reasonably foreseeable future projects, would not result in a cumulative impact related to hazards and hazardous materials. (Less than Significant)

Environmental impacts related to hazards and hazardous materials are generally site-specific. Nearby cumulative development projects would be subject to the same fire safety and hazardous materials cleanup ordinances and regulations applicable to the proposed project. For these reasons, the proposed project would not combine with past, present, and reasonably foreseeable future projects in the project vicinity to create a significant cumulative impact related to hazards and hazardous materials.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|---|---|---|---|--------------------------|-------------------------------------|
| 16. MINERAL AND ENERGY RESOURCES.— Would the project: | | | | | |
| a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| c) Encourage activities which result in the use of large amounts of fuel, water, or energy, or use these in a wasteful manner? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

The project site is within designated Mineral Resource Zone 4 (MRZ-4) by the California Division of Mines and Geology under the Surface Mining and Reclamation Act of 1975.⁹⁵ This designation indicates that there is insufficient information available to designate as any other MRZ, and therefore, it is assumed that no significant mineral deposits exist. Furthermore, according to the San Francisco *General Plan*, no significant mineral resources exist in all of San Francisco. Therefore, topics 17a and 17b are not applicable to the proposed project.

Impact ME-1: The proposed project would not encourage activities that result in the use of large amounts of fuel, water, or energy, or use these resources in a wasteful manner. (Less than Significant)

The proposed project is located within the Civic Center/Downtown neighborhood where there are existing buildings and infrastructure; therefore, the project would be served by existing utilities. As stated in the analysis in Section E.10, Utilities and Service Systems, adequate water supplies exist to serve the proposed project. In addition, the proposed project is located in a developed urban area that is served by multiple transit systems. Use of these transit systems by residents, visitors, and employees would reduce the amount of fuel expended in private automobiles. The proposed project’s energy demand would be typical for a development of this scope and nature, and would comply with current state and local codes concerning energy consumption, including Title 24 of the California Code of Regulations, enforced by DBI. The proposed project would also be required to comply with the City’s Green Building Ordinance. Therefore, the energy demand associated with the proposed project would not result in a significant impact.

⁹⁵ California Division of Mines and Geology. Open File Report 96-03 and Special Report 146 Parts I and II.

Impact C-ME-1: The proposed project, in combination with other past, present, and reasonably foreseeable future projects, would not result in significant adverse cumulative mineral and energy impacts. (Less than Significant)

The geographic scope for potential cumulative impacts on energy resources impacts encompasses the SFPUC water and power supply system. SFPUC supplies the City and County of San Francisco, as well as others in the region, with water and power. Similar to the proposed project, projects within the vicinity or the region would require the use of fuel, water, or energy.

Cumulative projects in the area would be required to comply with the City's Green Building Ordinance and Title 24 of the California Code of Regulations, enforced by DBI. Because these building codes encourage sustainable construction practices related to planning and design, energy efficiency, and water efficiency and conservation, energy consumption would be expected to be reduced compared to conditions without such regulations. Therefore, the proposed project, in combination with other past, present, and reasonably foreseeable future projects, would not result in a cumulatively considerable impact related to mineral and energy resources.

| <i>Topics:</i> | <i>Potentially Significant Impact</i> | <i>Less Than Significant with Mitigation Incorporated</i> | <i>Less Than Significant Impact</i> | <i>No Impact</i> | <i>Not Applicable</i> |
|--|---------------------------------------|---|-------------------------------------|--------------------------|-------------------------------------|
| <p>17. AGRICULTURE AND FORESTRY RESOURCES: In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board.</p> <p>—Would the project:</p> | | | | | |
| a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance, as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| b) Conflict with existing zoning for agricultural use, or a Williamson Act contract? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| d) Result in the loss of forest land or conversion of forest land to non-forest use? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |
| e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland to non-agricultural use or forest land to non-forest use? | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> |

The project site is within an urbanized area in the City and County of San Francisco that does not contain any Prime Farmland, Unique Farmland, or Farmland of Statewide Importance; forest land; or land under Williamson Act contract. The area is not zoned for any agricultural uses. Therefore, topics 17a, b, c, d, and e are not applicable to the proposed project.

