



COUNTY OF SAN LUIS OBISPO
DEPARTMENT OF PLANNING & BUILDING
TREVOR KEITH, *DIRECTOR*

THIS IS A NEW PROJECT REFERRAL

DATE: 11/14/2018

TO: 2nd District Legislative Assistant, Agricultural Commissioner, Air Pollution Control Board, Assessor, Building Division, City of San Luis Obispo, Cal Fire/County Fire, Environmental Health, Public Works, Sheriff, CA Fish and Wildlife, RWQCB, US Fish and Wildlife, Los Osos Community Advisory Council, AB52

FROM: Cassidy McSurdy (cmcsurdy@co.slo.ca.us or 805-788-2959)

PROJECT NUMBER & NAME: DRC2018-00191 Siegfried_May

PROJECT DESCRIPTION: Proposed Conditional Use permit for 3 acres outdoor cannabis cultivation, 21,850 sq/ft indoor cannabis cultivation and 61,950 sq/ft cannabis nursery to be located at 6860 Los Osos Valley Rd. San Luis Obispo, CA.

APN(s): 067-061-056

Return this letter with your comments attached no later than 14 days from receipt of this referral. CACs please respond within 60 days. Thank you.

PART I: IS THE ATTACHED INFORMATION ADEQUATE TO COMPLETE YOUR REVIEW?

- ☐ YES (Please go on to PART II.)
- ☐ NO (Call me ASAP to discuss what else you need. We have only 10 days in which we must obtain comments from outside agencies.)

PART II: ARE THERE SIGNIFICANT CONCERNS, PROBLEMS OR IMPACTS IN YOUR AREA OF REVIEW?

- ☐ YES (Please describe impacts, along with recommended mitigation measures to reduce the impacts to less-than-significant levels, and attach to this letter.)
- ☐ NO (Please go on to PART III.)

PART III: INDICATE YOUR RECOMMENDATION FOR FINAL ACTION.

Please attach any conditions of approval you recommend to be incorporated into the project's approval, or state reasons for recommending denial.

IF YOU HAVE "NO COMMENT," PLEASE SO INDICATE, OR CALL.

Date

Name

Phone



GENERAL APPLICATION FORM

San Luis Obispo County Department of Planning and Building

APPLICATION TYPE - CHECK ALL THAT APPLY

- ☐ Emergency Permit ☐ Tree Permit ☐ Minor Use Permit
☐ Conditional Use Permit/Development Plan ☐ Plot Plan
☐ Curb, Gutter & Sidewalk Waiver ☐ Other ☐ Site Plan
☐ Surface Mining/Reclamation Plan ☐ Zoning Clearance
☐ Amendment to approved land use permit ☐ Variance

Department Use Only
Do Not Mark
(Staff Apply Label Here)

APPLICANT INFORMATION Check box for contact

person assigned to this project

☐ Landowner Name _____ Daytime Phone _____
Mailing Address _____ Zip Code _____
Email Address: _____

☐ Applicant Name _____ Daytime Phone _____
Mailing Address _____ Zip Code _____
Email Address: _____

☐ Agent Name _____ Daytime Phone _____
Mailing Address _____ Zip Code _____
Email Address: _____

PROPERTY INFORMATION

Total Size of Site: _____ Assessor Parcel Number(s): _____

Legal Description: _____

Address of the project (if known): _____

Directions to the site (including gate codes) - describe first with name of road providing primary access to the site, then nearest roads, landmarks, etc.: _____

Describe current uses, existing structures, and other improvements and vegetation on the property: _____

PROPOSED PROJECT

Describe the proposed project (inc. sq. ft. of all buildings): _____

LEGAL DECLARATION

I, the owner of record of this property, have completed this form accurately and declare that all statements here are true. I do hereby grant official representatives of the county authorization to inspect the subject property.

Property owner signature _____ Date _____

FOR STAFF USE ONLY



LAND USE PERMIT APPLICATION

San Luis Obispo County Department of Planning and Building

File No _____

Type of project: ☐ Commercial ☐ Industrial ☐ Residential ☐ Recreational ☐ Other

Describe any modifications/adjustments from ordinance needed and the reason for the request (if applicable): _____

Describe existing and future access to the proposed project site: _____

Surrounding parcel ownership: Do you own adjacent property? ☐ Yes ☐ No

If yes, what is the acreage of all property you own that surrounds the project site? _____

Surrounding land use: What are the uses of the land surrounding your property (when applicable, please specify all agricultural uses):

North: _____ South: _____

East: _____ West: _____

For all projects, answer the following:

Square footage and percentage of the total site (approximately) that will be used for the following:

Buildings: _____ sq. feet _____% **EXISTING** Landscaping: _____ sq. feet _____%

Paving: _____ sq. feet _____% Other (specify) _____

Total area of all paving and structures: _____ (existing) ☐ sq. feet ☐ acres

Total area of grading or removal of ground cover: _____ ☐ sq. feet ☐ acres

Number of parking spaces proposed: _____ Height of tallest structure: _____

Number of trees to be removed: _____ Type: _____

Setbacks: Front _____ Right _____ Left _____ Back _____

Proposed water source: ☐ On-site well ☐ Shared well ☐ Other _____

☐ Community System - List the agency or company responsible for provision: _____

Do you have a valid will-serve letter? ☐ Yes ☐ No (If yes, please submit copy)

Proposed sewage disposal: ☐ Individual on-site system ☐ Other _____

☐ Community System - List the agency or company responsible for sewage disposal: _____

Do you have a valid will-serve letter? ☐ Yes ☐ No (If yes, please submit copy)

Fire Agency: List the agency responsible for fire protection: _____

For commercial/industrial projects answer the following:

Total outdoor use area: _____ ☐ sq. feet ☐ acres

Total floor area of all structures including upper stories: _____ sq. feet existing

~~**For residential projects, answer the following:**~~

~~Number of residential units: _____ Number of bedrooms per unit: _____~~

~~Total floor area of all structures including upper stories, but not garages and carports: _____ sf~~

~~Total of area of the lot(s) minus building footprint and parking spaces: _____ sf~~



ENVIRONMENTAL DESCRIPTION FORM

San Luis Obispo County Department of Planning and Building

File No _____

The California Environmental Quality Act (CEQA) requires all state and local agencies to consider and mitigate environmental impacts for their own actions and when permitting private projects. The Act also requires that an environmental impact report (EIR) be prepared for all actions that may significantly affect the quality of the environment. The information you provide on this form will help the Department of Planning and Building determine whether or not your project will significantly affect the quality of the environment.

To ensure that your environmental review is completed as quickly as possible, please remember to:

- Answer **ALL** of the questions as accurately and completely as possible.
- Include any additional information or explanations where you believe it would be helpful or where required. Include additional pages if needed.
- If you are requesting a land division or a re-zoning, be sure to include complete information about future development that may result from the proposed land division or rezoning.
- Include references to any reports or studies you are aware of that might be relevant to the questions asked or the answers you provide.

Should a determination be made that the information is inaccurate or insufficient, you will be required to submit additional information upon request.

Physical Site Characteristic Information

Your site plan will also need to show the information requested here:

- Describe the topography of the site:
Level to gently rolling, 0-10% slopes: _____ acres
Moderate slopes - 10-20%: _____ acres
20-30%: _____ acres
Steep slopes over 30%: _____ acres
- Are there any springs, streams, lakes or marshes on or near the site? ☐ Yes ☐ No
If yes, please describe: _____
- Are there any flooding problems on the site or in the surrounding area? ☐ Yes ☐ No
If yes, please describe: _____
- Has a drainage plan been prepared? ☐ Yes ☐ No
If yes, please include with application.
- Has there been any grading or earthwork on the project site? ☐ Yes ☐ No
If yes, please explain: Existing greenhouses
- Has a grading plan been prepared? ☐ Yes ☐ No
If yes, please include with application.
- Are there any sewer ponds/waste disposal sites on/adjacent to the project? ☐ Yes ☒ No
- Is a railroad or highway within 300 feet of your project site? ☐ Yes ☒ No
- Can the proposed project be seen from surrounding public roads? ☐ Yes ☒ No
If yes, please list: _____

Water Supply Information

1. What type of water supply is proposed?
☐ Individual well ☐ Shared well ☐ Community water system
2. What is the proposed use of the water?
☐ Residential ☐ Agricultural - Explain _____
☐ Commercial/Office - Explain _____
☐ Industrial – Explain _____
3. What is the expected daily water demand associated with the project? _____
4. How many service connections will be required? _____
5. Do operable water facilities exist on the site?
☐ Yes ☐ No If yes, please describe: _____
6. Has there been a sustained yield test on proposed or existing wells?
☐ Yes ☐ No If yes, please attach.
7. Does water meet the Health Agency's quality requirements?
Bacteriological? ☐ Yes ☐ No
Chemical? ☐ Yes ☐ No
Physical ☐ Yes ☐ No
Water analysis report submitted? ☒ Yes ☐ No
8. Please check if any of the following have been completed on the subject property and/or submitted to County Environmental Health.
☐ Well Driller's Letter ☐ Water Quality Analysis(☐ OK or ☐ Problems)
☐ Will Serve Letter ☐ Pump Test _____ Hours / _____ GPM
☐ Surrounding Well Logs ☐ Hydrologic Study ☐ Other _____

Please attach any letters or documents to verify that water is available for the proposed project.

Sewage Disposal Information

If an on-site (individual) subsurface sewage disposal system will be used:

1. Has an engineered percolation test been accomplished?
☐ Yes ☐ No If yes, please attach a copy.
2. What is the distance from proposed leach field to any neighboring water wells? _____
3. Will subsurface drainage result in the possibility of effluent reappearing in surface water or on adjacent lands, due to steep slopes, impervious soil layers or other existing conditions?
☐ Yes ☐ No
4. Has a piezometer test been completed?
☐ Yes ☐ No If 'Yes', please attach.
5. Will a Waste Discharge Permit from the Regional Water Quality Control Board be required?
☐ Yes ☐ No (*a waste discharge permit is typically needed when you exceed 2,500 gallons per day*)

If a community sewage disposal system is to be used:

1. Is this project to be connected to an existing sewer line? ☐ Yes ☐ No
Distance to nearest sewer line: _____ Location of connection: _____
2. What is the amount of proposed flow? _____ GPD
3. Does the existing collection treatment and disposal system have adequate additional capacity to accept the proposed flow? ☐ Yes ☐ No

Solid Waste Information

1. What type of solid waste will be generated by the project?
☐ Domestic ☐ Industrial ☐ Agricultural ☐ Other, please explain? _____
2. Name of Solid Waste Disposal Company: _____
3. Where is the waste disposal storage in relation to buildings? _____
4. Does your project design include an area for collecting recyclable materials and/or composting materials? ☐ Yes ☐ No
On Site Organic Composting in grow Areas

Community Service Information

1. Name of School District: _____
2. Location of nearest police station: _____
3. Location of nearest fire station: _____
4. Location of nearest public transit stop: _____
5. Are services (grocery/other shopping) within walking distance (1/2 mile or closer) of the project? ☐ Yes ☐ No

Historic and Archeological Information

1. Please describe the historic use of the property: _____
2. Are you aware of the presence of any historic, cultural or archaeological materials on the project site or in the vicinity? ☐ Yes ☐ No
If yes, please describe: _____
3. Has an archaeological surface survey been done for the project site? ☐ Yes ☐ No
If yes, please include two copies of the report with the application.

