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September 26, 2017

Attn: Mr. Larry Abitbol
SV Housing LLC - Scotts Valley Drive
5005 Ironwood Drive
Soquel, CA 95073

RE: Scotts Valley Housing Project; City of Scotts Valley, California
Supplemental Trip Generation and Parking Analysis

Dear Mr. Abitbol,

Pinnacle Traffic Engineering (PTE) is pleased to submit the Supplemental Trip Generation and Parking Analysis for the project in the City of Scott's Valley. The supplemental analysis presents an estimate of the trip generation quantities based on the current project design (a copy of the Site Plan is attached). In January 2017, PTE prepared a formal Traffic Impact Analysis (TIA) for the previously proposed project. The previous project included the construction of two (2) new buildings to accommodate various commercial retail (2,128 SF) and office (1,064 SF), and residential (18 apartments) uses. The scope of the TIA was developed in consultation with City staff. The TIA includes a detailed evaluation of the potential project impacts at the Scotts Valley Drive / Civic Center Drive - Disc Drive intersection. The TIA concluded that based on the City's "level of significance" criterion the project would not significantly impact local traffic operations. In addition, the TIA also provided an estimate of the project trips at the Scotts Valley Drive / Mt. Hermon Road and Mt. Hermon Road / La Madrona Drive intersection. The number of project trips at these intersections was used to estimate the City's Development Impact Fee (DIF), which is required based on the City's adopted Mt. Hermon Road Traffic Mitigation / Fair Share Contribution policy.

Project Trip Generation Analysis

The current proposed project includes the construction of two (2) new buildings with a total of 19 residential apartments. The commercial retail and office components have been removed and are no longer included in the current project proposal. The project trip generation estimates in the January 2017 TIA were based on data contained in the Institute of Transportation Engineers (ITE) Trip Generation Manual (9th Edition). The trip generation estimates for the original project also included the appropriate trip reductions for "internal" captured (5%) and "pass-by" (15%) trips for the commercial retail component. To evaluate the "net" change in trip generation associated with the current proposed project the trip generation estimates for the original project (Table 4 on Page

9) were compared with the project trip estimates for the current project (19 residential apartments). The project trip generation comparison is presented in Table 1.

Table 1 - Project Trip Generation Estimate Comparison

Proposed Project Use	Number of Vehicle Trips				
	AM Peak Hour		PM Peak Hour		Daily
	In	Out	In	Out	
Previous Project (January 2017)					
Total Trips (Retail, Office & Residential):	4	7	10	9	226
Project New "Primary" Trips:	4	7	9	9	200
Current Proposed Project (August 2017)					
Total Trips (19 Residential Apartments):	2	8	8	4	126
Net Change in Project Trip Generation (August 2017 - January 2017)					
Project Trips (Current minus Previous):	-2	+1	-1	-5	-74

The data in Table 1 indicates that the current project will generate fewer daily and peak hour trips than analyzed in the January 2017 TIA. Therefore, the current proposed project will not change the conclusions presented in the January 2017 TIA. The current project will not significantly impact local traffic operations.

Project Parking Analysis

The project Site Plan indicates that 49 parking stalls will be provided for on-site parking. However, 51 parking stalls are required. As described in the January 2017 TIA, the project site is currently occupied with a surface lot that has 92 parking stalls (to be removed as part of the project). The lot has been used for over 20 years under an existing entitlement by the property owner (project applicant) and the Scotts Valley Water District currently has rights to use 9 of the existing stalls. The City's Zoning Regulations (17.44.030 - Off Street Parking & Loading Requirements) requires multi-family developments to provide two (2) parking spaces per dwelling unit plus one additional space for every 5 units (42 = 19x2 + 19/5). Based on the existing Water District's right (9 stalls) plus the City's requirement for the residential development (42 stalls) a total of 51 on-site parking stalls are required. Therefore, the project will provide two (2) less parking stalls than required.

The City's Zoning Regulations also indicate that "if it can be shown that a use does not expect to utilize the required number of spaces and assurance is given by recorded instrument or by other means that the required number of spaces will be provided when the use or circumstances of occupancy change, then a conditional use permit may be granted by the planning commission, pursuant to Section 17.50.020 of this title, allowing for a reduction in the number of required parking spaces." The use permit shall be conditioned on the necessary number of spaces being provided when the use or circumstances of occupancy change and on the giving of a recorded instrument to that effect which shall be recorded at the Santa Cruz County recorder's office.