| <u>Topics:</u> | <u>Potentially Significant Impact</u> | <u>Less Than Significant with Mitigation Incorporated</u> | <u>Less Than Significant Impact</u> | <u>No Impact</u> | <u>Not Applicable</u> |
|---|---------------------------------------|---|-------------------------------------|--------------------------|--------------------------|
| 18. MANDATORY FINDINGS OF SIGNIFICANCE— | | | | | |
| a) Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory? | <input type="checkbox"/> | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| b) Does the project have impacts that are individually limited, but cumulatively considerable? (“Cumulatively considerable” means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects.) | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |
| c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly? | <input type="checkbox"/> | <input checked="" type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> | <input type="checkbox"/> |

As discussed in sections E.13 and E.4, respectively, the proposed project would not substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory.

As discussed in Section E.5, Noise, construction of the proposed project could generate temporary noise levels that would affect nearby residents and other sensitive receptors. Required compliance with the San Francisco Noise Ordinance would reduce these impacts to less-than-significant levels. Although no construction noise impacts are expected, **Improvement Measure I-NO-2**, which has been agreed to by the project sponsor, has been identified to minimize construction-related noise as much as possible.

As discussed in Section E.6, Air Quality, the project site is located in an area that already experiences poor air quality. The proposed project’s construction emissions would contribute considerably to cumulative health risk impacts and the proposed project’s operational emission from its back-up diesel generator would also contribute considerably to cumulative health risk impacts. Implementation of **Mitigation Measure M-AQ-2: Construction Air Quality** and **Mitigation Measure M-AQ-4: Best Available Control Technology Diesel Generators** would

reduce the proposed project's contribution to cumulative air quality impacts to a less-than-significant level.

Both long-term and short-term environmental effects associated with the proposed project would be less than significant or less than significant with mitigation, as discussed under each environmental topic. For these reasons, the proposed project would not cause substantial adverse effects on human beings, either directly or indirectly.

Both long-term and short-term environmental effects associated with the proposed project would be less than significant or less than significant with mitigation, as discussed under each environmental topic. Each environmental topic area includes an analysis of cumulative impacts. This initial study concludes that cumulative impacts for all environmental topic areas would be also either be less than significant or less than significant with mitigation.

Note: Authority cited: Sections 21083 and 21083.05, 21083.09 Public Resources Code. Reference: Section 65088.4, Gov. Code; Sections 21073, 21074 21080(c), 21080.1, 21080.3, 21083, 21083.05, 21083.3, 21080.3.1, 21080.3.2,21082.3, 21084.2, 21084.3, 21093, 21094, 21095, and 21151, Public Resources Code; *Sundstrom v. County of Mendocino*,(1988) 202 Cal.App.3d 296; *Leonoff v. Monterey Board of Supervisors*, (1990) 222 Cal.App.3d 1337; *Eureka Citizens for Responsible Govt. v. City of Eureka* (2007) 147 Cal.App.4th 357; *Protect the Historic Amador Waterways v. Amador Water Agency* (2004) 116 Cal.App.4th at 1109; *San Franciscans Upholding the Downtown Plan v. City and County of San Francisco* (2002) 102 Cal.App.4th 656.

F. MITIGATION AND IMPROVEMENT MEASURES

The following mitigation measures have been identified to reduce potentially significant environmental impacts resulting from the proposed project to less-than-significant levels. In addition, improvement measures have also been agreed to by the project sponsor to further reduce less-than-significant impacts.

Mitigation Measure M-AQ-2: Construction Air Quality

The project sponsor or the project sponsor's Contractor shall comply with the following:

A. *Engine Requirements.*

1. All off-road equipment greater than 25 hp and operating for more than 20 total hours over the entire duration of construction activities shall have engines that meet or exceed either U.S. Environmental Protection Agency (USEPA) or California Air Resources Board (ARB) Tier 2 off-road emission standards, and have been retrofitted with an ARB Level 3 Verified Diesel Emissions Control Strategy. Equipment with engines meeting Tier 4 Interim or Tier 4 Final off-road emission standards automatically meet this requirement.
2. Where access to alternative sources of power are available, portable diesel engines shall be prohibited.
3. Diesel engines, whether for off-road or on-road equipment, shall not be left idling for more than two minutes, at any location, except as provided in exceptions to the applicable state regulations regarding idling for off-road and on-road equipment (e.g., traffic conditions, safe operating conditions). The Contractor shall post legible and visible signs in English, Spanish, and Chinese, in designated queuing areas and at the construction site to remind operators of the two-minute idling limit.
4. The Contractor shall instruct construction workers and equipment operators on the maintenance and tuning of construction equipment, and require that such workers and operators properly maintain and tune equipment in accordance with manufacturer specifications.