Commercial/Industrial Project Information

Only complete this section if you are proposing a commercial or industrial project or zoning change.

1. Days of Operation: _____
2. How many people will this project employ? I _____
3. Will employees work in shifts? ☐ Yes ☐ No
If yes, please identify the shift times and number of employees for each shift _____
4. Will this project produce any emissions (i.e., gasses, smoke, dust, odors, fumes, vapors)?
☐ Yes ☐ No If yes, please explain: _____
5. Will this project increase the noise level in the immediate vicinity? ☐ Yes ☐ No
If yes, please explain: _____
(If loud equipment is proposed, please submit manufacturers estimate on noise output.)
6. What type of industrial waste materials will result from the project? Explain in detail: _____
7. Will hazardous products be used or stored on-site? ☐ Yes ☐ No
If yes, please describe in detail: _____
8. Has a traffic study been prepared? ☐ Yes ☐ No If yes, please attach a copy.
9. Please estimate the number of employees, customers and other project-related traffic trips to or from the project: Between 7:00 - 9:00 a.m. _____ Between 4:00 to 6:00 p.m. _____

10. Are you proposing any special measures (carpooling, public transit, telecommuting) to reduce automobile trips by employees ☐ Yes ☐ No
If yes, please specify what you are proposing: _____
11. Are you aware of any potentially problematic roadway conditions that may exist or result from the proposed project, such as poor sight distance at access points, connecting with the public road?
☐ Yes ☐ No If yes, please describe: _____

Agricultural Information

Only complete this section if your site is: 1) Within the Agricultural land use category, or 2) currently in agricultural production.

1. Is the site currently in Agricultural Preserve (Williamson Act)? ☐ Yes ☐ No
2. If yes, is the site currently under land conservation contract? ☐ Yes ☐ No
3. If your land is currently vacant or in agricultural production, are there any restrictions on the crop productivity of the land? That is, are there any reasons (i.e., poor soil, steep slopes) the land cannot support a profitable agricultural crop? Please explain in detail: _____

Special Project Information

1. Describe any amenities included in the project, such as park areas, open spaces, common recreation facilities, etc.(these also need to be shown on your site plan): _____
2. Will the development occur in phases? ☐ Yes ☐ No
If yes describe: _____
3. Do you have any plans for future additions, expansion or further activity related to or connected with this proposal? ☐ Yes ☐ No If yes, explain: _____
4. Are there any proposed or existing deed restrictions? ☐ Yes ☐ No
If yes, please describe: _____

Energy Conservation Information

1. Describe any special energy conservation measures or building materials that will be incorporated into your project *: _____

*The county's Building Energy Efficient Structures (BEES) program can reduce your construction permit fees. Your building must exceed the California State Energy Standards (Title 24) in order to qualify for this program. If you are interested in more information, please contact the Building Services Division of the Department of Planning and Building at (805) 781-5600.

Environmental Information

1. List any mitigation measures that you propose to lessen the impacts associated with your project:

2. Are you aware of any unique, rare or endangered species (vegetation or wildlife) associated with the project site? ☐ Yes ☐ No
If yes, please list: _____

3. Are you aware of any previous environmental determinations for all or portions of this property?

☐ Yes ☐ No

If yes, please describe and provide "ED" number(s): _____

Other Related Permits

1. List all permits, licenses or government approvals that will be required for your project (federal, state and local): _____

(If you are unsure if additional permits are required from other agencies, please ask a member of the Planning Department staff currently assigned to the project



COUNTY OF SAN LUIS OBISPO
DEPARTMENT OF PLANNING & BUILDING
CANNABIS APPLICATION SUPPLEMENT

PLN-2018
12/8/2017

The following information is required in addition to the Land Use Permit Application.

Cannabis Activities Proposed

- | | | |
|-------------------------------------------------|---------------------------------------------|-------------------------------------------------|
| <input checked="" type="checkbox"/> Cultivation | <input checked="" type="checkbox"/> Nursery | <input type="checkbox"/> Manufacturing Facility |
| <input type="checkbox"/> Testing Facility | <input type="checkbox"/> Dispensary | <input type="checkbox"/> Distribution Facility |

For Cultivation and Nurseries ONLY

Approved Cooperative/Collective Registration number. *Note: If you do not hold an approved cooperative/collective registration, you cannot apply for cultivation until 2019.*

Approved registration number: CCM2016-361.

What is the applicant on the approved registration? *Note: The applicant name on the registration must match the applicant name on the land use permit.*

Care of
Name of applicant: Helios Dayspring /Siegfried

Are you planning on cultivating on the same site that a registration was approved for?

- ☐ Yes ☒ No

What type of State cultivation license are you seeking?

- | | | | |
|-------------------------------------------------|--------------------------------------------------------------------------------------------|---------------------------------|----------------------------------|
| <input type="checkbox"/> Type 1 | <input type="checkbox"/> Type 2 | <input type="checkbox"/> Type 3 | <input type="checkbox"/> Type 4 |
| <input type="checkbox"/> Type 5 | <input type="checkbox"/> Microbusiness | <input type="checkbox"/> Indoor | <input type="checkbox"/> Outdoor |
| <input checked="" type="checkbox"/> Mixed-light | State defines outdoor with hoops as mixed light Tier 1. Greenhouses are mixed light Tier 2 | | |

Designate the total square footage of your cultivation canopy area(s). This is not necessarily the maximum canopy size allowed by the tier of license for which you are applying, but the amount of canopy area you intend to produce. If you intend to have multiple canopy area locations, include only the total square footage of the total canopy.

3 acres
+ ~22k
sf

Check one or more of the following that apply and attach a detailed diagram of your designated canopy area. Include specific dimensions, in feet and inches, in the diagram. If you have only a single canopy area, clearly indicate that. If you are designating multiple canopy areas, clearly identify the square footage and dimensions of each area and how it is separated from other canopy areas. Note that if you are designating multiple canopy areas you must separate each area by a physical boundary such as an interior wall. Vertically stacked canopy areas must be identified as such in the detailed diagram submitted by applicants.

I have designated the specific area and dimensions of my newly designated canopy area(s):

CANNABIS APPLICATION SUPPLEMENT

- ☒ On my floor plan submitted with the application
 ☒ On an additional document submitted with my application

Record your estimates of electrical usage in kilowatt-hours (kWh). To determine how many kWh a piece of equipment uses, take the following steps:

- Determine the wattage of the device by checking manufacturer specifications
- Multiply this number by the number of hours each month the device will be in use to determine watt-hours.
- Divide each month's watt-hours by 1,000 to determine kWh. Round to three decimal places.
- Repeat this for each piece of equipment and the total amounts for each month.
- Estimates should assume the business is in full production for each month.

Describe all sources of electrical power and the total annual kWh expected to be drawn from each. For example, if the operation uses on-site power generation from a source such as solar panels, document the amount of power you expect to use from that source in addition to any other sources.

Source or utility name	Expected kWh drawn annually	See Attached Energy Estimate
PG&E	~ 408,000	
Total Annual kWh:	~ 408,000	

Clearly identify the measurement unit you are using to estimate or report your water usage. If you are using multiple units, you may use additional columns to record that information. If you are using reclaimed water, identify that as a source. If you are utilizing more sources of water than may be included on this form, you may include that information on a separate page submitted with this application.

Estimate the total water used in the production of marijuana by month. If recording estimates for multiple sources, estimate these amounts separately.

Source	Existing Wells		
Month and Year			
1	0.5558		
2	0.5558		
3	0.5558		
4	0.5558		
5	0.5558		
6	0.5558		
7	0.5558		
8	0.5558		
9	0.5558		
10	0.5558		
11	0.5558		
12	0.5558		
Totals	6.67 acre feet/year		

CANNABIS APPLICATION SUPPLEMENT

Do you plan on using pesticides?

☒ Yes ☐ No

List of pesticides anticipated to be used: Activa, Regalia, Venerate, Mildew Cure, neem oil, sulfur, Dawn dish soap, Monterey Co. insect spray, Merit, Floramite, Abamectin SM99, Green Clean, Nutrients Flora Nova grow/bloom, Armor Si, Diamond ENtar, Carboload, bat guano, Silica Blast, Root XL, overdrive, big bud, fox farm big bloom, tiger bloom, big but, kelp me kelp you, wholly mackerel, micro brew, kangaroots, open sesame, beastie bloomz, caching. SPECIFICATIONS ATTACHED

For Manufacturing ONLY

What type of State manufacturing license are you seeking? *Note: Volatile manufacturing is prohibited.*

☐ Type 6 ☐ Type 7 ☐ Type N ☐ Type P
☐ Microbusiness

What type of products do you plan on manufacturing?

☐ Oils ☐ Edibles ☐ Topicals ☐ Other _____

Will the facility be utilizing a closed-loop extraction system?

☐ Yes ☐ No

(If extracting) What types of extraction will you be performing?

☐ Butane ☐ Propane ☐ Hexane ☐ Carbon Dioxide
☐ Ethanol ☐ Mechanical ☐ None
☐ Other _____

For Distribution ONLY

What type of State distribution license are you seeking?

☐ Type 11 ☐ Type 11 – Transport Only

Will you be operating a storage-only business?

☐ Yes ☐ No

How many vehicles do you anticipate transporting/distributing product?

☐ 1-5 ☐ 6-10 ☐ 11+ ☐ N/A Storage Only/Other

CANNABIS APPLICATION SUPPLEMENT

For Dispensaries ONLY

What type of State dispensary license are you seeking? *Note: Dispensaries are not allowed to have storefronts open to the public.*

☐ Type 9 – non-storefront dispensary ☐ Type 10 ☐ Microbusiness

Will you be delivering to other jurisdictions?

☐ Yes ☐ No

How many vehicles do you anticipate delivering product?

☐ 1-5 ☐ 6-10 ☐ 11+ ☐ N/A Storage Only/Other

How many deliveries per day do you anticipate delivering product?

☐ <10 ☐ 11-50 ☐ 51-100 ☐ >100 ☐ N/A Storage Only/Other



HELIOS DAYSPRING
SUPPLEMENTAL DEVELOPMENT STATEMENT
CANNABIS USE PERMIT
6860 LOS OSOS VALLEY ROAD, SAN LUIS OBISPO, CA 93405
APN (067-061-056)
PROJECT DESCRIPTION

Parcel Size:	89.6 Acres
APN:	APN (067-061-056)
Address:	6860 Los Osos Valley Rd, San Luis Obispo, CA
Land Use Designation:	AG
Williamson Act:	No
Water:	On-Site Well
Existing Uses:	Avocado Orchard, Cattle, and Cannabis Cultivation
Access:	Los Osos Valley Road

The subject property consists of one parcel totaling 89.6 acres, located at 6860 Los Osos Valley Road in San Luis Obispo (APN 067-061-056), accessed off Los Osos Valley Road in the San Luis Obispo Sub Planning Area and zoned Agriculture. Existing uses on the site include a residence, agricultural operations, and nursery greenhouses.