A review of residential parking standards for other local public agencies of similar size indicates that not all agencies require guest parking for multi-family uses. Research shows that the residence parking requirement typically varies from 1.5 - 2.5 stalls per dwelling (depending on the number of bedrooms in some cases). The following is based on limited research:

City of Santa Cruz (2 stalls / dwelling - 2 & 3 bedroom) - 38 stalls for 19 units
City of Salinas (2 stalls / dwelling - 2 & 3 bedroom) - 38 stalls for 19 units
City of Monterey (2 stalls / 2-bedroom & 2.5 stalls / 3-bedroom) - 40 stalls for 19 units
City of Gilroy (1.5 stalls / 2-bdr. & 2 stalls / 3-bdr. + 1 stall / 4 units for guest) - 35 stalls for 19 units
City of Walnut Creek (2 stalls / 2-bedroom & 2.25 / 3-bedroom) - 39 stalls for 19 units

Data in the Urban Land Institute (ULI) "Shared Parking" publication demonstrates that peak parking demands for residential uses typically occurs between 11:00 PM & 6:00 AM (95-98%), while peak parking demands associated with office uses occurs between 9:00 AM & 4:00 PM (90-100%). Therefore, peak parking demands associated with the Water District's continued use of on-site parking (9 stalls) will not occur during the same period as the proposed project apartment uses (42 stalls required). It is also noted that data in the ITE Parking Generation Manual (4th Edition) documents average peak parking demands for apartment developments ranging from 0.59 to 1.94 (85th percentile) vehicles per dwelling unit. Based on the review of other agency standards, and the ULI and ITE data; it is reasonable to conclude that the 49 parking stalls proposed by the project will be adequate to accommodate peak parking demands. Therefore, a request for a variance in the project's off-street parking requirement should be considered acceptable by the City Planning Commission (pursuant to Section 17.50.020).

The City's Zoning Regulations design standards for commercial off-street parking facilities require full size parking spaces to be not less than 20' in length and 9' in width (exclusive of aisles and access drives). When an overhang is provided, the parking stall shall be 17', plus a 3' overhang area. Compact parking spaces shall not be less than 9' wide and 16' in length. When an overhang is provided, the parking stall shall be 13', plus a 3' overhang area. The City allows 20% of the total parking spaces to be compact. The parking aisle width between the parking stalls is required to be 26' for two-way traffic. Therefore, the parking "module" width is 66' (20'+26'+20'=66').

A review of the project site plan indicates that 44 regular parking stalls (including the Water District's 9 stalls) and 5 compact parking stalls will be provided (12% of the 42 stalls for residential apartments) on-site. The regular parking stalls are 18' in length (16' + 2' overhang) and 9' wide, with a 24' aisle width. The proposed project parking "module" width is 60' (18'+24'+18'), which is 6' less than required by the City standard.

A review of parking design standards for other local public agencies of similar size indicates that some agencies have an 18' length requirement for regular parking stalls and a width of 8.5' (e.g. Santa Cruz County, City of Capitola, City of Campbell, City of Walnut Creek). In addition, some agencies only require a 24' parking aisle width (e.g. City of Santa Cruz, City of Watsonville, City

of Salinas, City of Monterey). The research demonstrates the project's proposed regular parking stalls (18' x 9') should not be considered inadequate.

Data in the ULI "Dimensions of Parking" publication indicates that the recommended minimum parking stall width for low-turnover uses is 8.5'. It is noted that data presented in this publication is based on studies of standard "design" vehicle dimensions (using the 85th percentile). The publication also presents recommended minimum and common parking "module" dimensions. The recommended "module" for one-way traffic is 60' (18'+24'+18'). The publication also states that "consultants have found that increasing the stall width and decreasing the aisle width is a preferred method of maintaining an overall minimum level of comfort while maximizing user acceptance." Common parking "module" dimensions are also presented for 8.5' stalls, which include 18' stalls (both sides) and a 24' aisle (60' parking module for 90º stalls). It is important to note that due to the relative small size of the project (19 apartments) and low trip generation (10 AM & 12 PM peak hour trips), it is anticipated that the potential frequency of directional conflicting movements (inbound vs. outbound) will be minimal. Based on the review of other agency standards and the ULI data, it is reasonable to conclude that the proposed parking design will not impact on-site circulation. Therefore, a request for a variance in the project's parking design requirement should be considered acceptable by the City staff.