B. *Waivers.*

1. The Planning Department's Environmental Review Officer (ERO) or designee may waive the alternative source of power requirement of Subsection (A)(2) if an alternative source of power is limited or infeasible at the project site. If the ERO grants the waiver, the Contractor must submit documentation that the equipment used for on-site power generation meets the requirements of Subsection (A)(1).
2. The ERO may waive the equipment requirements of Subsection (A)(1) if: a particular piece of off-road equipment with an ARB Level 3 VDECS is technically not feasible; the equipment would not produce desired emissions reduction due to expected operating modes; installation of the equipment would create a safety hazard or impaired visibility for the operator; or, there is a compelling emergency need to use off-road equipment that is not retrofitted with an ARB Level 3 VDECS. If the ERO grants the waiver, the Contractor must use the next cleanest piece of off-

road equipment, according to the table below.

Table – Off-Road Equipment Compliance Step-down Schedule

| Compliance Alternative | Engine Emission Standard | Emissions Control |
|-------------------------------|---------------------------------|--------------------------|
| 1 | Tier 2 | ARB Level 2 VDECS |
| 2 | Tier 2 | ARB Level 1 VDECS |
| 3 | Tier 2 | Alternative Fuel* |

How to use the table: If the ERO determines that the equipment requirements cannot be met, then the project sponsor would need to meet Compliance Alternative 1. If the ERO determines that the Contractor cannot supply off-road equipment meeting Compliance Alternative 1, then the Contractor must meet Compliance Alternative 2. If the ERO determines that the Contractor cannot supply off-road equipment meeting Compliance Alternative 2, then the Contractor must meet Compliance Alternative 3. Alternative fuels are not a VDECS.

- C. *Construction Emissions Minimization Plan.* Before starting on-site construction activities, the Contractor shall submit a Construction Emissions Minimization Plan (Plan) to the ERO for review and approval. The Plan shall state, in reasonable detail, how the Contractor will meet the requirements of Section A.

Mitigation Measure M-AQ-4. Best Available Control Technology for Diesel Generators.

The project sponsor shall ensure that the backup diesel generator meet or exceed one of the following emission standards for particulate matter: (1) Tier 4 certified engine, or (2) Tier 2 or Tier 3 certified engine that is equipped with a California Air Resources Board (ARB) Level 3 Verified Diesel Emissions Control Strategy (VDECS). A non-verified diesel emission control strategy may be used if the filter has the same particulate matter reduction as the identical ARB verified model and if the Bay Area Air Quality Management District (BAAQMD) approves of its use. The project sponsor shall submit documentation of compliance with the BAAQMD New Source Review permitting process (Regulation 2, Rule 2, and Regulation 2, Rule 5) and the emission standard requirement of this mitigation measure to the Planning Department for review and approval prior to issuance of a permit for a backup diesel generator from any City agency.

Improvement Measure I-TR-3: Coordination of Move-in/Move-Out Operations, Large Deliveries, and Garbage Pick-Up Operations.

To reduce the potential for parking of delivery vehicles within the travel lane adjacent to the project frontage on Golden Gate Avenue (in the event that the on- and off-street loading spaces are occupied, or the truck size exceeds 25 feet in length), residential move-in and move-out activities and larger deliveries should be scheduled and coordinated through building management. For retail uses, appropriate delivery times should be scheduled and should be

restricted to occur before 7:00 a.m., between the hours of 10:00 a.m. and 4:00 p.m., and after 8:00 p.m.

The Project Sponsor should enforce strict truck size regulations for use of the off-street loading spaces in the proposed freight loading area. Truck lengths exceeding 25 feet should be prohibited from entering the parking garage and should utilize other loading spaces adjacent to the project site. Appropriate signage should be located at the parking garage entrance to notify drivers of truck size regulations and notify drivers of the on-street loading spaces on Golden Gate Avenue. The Project Sponsor should notify building management and related staff, and retail tenants of imposed truck size limits in the proposed freight loading area.