Proposed Project

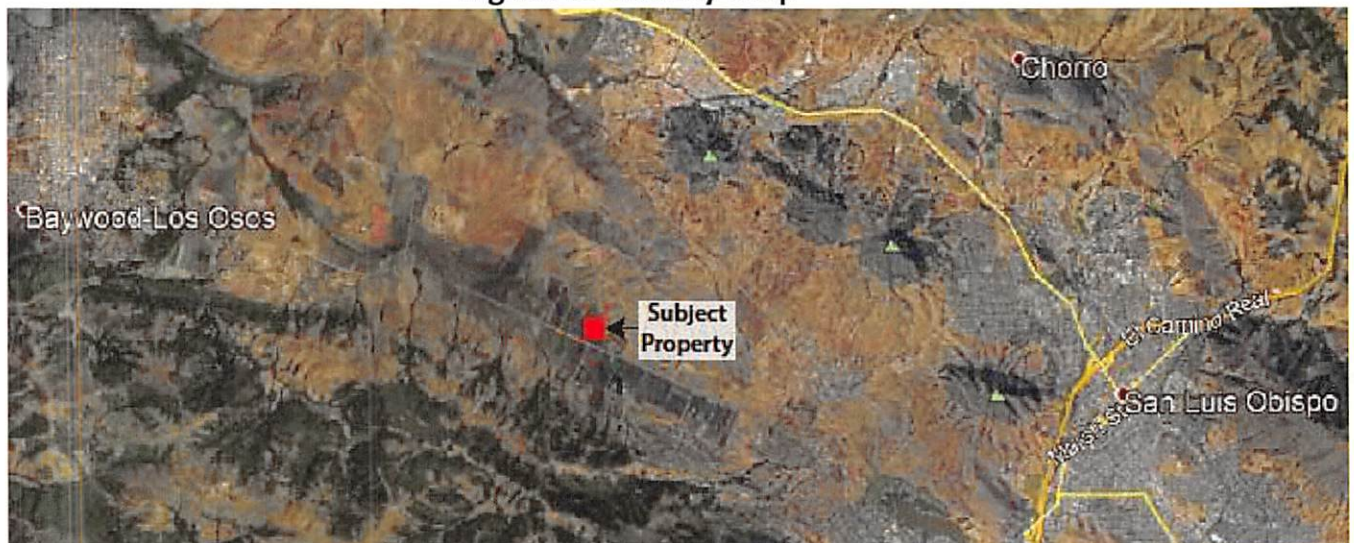
A request by Helios Dayspring for a Use Permit to authorize up to 3 acres of outdoor cultivation canopy in existing and new hoop houses, 21,850 sq. ft. of greenhouse cultivation canopy in an existing greenhouse, 61,950 sq. ft. of nursery use/vegetative canopy in an existing greenhouse and hoop houses (for onsite supportive use and offsite supply for applicant's other cultivations). The property is utilizing CCM2016-00-³¹⁴~~314~~. The proposed project has been designed in full compliance with LUO Section 4, Chapter 18322.30- Cannabis Activities as approved by the Board of Supervisors on November 27, 2017. Supporting cultivation operations will include drying, curing, and preparation of product for off-site testing and entry into the commercial marketplace. The proposed project is

located at APN 067-061-056, 6860 Los Osos Valley Rd, San Luis Obispo, CA 93405, approximately 6 miles west of downtown San Luis Obispo.

Table 1: Summary of Project Scope

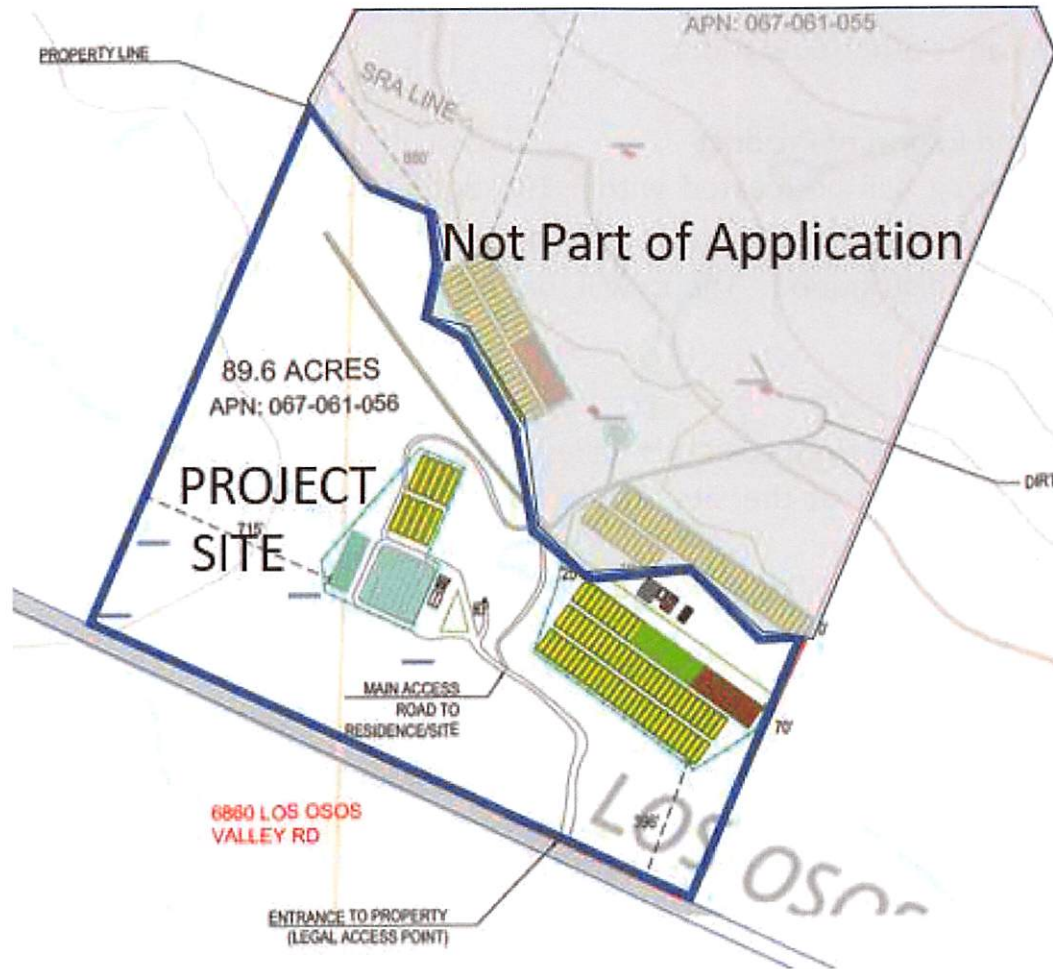
Type	Use	Size	Count	Total SF	Canopy SF
(N) Hoop House	Flowering	100' x 24'	63	151,200	100,800
(E) Hoop House	Nursery/Vegetative	150' x 24'	10	36,000	n/a
(N) Hoop House	Flowering	100' x 24'	10	24,000	16,000
(N) Hoop House	Drying	100' x 24'	10	24,000	n/a
TOTAL Hoop House				235,200	116,800
(E) Greenhouse <i>230' x 210' total</i>	Flowering	115' x 210'	1	24,150	21,850
	Nursery/Vegetative	115' x 210'		24,150	n/a
(E) Greenhouse	Nursery/Vegetative	230' x 80'	1	18,400	n/a
TOTAL Greenhouse				66,700	21,850

Figure 1: Vicinity Map



The Project site is approximately 90 acres in size. The site is located off Los Osos Valley Road which extends east towards San Luis Obispo and west toward the community of Los Osos. The area is sparsely developed with very low densities and larger parcel sizes (40+) acres. The area's topography is relatively flat with 16 acres in the site being over 10% slope, and 73.5 acres of the site being between 0-10% slope. The average slope within the site is 6%.

Figure 2: Overall Site Plan



Outdoor Cultivation

The total canopy in the hoophouses is 124,800 sq. ft. (2.68 acres). Existing hoophouses totaling 36,000 sq. ft. (24,000 sq. ft. canopy) will be utilized for nursery cannabis. New hoophouses will be constructed for 175,200 sq. ft. (116,800 sq. ft. canopy) for flowering cannabis.

Indoor Cultivation (Mixed-Light)

Two existing greenhouses will be utilized for indoor cultivation and nursery plants. One existing greenhouse will be utilized for flowering and vegetative cannabis, totaling 48,300 sq. ft. Each use is 24,150 sq. ft., with a total canopy of 21,850 sq. ft. (each). The second existing greenhouse will be utilized for a nursery or vegetative state, totaling 18,400 sq. ft. (16,100 sq. ft. canopy). The total canopy within the

greenhouses is 59,800 sq. ft. (37,950 sq. ft. vegetative and 21,850 sq. ft. flowering). All nursery/vegetative cultivation is for non-public supportive onsite and offsite use for the applicant's other operations.

Processing and Export of Product

Drying and curing will be located within 10 hoopouses totaling 24,000 sq. ft. (16,000 sq. ft. canopy). Once harvested and dried, product will be taken off-site for processing and distribution. There will be no processing, manufacturing, or distribution onsite.

Access

The parcel is accessed from Los Osos Valley Road, a public road which extends to parcels East and West of the site. The road is paved all the way to the site's driveway.

Site Operations Plan

Security

State guidelines for security on cannabis cultivation sites is limited to mention of security lighting. County regulations require submittal of a security plan for review by the County Sheriff's department as part of the business license process. A confidential security plan has been prepared for this project by Xiphos Corporation and is attached for separate law enforcement review. Security controls will include perimeter security, security lighting, security cameras, employee training, employee badging, prevention of product diversion, theft and loss, and physical presence of trained security guards.

Odor Management

Odor from the cultivation areas is naturally mitigated by the distance to the nearest offsite residence being over 2,000 feet away. Odor from the outdoor cultivation areas is naturally mitigated by the project design meeting required setbacks from offsite parcels and public rights of way for nuisance odors. Setbacks to the public right-of-way and adjacent agricultural use parcels are over 600' and no nuisance odors are anticipated. Compliance with the County's monitoring program will ensure that any concerns due to nuisance odors that may be raised will be addressed as appropriate. No additional mitigation for the outdoor activity is required.

The existing greenhouse proposed for flowering is located over 700' from the property line and over 1,500' from the nearest offsite residence. The greenhouse will be equipped with a Dynamic® Activated Carbon Matrix odor control and air handling system to provide internal pressurized air conditioning, temperature control, and extensive air filtration odor control. This system is compliant with Section 22.404.050D.8- Nuisance Odors by providing sufficient mechanical ventilation controls including misting and evaporative coolers that work in conjunction with an activated carbon filtration system installed within the structure. Refer to Plan Set page Z-101 for product specifications.

Signage

No exterior signage distinctive to the cannabis operation is proposed. All required land use permit approvals, State, and County permits and licenses will be posted on the site.

Records

Clear and adequate records will be maintained in compliance with all applicable State and County requirements.