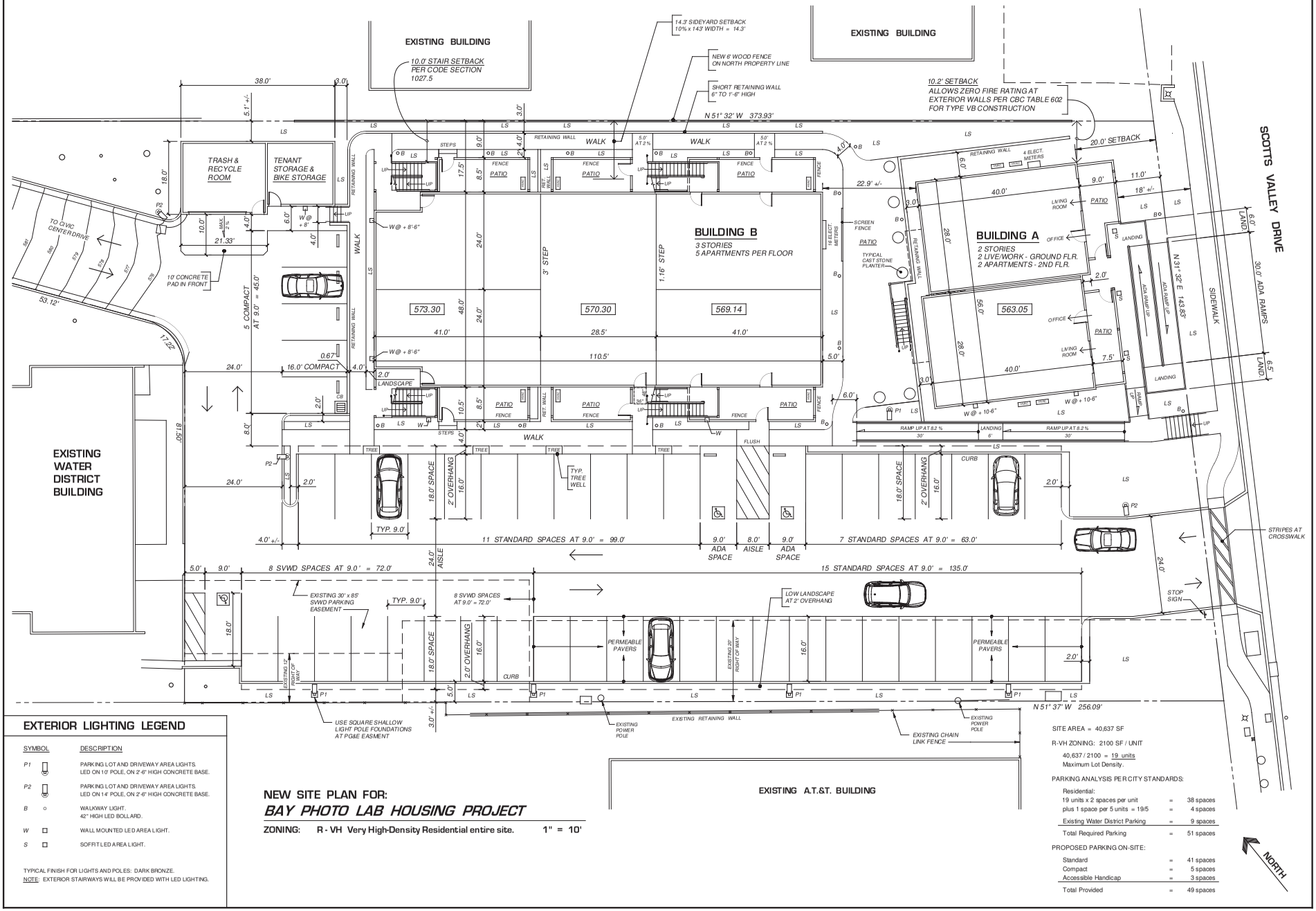
Please contact my office with any questions regarding the Supplemental Trip Generation and Parking Analysis.

Pinnacle Traffic Engineering

Larry D. Hail, CE, TE, PTOE
President

ldh:msw

attachments: Current Project Site Plan



EXTERIOR LIGHTING LEGEND

SYMBOL		DESCRIPTION
P1		PARKING LOT AND DRIVEWAY AREA LIGHTS. LED ON 10' POLE, ON 2'-6" HIGH CONCRETE BASE.
P2		PARKING LOT AND DRIVEWAY AREA LIGHTS. LED ON 14' POLE, ON 2'-6" HIGH CONCRETE BASE.
B	○	WALKWAY LIGHT. 42" HIGH LED BOLLARD.
W	□	WALL MOUNTED LED AREA LIGHT.
S	□	SOFFIT LED AREA LIGHT.

TYPICAL FINISH FOR LIGHTS AND POLES: DARK BRONZE.
NOTE: EXTERIOR STAIRWAYS WILL BE PROVIDED WITH LED LIGHTING.

NEW SITE PLAN FOR:
BAY PHOTO LAB HOUSING PROJECT
ZONING: R - VH Very High-Density Residential entire site. 1" = 10'

SITE AREA = 40,637 SF

R-VH ZONING: 2100 SF / UNIT
40,637 / 2100 = 19 units
Maximum Lot Density.

PARKING ANALYSIS PER CITY STANDARDS:

Residential:		
19 units x 2 spaces per unit	=	38 spaces
plus 1 space per 5 units = 19/5	=	4 spaces
Existing Water District Parking	=	9 spaces
Total Required Parking	=	51 spaces

PROPOSED PARKING ON-SITE:

Standard	=	41 spaces
Compact	=	5 spaces
Accessible Handicap	=	3 spaces
Total Provided	=	49 spaces

REVISIONS	BY
1 8/28/17	LC

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SANTA CRUZ, CALIFORNIA 95060
831-425-8769
DAVID ZULIM
P.E. 31547 CALIFORNIA
DESIGN
ENGINEERING
PLANNING

SITE PLAN
HOUSING PROJECT for:
BAY PHOTO LAB
4627 Scotts Valley Drive, Scotts Valley, California

Date	1/10/17
Scale	1" = 10'
Drawn	LC
Job	631-16A
Sheet	A1
Of	6 Sheets