Appropriate move-in/move-out and loading procedures should be enforced to avoid any blockages of any streets adjacent to the project site over an extended period of time and reduce potential conflicts between other vehicles and users of adjacent streets as well as movers and pedestrians walking along Golden Gate Avenue, Elm Street, or Van Ness Avenue. Curb parking for movers on Golden Gate Avenue should be reserved through SFMTA or by directly contacting the local 311 service. It is recommended that residential move-in/move-out activities be scheduled during weekday midday hours between 10:00 a.m. and 4:00 p.m. and/or on weekends to avoid any potential conflicts with peak commute period traffic and all users of adjacent roadways.

Project Sponsor should coordinate with Recology and enforce strict garbage pick-up periods. Such pick-up times should be restricted to occur before 7:00 a.m., and between the hours of 10:00 a.m. and 2:00 p.m., and no garbage pick-up activities should occur after 3:00 p.m. to avoid any conflicts with vehicle traffic and pedestrians on Golden Gate Avenue, Elm Street, or Van Ness Avenue. Specific loading procedures (as described above) should also be enforced for Recology vehicles during garbage pick-up periods.

Improvement Measure I-NO-2: Construction Noise

The project sponsor should develop a set of site-specific noise attenuation measures under the supervision of a qualified acoustical consultant. Prior to commencing construction, a plan for such measures shall be submitted to the DBI to ensure that maximum feasible noise attenuation will be achieved. These attenuation measures shall include as many of the following control strategies as feasible:

- Erect temporary plywood noise barriers around the construction site.
- Utilize noise control blankets on the building as the building is erected to reduce noise emission from the site.
- Monitor the effectiveness of noise attenuation measures by taking noise measurements.
- Post signs on-site with information regarding permitted construction days and hours, complaint procedures, and the name(s) and telephone number(s) of the individual(s) to be contacted in the event of a problem.

G. PUBLIC NOTICE AND COMMENT

On April 10, 2017 the Planning Department mailed a Notification of Project Receiving Environmental Review to owners of properties within 300 feet of the project site, adjacent occupants, and neighborhood groups. Comments received addressed the following:


- The mix of unit types in the proposed project, the lack of affordable housing included in the proposed project, the lack of neighborhood serving retail in the proposed project, and the number of parking spaces included in the proposed project.
- New shadows cast by the proposed project and the potential of the proposed project to block views from nearby buildings.
- Impacts of new shadow, construction, dust and traffic on the Tenderloin Community School.

As discussed in the Summary of Environmental Effects section, above, parking impacts are not to be analyzed under CEQA for projects of the type, and in the location, of the proposed project. The lack of affordable housing and retail, and the mix of unit types, are not environmental impacts for the purposes of CEQA, and are not analyzed in this document. As discussed in the Wind and Shadow section, above, the proposed project would not cast new shadow on a Parks and Recreation park or open space regulated by Planning Code Section 295. The proposed project would cast new shadow on the Tenderloin Community School playgrounds and information regarding this is provided for informational purposes in the Wind and Shadow section. In addition, the Planning Department does not consider the blocking of a view of a nearby building from a private residence by a proposed project an environmental impact under CEQA. As discussed in the Air Quality section, above, as the project site is located within the Air Pollution Exposure Zone, an area of the city that already has poor air quality, the project sponsor has agreed to Mitigation Measure M-AQ-2: Construction Air Quality and Mitigation Measure M-AQ-4: Best Available Control Technology for Diesel Generators, which, in concert with existing local construction requirements, would reduce the impact of construction-related activity and equipment to a less-than-significant level. Traffic hazards are discussed in the Transportation section. The proposed project was found not to result in any new traffic hazards.

H. DETERMINATION

On the basis of this Initial Study:

- I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.
- I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared.
- I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.
- I find that the proposed project MAY have a "potentially significant impact" or "potentially significant unless mitigated" impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.
- I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed project, no further environmental documentation is required.



Lisa Gibson
Environmental Review Officer
for
John Rahaim
Director of Planning

DATE 2/28/10

I. INITIAL STUDY PREPARERS

Planning Department
Environmental Planning Division
City and County of San Francisco
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