Parking

The property site provides ample parking space adjacent to the cultivation, to be shared with the cannabis use proposed on the adjacent contiguously-owned parcel to the north. See Sheet A-002 for location of 16 spaces to be used for the cultivation and any seasonal harvest staffing needs. This location is not in conflict with any adjacent properties or uses. See request for modification of nursery specialty parking standards 22.18 herein.

Employee Safety and Training Plan

The proposed operations are agricultural in nature and conducted according to controls in place for the industry. No nursery, manufacturing, dispensary, or distribution activities are proposed. No public access to the site will occur at any time. Operations will be managed contiguously with the parcels to the south and east, resulting in a comprehensive operation.

Standard agricultural safety and training will occur for all staff as well as additional security training to ensure full compliance with State standards for cannabis track and trace.

Traffic

A traffic study was conducted by Orosz Engineering Group Inc. (see attached report). At full capacity the operations is estimated to result in 29 average trips per day, 1 of which are to occur during the evening peak hour. There will be an additional 4 commercial deliveries per year for soil and farm supplies. This is within standards for the access road and standard agricultural operations for the property. Please see the following traffic analysis summary for the project:

Use	Unit	Trip Rate Source	Trip Rates					
			ADT	PM Peak Hour				
				In	Out	Total		
6860 B Los Osos Valley Road								
Hoop House (Growing)	5.25	AC	County of SLO	2	0	0	0	
Hoop House (Drying)	0.55	AC Seasonal	County of SLO	0	0	0	0	
Greenhouse (Growing)	66.7	KSF	County of SLO	0.27	0.007	0.018	0.025	
				Traffic Volumes				
Proposed Project	Size			ADT	PM Peak Hour			
					In	Out	Total	
6860 B Los Osos Valley Road								
Hoop House (Growing)	5.25	KSF		11	0	0	0	
Greenhouse (Growing)	66.7	KSF		18	0	1	1	
Project Total				29	0	1	1	

Neighborhood Compatibility

Cannabis cultivation is a commercial agricultural operation that is consistent with previous and current agricultural use of the property and surrounding area. The site is not located within 1,000 feet from any pre-school, elementary school, junior high school, high school, library, park, playground, recreation or youth center, licensed drug or alcohol recovery facility, or licensed sober living facility. The project parcel and surrounding properties are all in agricultural production. There is no projected increase in noise level from this project as no construction is proposed and the agricultural cultivation activity is not a noise-intensive use. No potential neighborhood compatibility issues are anticipated as the project is located on an agricultural zoned parcel surrounded on two sides by contiguously-

owned cannabis operations and there are no nearby non-agricultural neighborhoods to the project site. As all cannabis cultivations will be required to comply with the County cannabis monitoring program and will be required to meet all conditions of approval for the 5-year use permit timeframe, in the event nuisance odor concerns are raised during the operation of the project the applicant will work with County staff to address any identified compatibility issues.

Waste Management Plan

Cannabis cultivation produces minimal waste. All packaging for soil or nutrient amendments will be contained within onsite waste receptacles. All green waste consisting of dead and/or stripped of flower plants and soil will either be composted onsite or disposed of through the property's waste hauler and in full compliance with State requirements for disposal of any waste containing or potentially containing cannabis plant material. Onsite solid waste collection will occur within the fenced cannabis use area and is compliant with Section 22.10.050 for solid waste and recycling collection.

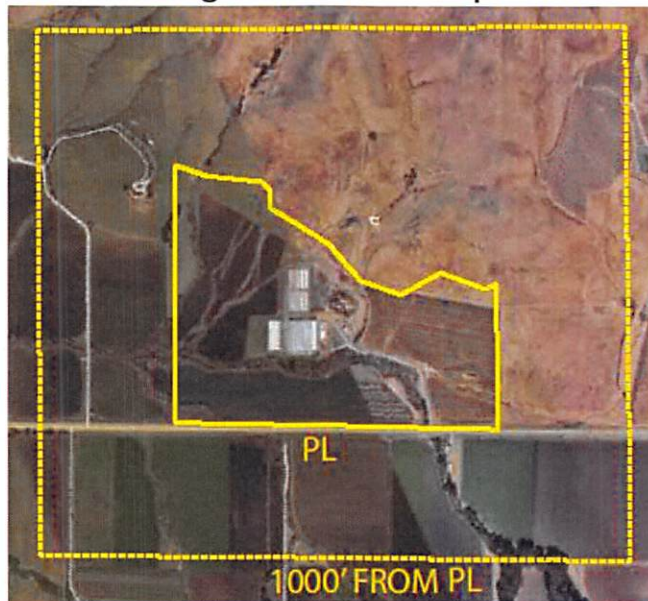
Pesticide and Fertilizer Usage

Pesticide and fertilizer usage will be conducted according to the County of San Luis Obispo Department of Agriculture by obtaining an Operator Identification Number and complying with all application, reporting, and use requirements. Products used onsite are stored in small containers within a secure storage container. See Sheet A-002 for location and Chemical List for compiled material data safety sheets.

Setbacks

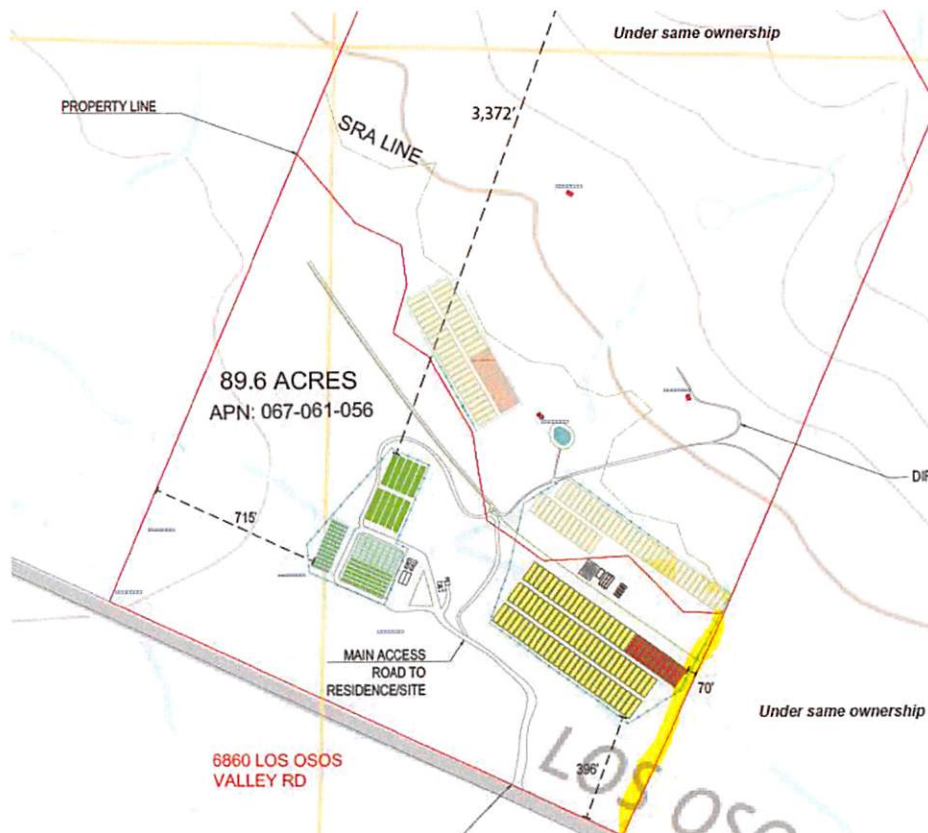
Land Use Ordinance section 22.40.050 (D)(3)(b) requires outdoor cannabis cultivation sites to be setback 300 feet from all property lines and public rights of way. The cultivation area will be at a 396' setback from the Southern property line, 715' setback from the Western property line, 3,372' setback from the Northern property line (contiguously owned parcel), and a 70' setback from the Eastern property line. The properties to the north and east that are subject to the reduced setbacks are owned by the applicant and proposed for cannabis cultivation. The nearest sensitive receptors (schools, parks, libraries, licensed recover facilities, et. al) are located well outside the 1000' setback required by 22.30.D.1 (Figure 3). The agricultural zoned parcel size of 89.6 acres meets the size requirement of 25 acres.

Figure 3: Buffer Map



Setback Modification and Required Finding

A setback modification is requested as the outdoor cultivation area on the applicant's site is located within 300 feet of the nearest property lines to the east.



According to Land Use Ordinance Section 22.40.050(E)(7), in order to approve the setback modification, the Review Authority must make a special setback modification finding. The Review Authority must find:

“Specific conditions of the site and/or vicinity make the required setback unnecessary or ineffective. Modification of the setback will not allow nuisance odor emissions from being detected off site”.

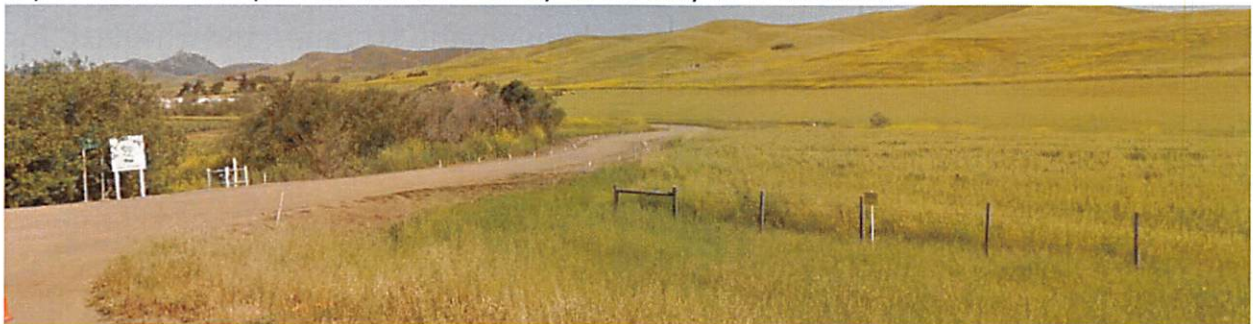
In this case, specific conditions of the site and vicinity make the required 300-foot setback from the easterly property line of the site unnecessary and ineffective. Setbacks of this type are implemented to address issues such as noise, lighting, odor, and concentration of development. The property owner proposes to use existing structures for the cannabis greenhouse operation and the outdoor cultivation will occur in the most agriculturally viable locations in compliance with setbacks to public right of way and offsite parcels. The applicant owns the adjacent parcels to the east and the north (APNs 067-061-049 and 067-061-055, respectively) and is proposing cannabis cultivation operations with the same outdoor uses proposed in this project.

Air Quality

The project is located on an existing agricultural site, with no grading required and solely organic practices utilized. There are no predicted air quality impacts.

Screening and Fencing

Los Osos Valley Road is a public road that extends to parcels beyond the site. County fencing requirements for cannabis require a 6' high secure and durable fence around all cannabis activities. It is also required that cannabis plants not be easily visible from offsite. The parcel currently has a 3' barbed wire fence around a portion of the parcel and the entry driveway is unfenced.



The cannabis use, located in existing structures and open cultivation areas will be screened within greenhouses or hoophouses, and the entire operations enclosed

with a secure and durable fence at least 6' high. A 12' tall polyethylene screen for both privacy and wind protection will also be installed around the outdoor cultivation area. The photo below is representative of the type of hoop house construction and security/screening fencing that will be utilized at the property.



Neither the operation or security/wind screening fence will silhouette above any surrounding ridgeline.

Storage and Hazard Response Plan

Ordinance Section 22.40.050.C.4 requires a storage and hazard response plan for all materials to be kept on site. Pesticide and fertilizer usage will be conducted according to the County of San Luis Obispo Department of Agriculture by obtaining an Operator Identification Number and complying with all application, reporting, and use requirements. Products used onsite will be stored in small containers on shelving inside metal containers. A list of material to be used is provided in the Cannabis Application Supplement as required by Section 22.40.050.C.3 and further product specifications are also included in this application package.

There will be a total of 3 seatrains containers, each at 40' x 10' or 400 sq. ft.: one for pesticides and one for nutrition, one for equipment storage, and the last for miscellaneous storage space, see Sheet A-002, A-003 for locations. See detail FQ-102 for floor plan details. Soil will also be stored and amended as necessary; see Sheet A-002 for locations of soil and nutrition storage. Diesel storage (see Sheet A-003 and FQ-102) will be installed according to Building Department requirements with verified connections to ensure no spillage occurs. A Hazardous Materials Business Plan will be filed in the event any material volumes will be stored that meet the state reporting thresholds. Any spills will be contained and properly cleaned in accordance with controls in place for the commercial farming industry.

Water Management Plan

Application requirements according to Section 22.40.050C.1 require a detailed water management plan including the proposed water supply, conservation measures, and any water offset requirements.

Section 22.40.050D.5 requires sites in a groundwater basin at Level of Severity III provide an estimate of water demand prepared by a licensed professional engineer. The site is not located in a Level of Severity III groundwater basin and therefore an engineered analysis is not required. This section also prohibits water transport by vehicle from offsite sources. As ample water is available onsite from existing wells, no vehicle import of water will occur.

Section 22.40.040L.-Water Quality requires cannabis cultivation to comply with Regional Water Quality Control Board environmental measures. The operation will be required to obtain a Cannabis General Use permit from the RWQCB. The property is in the Los Osos Water and San Luis Obispo/Avila Planning Areas and falls within the Laguna Lake and Warden Lake Watersheds. The project site is served by nine existing wells that have historically served the property for agricultural uses, ranging from 16 to 30 gallons per minute. Refer to attached Well Completion reports and owner-supplied pump data. No import of water is necessary or will occur in association with the proposed cannabis cultivation operations. Three additional 10,000 gallon tanks are proposed to supply the outdoor cultivation site and will be connected to the existing above-ground irrigation system (refer to Site Plan sheet A-003. The historic capability to provide water for the existing agricultural cultivation support the land use of commercial cannabis cultivation.

The projected water usage utilizing published data from the Central Coast Regional Water Control Board cannabis development team is as follows:

Cultivation Hoophouse/Greenhouse					
	Use Factor (gallons)	sf	days/yr	gall/yr	AFY
Greenhouse FLOWER	0.1	21850	260	568,100	1.74
Greenhouse NURSERY	0.1	37950	260	986,700	3.00
Hoophouse NURSERY	0.03	24000	150	108,000	0.33
Hoophouse FLOWER	0.03	116800	150	525,600	1.60
TOTAL		200,600		2,188,400	6.67

Monthly use projections are included in the Cannabis Application Supplement.

Energy Use

Section 22.40.050.C.6. requires identification of all proposed power sources and 22.40.050.D.7. requires mixed-light operations to comply with State regulations regarding energy requirements. The project site is served by PG&E, which is fully compliant with State regulations as approximately 30% of the energy delivered by PG&E is from renewable energy sources and 70% is from GHG-free sources.

Refer to PLN-2018-Cannabis Application Supplement for a detailed estimate of electrical usage for the mixed-light cultivation to be located in an existing greenhouse on APN 067-061-056.

Issues Requiring Special Consideration

Biological Resources

Given the placement of the project site on the parcel, no sensitive biological resources are anticipated to be potentially impacted. The project has been designed to avoid impacts to sensitive resources and habitats; all proposed project activities will maintain a minimum 100-foot setback from the blue line drainages defined on the site.

Project Site Outside of 100' Buffer Zone



A Biological Resources Assessment (BRA) was conducted by Terra Verde Environmental Consulting, LLC for the proposed project and surrounding area. The use area was evaluated and identified that all uses will be located at least 100 feet from U.S. Geological Survey (USGS) blue line streams. The project design has been designed to avoid and/or minimize impacts to areas of intact native habitat and

sensitive resources, and consists of utilizing existing greenhouse structures and actively tilled agricultural use areas.

In accordance with the Biological Resources Assessment prepared by Terra Verde Environmental Consulting LLC (August 2018), the project site is characterized by ongoing agriculture uses with greenhouse structures installed. An unnamed USGS blue line drainage transects the property with agricultural uses consisting of row crops, greenhouses and access roads present up to the edge of the drainage.

No vegetation removal or trimming is proposed as part of the project consisting of crop conversion on existing agricultural fields. The project includes appropriate setbacks from the drainage feature on the site and no impacts to the USGS drainage are anticipated. The following avoidance, minimization, and mitigation measures are incorporated into the project at 6860 Los Osos Valley Road (APN 067-061-056) to support the determination that as proposed, the project does not have a potential for causing a significant effect on the environment:

Biological Measure 1: Site Maintenance and General Operations

The following general measures are recommended to minimize impacts during active construction:

- The use of heavy equipment and vehicles shall be limited to the proposed project limits and defined staging areas/access points. The boundaries of each work area shall be clearly defined and marked with high visibility fencing. No work shall occur outside these limits.
- In the vicinity of sensitive resources and habitats (e.g., hydrologic resources, special-status species, and CNDDB sensitive natural communities), signs shall be posted at the boundary of the work area indicating the presence of sensitive resources.
- Staging of equipment and materials shall occur in designated areas at least 100 feet from drainages, swales, and stock ponds.
- Secondary containment such as drip pans shall be used to prevent leaks and spills of potential contaminants.
- Washing of concrete, paint, or equipment, and refueling and maintenance of equipment shall occur only in designated areas. Sandbags and/or absorbent pads shall be available to prevent spilled fuel from leaving the site.
- Any chemicals used shall be prevented from entering the jurisdictional areas.
- Construction equipment shall be inspected by the operator daily to ensure that equipment is in good working order and no fuel or lubricant leaks are present.

Biological Measure 2: Surveys and Monitoring for Special-status Wildlife (CRLF)

A qualified biologist shall conduct a pre-activity survey prior to the start of construction to ensure special-status wildlife are not present within proposed work areas. In the event that special-status species are found, they shall be allowed to leave the area on their own volition or relocated (as permitted) to suitable habitat areas located outside the work area(s). If necessary, resource agencies will be contacted for further guidance. Preconstruction surveys and monitoring shall be conducted as follows:

A qualified biologist shall complete a preconstruction survey for these species within 48 hours prior to the start of all work within 100 feet of suitable habitat. Surveys shall include an inspection of all work areas, staging areas, and access routes.

In addition, a qualified biologist shall conduct full-time monitoring during all vegetation clearing and initial earth disturbance within 100 feet of suitable habitat on site. If CRLF and/or western pond turtles are discovered in the work areas, they shall be allowed to leave the area on their own volition or be relocated by a qualified biologist with appropriate authorization from CDFW and/or the USFWS to pre-determined suitable habitat areas located outside the immediate impact area.

Biological Measure 3: Protection for CRLF

Prior to commencement of clearing/grading/construction/improvement activities, the applicant shall make all efforts to schedule work activities during the dry season when impacts to CRLF and aquatic habitats would be minimal. This would include the following:

- Avoid work during the rainy season (October 15 through April 15). If work must occur in the rainy season, no work shall occur during or immediately after rain events of 0.25-inch or greater.
- A follow-up CRLF survey shall be conducted prior to the start of work following any rain event of 0.25-inch or greater.
- Avoid nighttime work. If nighttime work is deemed necessary, a qualified biologist shall be on site until it is determined that no potential impacts to CRLF would occur based on conditions and the scope of work.

Work shall halt if CRLF are discovered within disturbance areas and resource agencies shall be contacted. If western pond turtles are discovered in the work areas, they shall be relocated by a qualified biologist to pre-determined suitable habitat areas located outside the immediate impact area.

Parking Modification and Required Findings

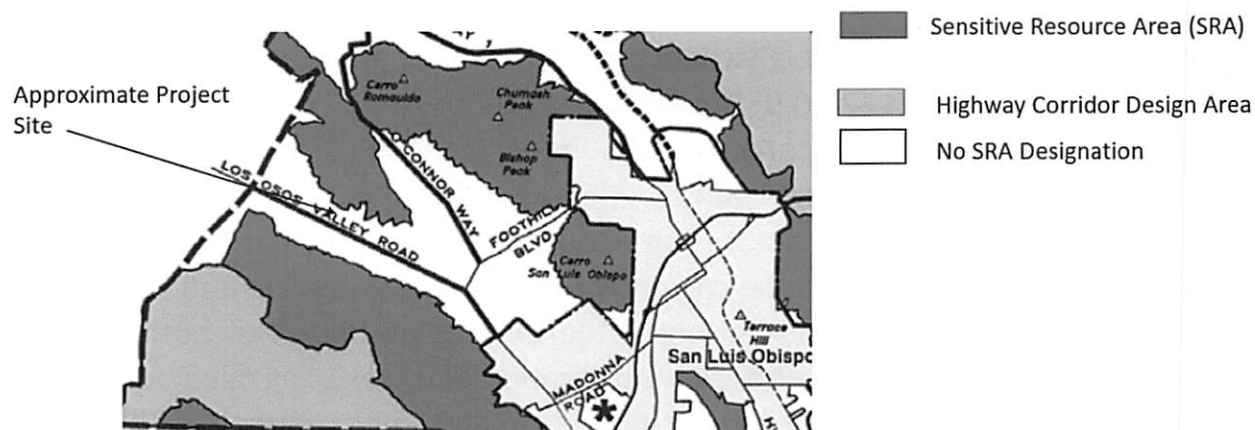
The project will require 7 full-time staff shared with the operations on the contiguously-owned parcel to the north, with seasonal increases to 11. The project is designed to accommodate staff with sixteen shared 16' x 8' parking spaces on the property. Due to the limited nature of the staff required for the operation, parking standards as outlined in Chapter 22.18, Nursery Specialties are not appropriate for the project. The following findings are provided for use in a request for modification of parking standards of Chapter 22.18, Nursery Specialties.

In accordance with Chapter 22.18.18.020.H, the following three findings support the request to modify the parking standards:

- a. The characteristics of the project, which consists of a cannabis cultivation consisting of outdoor and indoor uses, with seasonal temporary staff, do not necessitate the number of parking spaces, types of design or improvements required by this chapter. The agricultural cultivation staff can be accommodated in the existing level dirt area adjacent to the cultivation that will be marked and designated for parking.
- b. The proposed parking area that consists of an unpaved parking lot with cone designations adjacent to the cultivation areas is adequate to accommodate all parking needs on site generated by the use, as the operation will be staffed by seven staff cultivating an agricultural product and there are no site constraints as far as space availability for the cultivation use.
- c. No traffic safety problems will result from the proposed modification of the parking standards as there is ample existing parking on the site for the existing cannabis cultivation business, the parking location is located well away from any public right of way, and there is adequate space surrounding the parking area for any turning movement.

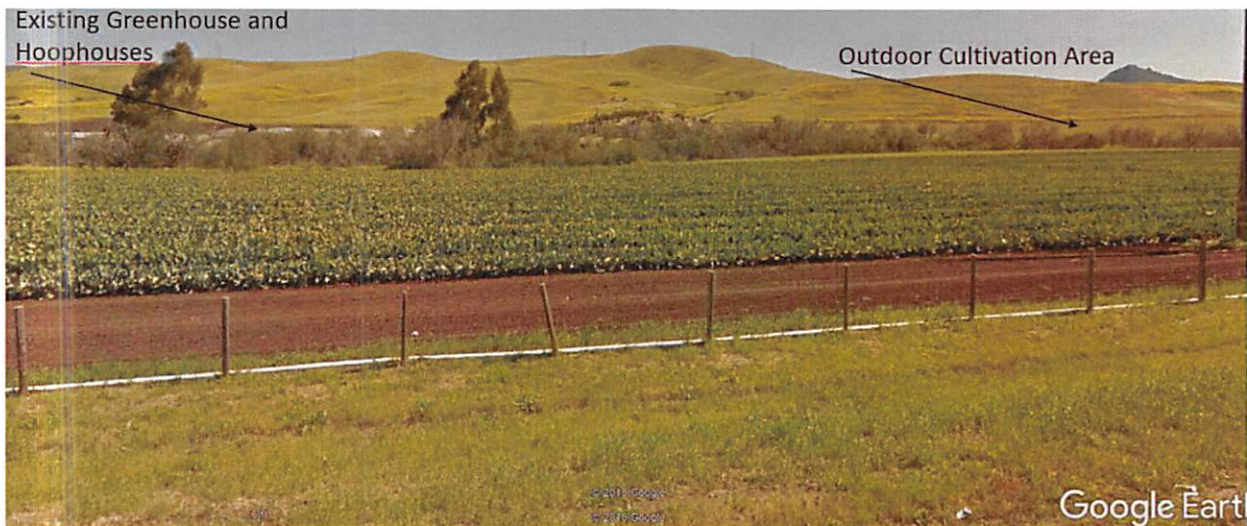
Visual Resources

County Ordinance Section 22.108.020 defines highway corridor design standards for certain agricultural structures on land within defined design areas, and are subject to Sensitive Resource Area combining designation for protection of critical resources such as the Morros.



As shown above, the project is located south of and outside of this defined area. To provide further verification the project site is not visible from other potentially visually sensitive locations such as Foothill Boulevard or within the primary cone of vision for travelers on Los Osos Valley Road, a visual resource assessment was prepared to show four different locations of the project site as seen from Los Osos Valley Road and Foothill Blvd. Utilizing the mature trees located east of the site as

reference, this study clearly shows that the site is not discernable from offsite until almost immediately upon it. The proposed project is a commercial agriculture operation proposed in accordance with all ordinance standards including siting, fencing, property designation, and utilization of existing structures to minimize site disturbance. See Google Earth image below of property frontage. The project is partially screened by vegetation and appropriately setback from all public right of ways and sensitive use areas.



Variance Request

In accordance with 22.62.070, a variance from the strict application of the indoor canopy limits outlined in 22.40.050.2.a is hereby requested. The request is for this property to be allowed to incorporate the indoor cannabis use proposed on the adjacent, contiguously-owned parcel APN 067-061-055 in order to avoid construction of permanent structures on the upper parcel. The parcel to the north consists of an undeveloped parcel currently used for cattle grazing and supportive agricultural uses and in consideration of the existing condition of both parcels, determined it appropriate to propose full utilization of the existing developed areas available, rather than proposed construction on the upper parcel. Utilizing an established greenhouse complex that would otherwise go unused will not conflict with uses of either parcel as both will be operated by the property owner as cannabis farms.

Findings in support of the variance request:

- a. Utilization of existing structures for commercial agriculture allows the property owner to utilize the full canopy allowance authorized under the ordinance for both parcels while eliminating the need for construction.
- b. The special circumstances of this parcel are that there is an existing greenhouse capable of supporting 44,000 sq. ft. of cannabis and the adjacent property, which is authorized by ordinance to cultivate 22,000 sq. ft. of cannabis currently has no buildings on the parcel. By allowing utilization of the existing greenhouse, it allows the full development potential for the parcel to the north to utilize existing developed structures that are appropriate for the use.
- c. The variance is a request to allow the adjacent contiguously-owned parcel to utilize existing buildings in conformance with the historical commercial agriculture operations on the parcels.
- d. The variance does not adversely affect public health or safety, is not materially detrimental to the public welfare, nor injurious to nearby property or improvements.
- e. The variance is in conformance with the San Luis Obispo Area Plan, Section 22.102.020.D as this proposal avoids new development and utilizes existing agricultural production buildings.

D. Production agricultural areas. New development shall be designed to minimize the loss of existing and potential production agricultural areas by the placement of buildings and new parcels outside the most agriculturally capable areas. For the purposes of this standard, production agricultural areas consist of prime soils (Class I and II irrigated soils according to the U.S. Natural Resource Conservation Service) and other areas capable of agricultural production which primarily consist of Class III and IV soils, but may also include productive areas with Class VI soils.



Parcel Information

APN: 067-061-056
Assessee: MAY JAMES D TRE ETAL
Care Of:
Address: 114 FEL MAR DR SLO
CA 93405
Description: PM 67/19-22 PAR 2
Site Address:
06860 LOS OSOS VALLEY RD
Tax Rate Area Code: 112002
Estimated Acres: 92.12
Community Code: SLOSLO
Supervisor District: Supdist 2
Avg Percent Slope: 6



Selected Parcel

Land Use Information

Land Uses Combining Designations

AG	GSA Geologic Hazard Area
----	--------------------------



Parcel location within San Luis Obispo County

Permit Information

Permit	Description	Application Date
DRC2018-00191	Land Use	10/25/2018 3:04:55 PM
COD2014-00591	Code Enforcement	6/4/2015 9:57:39 AM
PMT2006-01488	PMTC - Commercial Permit	12/5/2006 4:36:13 PM
PMT2006-01487	PMTC - Commercial Permit	12/5/2006 4:35:13 PM
C8886	PMTR - Residential Permit	11/4/2002 12:00:00 AM



Parcel Summary Report

APN: 067-061-056

C7616	PMTR - Residential Permit	8/19/2002 12:00:00 AM
C8071	PMTG - Grading Permit	7/30/2002 12:00:00 AM
C2065	PMTC - Commercial Permit	8/23/2000 12:00:00 AM
PMT2002-10035	PMTR - Residential Permit	8/23/2000 12:00:00 AM
C0942	PMTR - Residential Permit	7/17/2000 12:00:00 AM
C0943	PMTR - Residential Permit	7/17/2000 12:00:00 AM
PMT2002-27993	Determination	6/22/2000 12:00:00 AM
PMT2002-27991	Determination	6/22/2000 12:00:00 AM
PMT2002-27989	Determination	6/22/2000 12:00:00 AM
PMT2002-27990	PMTR - Residential Permit	6/22/2000 12:00:00 AM
PMT2002-27995	Determination	6/22/2000 12:00:00 AM
S990160P	Subdivision	12/3/1999 12:00:00 AM
A5619	PMTC - Commercial Permit	12/2/1998 12:00:00 AM
A5676	PMTR - Residential Permit	11/2/1998 12:00:00 AM
A4962	PMTC - Commercial Permit	3/26/1998 12:00:00 AM
97156	PMTR - Residential Permit	12/14/1995 12:00:00 AM
96996	PMTG - Grading Permit	4/27/1995 12:00:00 AM


Clerk Recorder Documents

Clerk Document	Date	Document Type
2007-I-000256	01/29/2007	C

Interactive Data Viewer



Legend

-  SLO County Parcels
- Roads**
 -  CalTrans
 -  Maintained by SLO CO
 -  Private Maintenance
 -  Federal or State Maintenance
-  City Limits
-  CD AR - Airport Review Area

-1,504.66 0 752.33 1,504.66 Feet 1: 9,028

WGS_1984_Web_Mercator_Auxiliary_Sphere
 © County of San Luis Obispo Planning and Building Department



The County of San Luis Obispo does not assume liability for any damages
 caused by errors or omissions in the data and makes no warranty of any kind,
 express or implied, that these data are accurate and reliable.

Map for Reference Purposes Only







Referral -- Page 32 of 45

Interactive Data Viewer








Legend

Roads

-  CalTrans
-  Maintained by SLO CO
-  Private Maintenance
-  Federal or State Maintenance

Community Advisory Groups

-  Community Advisory Group Boundary
-  Cayucos Citizens Advisory Council Subarea
-  Creston Advisory Body Sub Areas

-  Supervisor Districts
-  Land Use Outlines

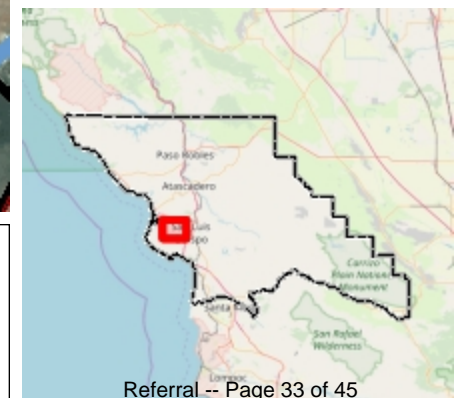
-12,037.30 0 6,018.65 12,037.30 Feet 1: 72,224



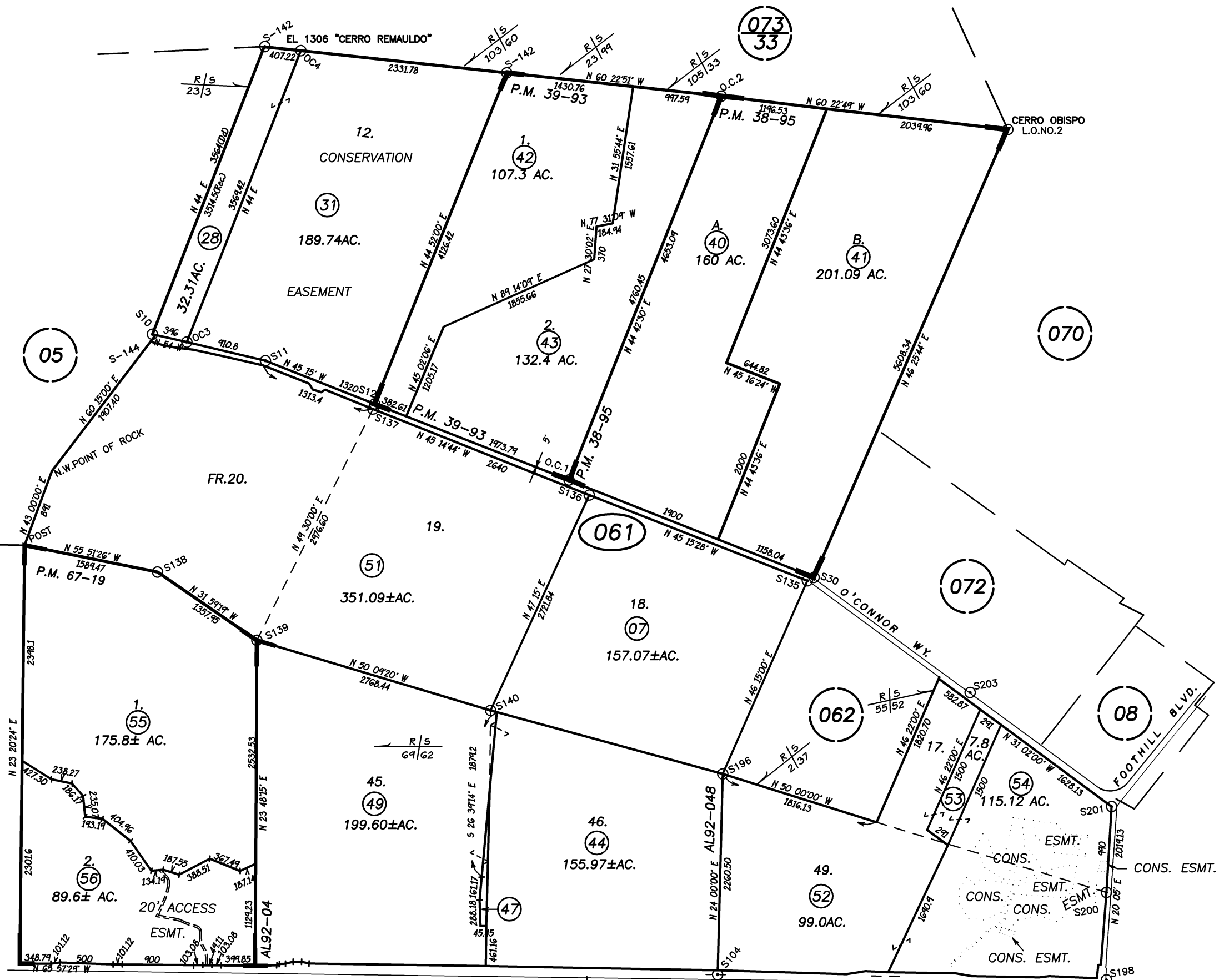
WGS_1984_Web_Mercator_Auxiliary_Sphere
 © County of San Luis Obispo Planning and Building Department

The County of San Luis Obispo does not assume liability for any damages
 caused by errors or omissions in the data and makes no warranty of any kind,
 express or implied, that these data are accurate and reliable.

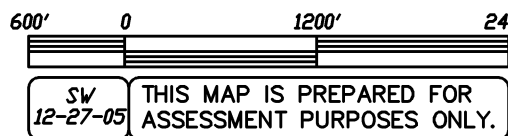
Map for Reference Purposes Only



Referral -- Page 33 of 45



REVISIONS	
I.S.	DATE
NA	12-27-05
NA	02-15-05
NA	09-27-06
07-205	10-16-06
NA	04-30-07
NA	12-12-11
NA	01-20-12
NA	02-28-16

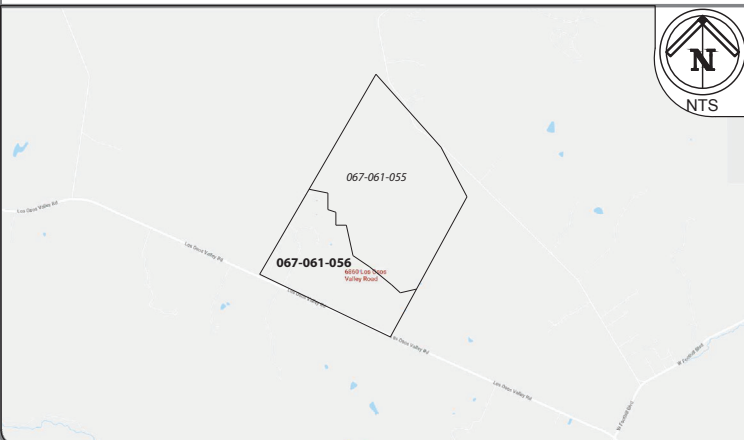


6860 LOVR

6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405
APN:067-061-056

6860 LOVR
6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405

VICINITY MAP



SCOPE OF WORK: 067-061-056

2.68 Acres Outdoor Cultivation in New Hoophouses
24,000 SF Outdoor Nursery in New Hoophouses
16,000 SF Outdoor Drying in New Hoophouses
21,850 SF Indoor (Greenhouses) Cultivation
37,950 SF Indoor (Greenhouses) Nursery
320 SF Organic Preventive Storage
320 SF Transportation Storage
320 SF Nutrition Storage

SHEET INDEX:

G-001	TITLE SHEET
A-001	SITE PLAN
A-002	SITE PLAN DETAIL A
A-003	IRRIGATION & AGGREGATE WATTAGE PLAN DETAIL
A-6.0	FLOORPLANS & RENDERERS FOR GREEN HOUSES & HOOP HOUSES
A-6.1	ELEVATIONS GREENHOUSE & HOOP HOUSES
S-1.0	HOOP HOUSE CONSTRUCTION FABRICATION
S-2.0	GREENHOUSE FOUNDATION PLAN
FQ-101	HOOPHOUSE INTERIOR (WORK & EQUIPMENT CLEARANCE)
FQ-102	SEA STORAGE CONTAINER FLOOR PLAN
Z-101 +	DATASHEETS Referral -- Page 35 of 45

PROJECT:

DRAWN BY: GA
DATE: 8/20/18
REV BY: ---
REV DATE: ---

SHEET NUMBER:

G-001



SITE PLAN

SCALE: 1/256" = 1'-0"



LEGEND

SYMBOL	DESCRIPTION
	SOIL STORAGE SITE
	YELLOW HOOP HOUSE BLOOMING/FLOWERING
	GREEN HOOP HOUSE VEGETATIVE PHASE
	BROWN HOOP HOUSE DRYING PHASE
	WELL & PUMP
	WATER TANK
	NEW FENCE LINE
	EXISTING FENCE LINE
	WELL
	YELLOW INDOOR GREENHOUSE FOR BLOOMING/FLOWERING
	GREEN INDOOR GREENHOUSE FOR VEGETATIVE PHASE/STATE

6860 LOVR
6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405

PROJECT:

DRAWN BY: GA
DATE: 8/20/18

SHEET NUMBER:
A-001

NOTE: (E) DENOTES EXISTING STRUCTURE
(N) DENOTES NEW STRUCTURE

LEGEND

SYMBOL DESCRIPTION



SOIL STORAGE COMPOST



YELLOW HOOP HOUSE
BLOOMING/FLOWERING



GREEN HOOP HOUSE
VEGETATIVE PHASE



BROWN HOOP HOUSE
DRYING PHASE



SEATRRAIN 40' CONTAINER



DUMPSTER CONTAINER



PORTABLE POTTY



DIESEL 5,000 LITER



WELL & PUMP



WATER TANK



NEW FENCE LINE



EXISTING FENCE LINE



PROPERTY LINE



WIND BREAK 12'-0" FENCE
MADE FROM POLYETHYLENE
IN BLACK FOR PRIVACY



YELLOW INDOOR
GREENHOUSE FOR
BLOOMING/FLOWERING



GREEN INDOOR
GREENHOUSE FOR
VEGETATIVE PHASE/
STATE



SITE PLAN DETAIL A-002

SCALE: 1/128" = 1'-0"

APN# 067-061-055
CONTIGUOUSLY OWNED

APN: 067-061-056

[10] 150'X24' EXISTING HOOP HOUSES
USE: NURSERY 36,000 FT²

SHARED SUPPORTIVE
USE SPACE

(E)[1] MANUFACTURED
BUILDING: OFFICE 900 FT²

(E)[1] MANUFACTURED
HOME 1188 FT²

[1] 230'X80' EXISTING GREEN HOUSE
USE: NURSERY 18,400 FT²

[1] 230'X210' EXISTING GREEN HOUSE
USE: FLOWERING/BLOOMING 24,150 FT²
USE: NURSERY 24,150 FT²

(E)[1] WAREHOUSE
2,400 FT²

[73] 100'X24' NEW HOOP HOUSES
USE: FLOWERING/BLOOMING
175,200 FT²

(N) [1] DUMPSTER CONTAINER
(N) [3] SEATRRAIN 40' CONTAINERS
#1 FOR NUTRITION STORAGE
#2 FOR ORGANIC PREVENTATIVE STORAGE
#3 FOR TRANSPORTATION
(SEE DETAIL ON FQ-102)

(N) 6 PORTA POTTIES
(N) [1] 1,000 GALLON DIESEL TANK
(SEE FQ-102 FOR DETAIL)

(N) [16] 8'X16' SPACE
PARKING LOT ON EXISTING
DIRT WITH CONE DESIGNATIONS

APN# 067-061-049
CONTIGUOUSLY OWNED
CANNABIS USE
DRC2018-00180

Referral -- Page 37 of 45

PROJECT:
6860 LOVR
6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405

DRAWN BY: GA
DATE: 8/20/18

SHEET NUMBER:

A-002

WALKWAY LEGEND

SYMBOL DESCRIPTION

EQUIPMENT & WALKWAY ACCESS

EQUIPMENT LEGEND IRRIGATION

SYMBOL DESCRIPTION

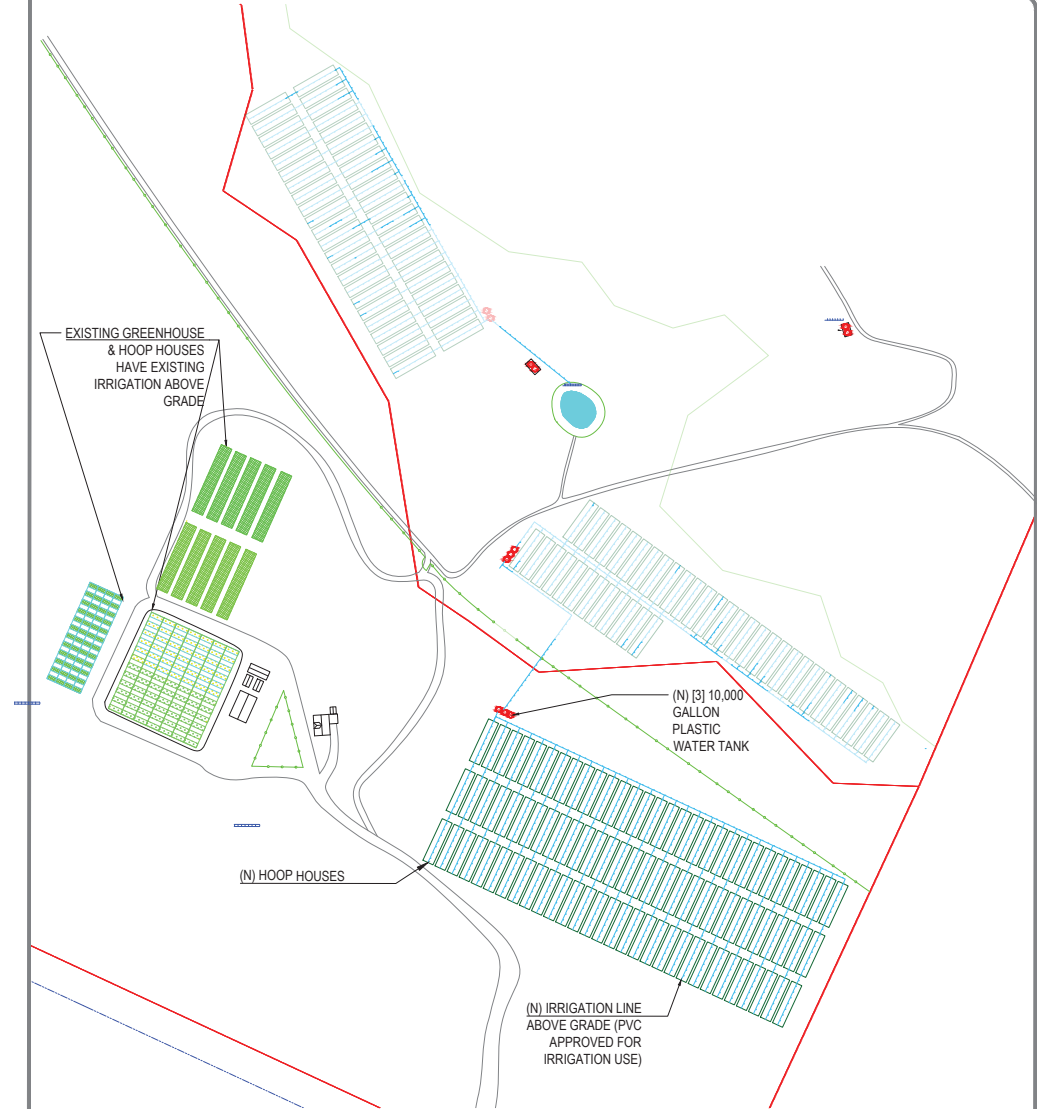
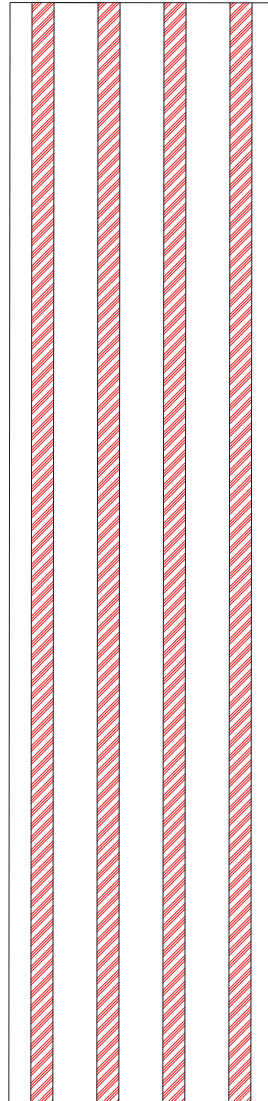
IRRIGATION LINE

WELL & EXTERIOR PUMP

10,000 GALLON WATER TANK-PLASTIC

HOOP HOUSE AGGREGATE DETAIL

SCALE: 3/16" = 1'-0"



IRRIGATION PLAN DETAIL A-004

SCALE: 1/128" = 1'-0"

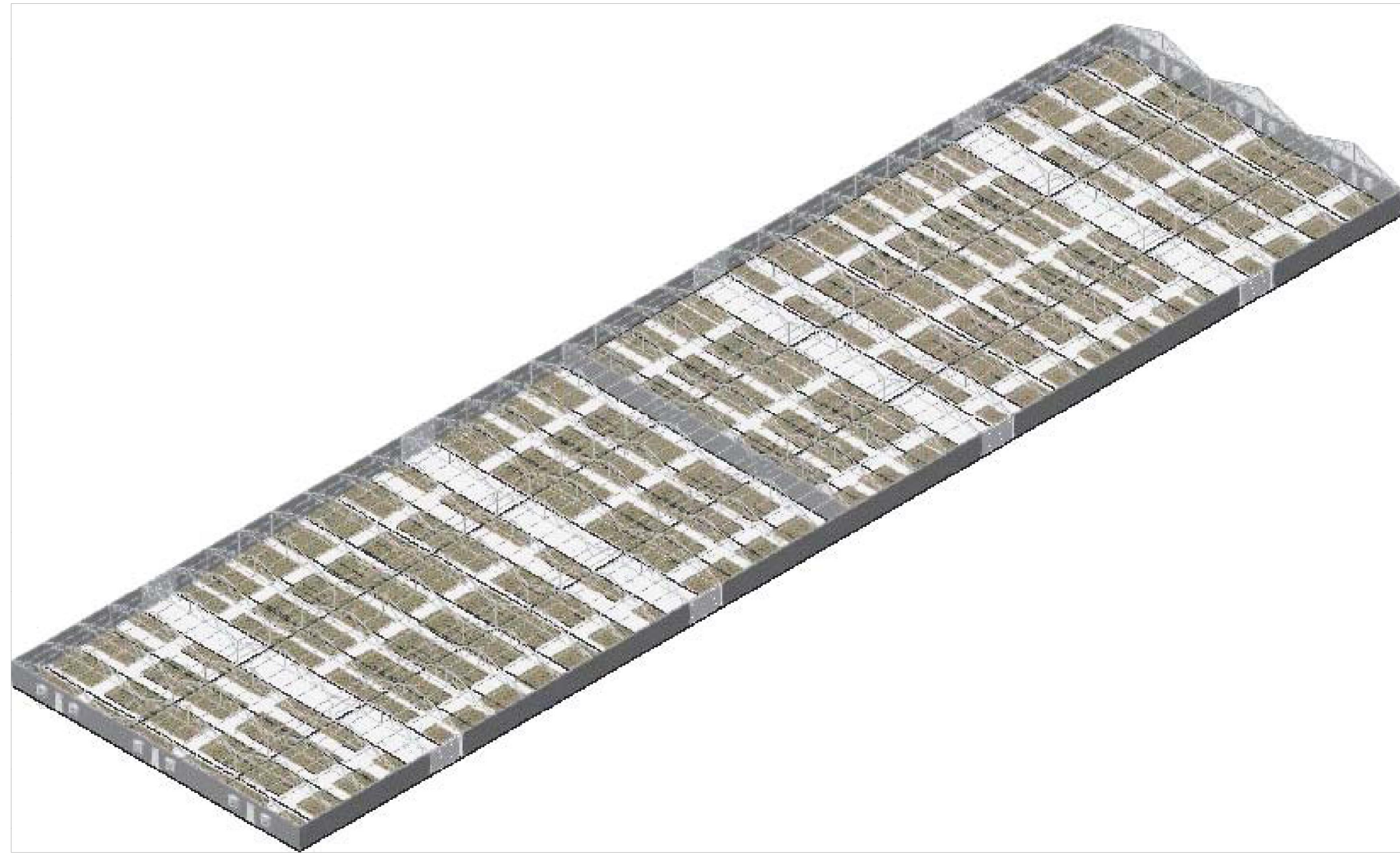
PROJECT:
6860 LOVR
6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405

PROJECT:

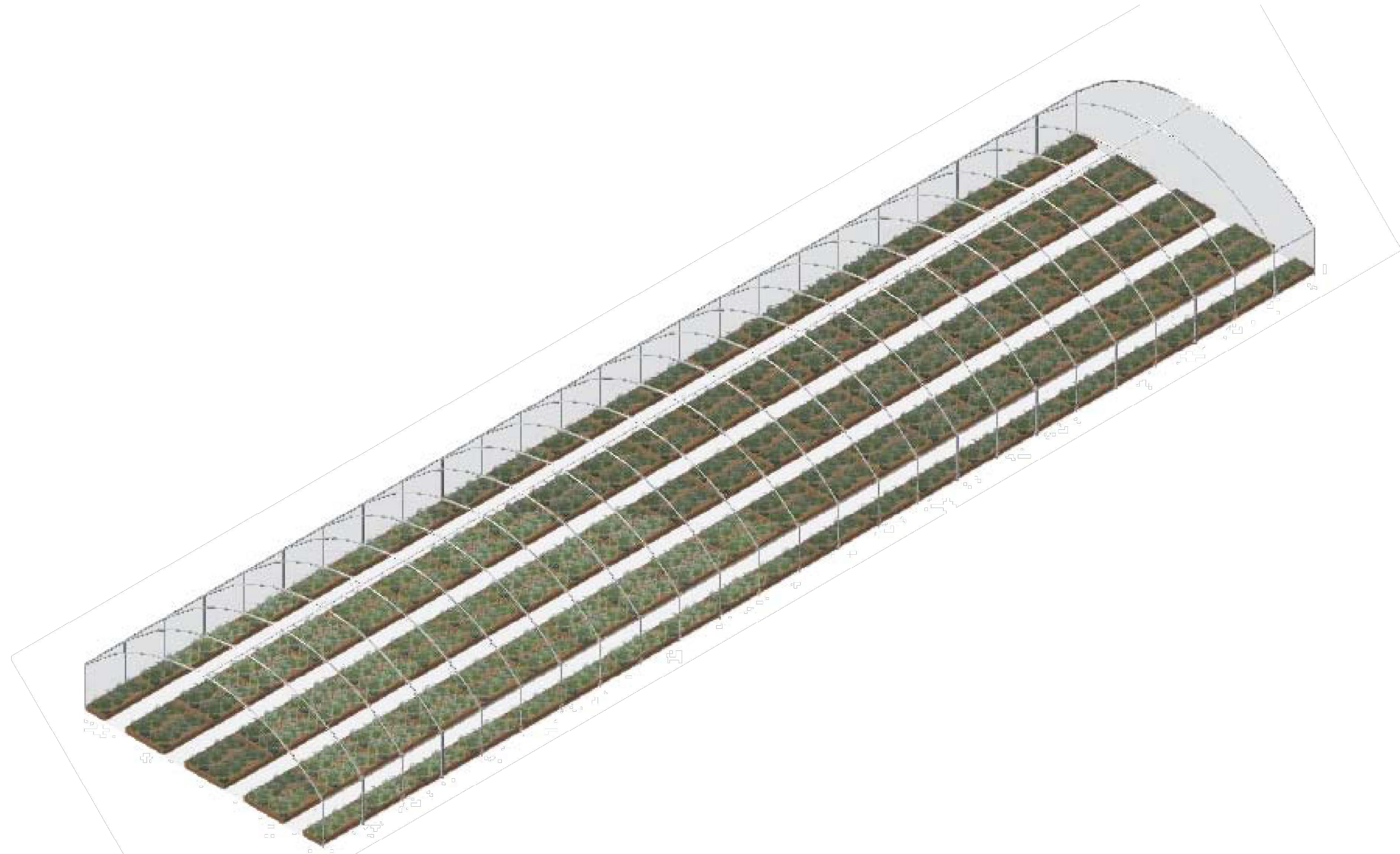
DRAWN BY: GA
DATE: 8/20/18

SHEET NUMBER:

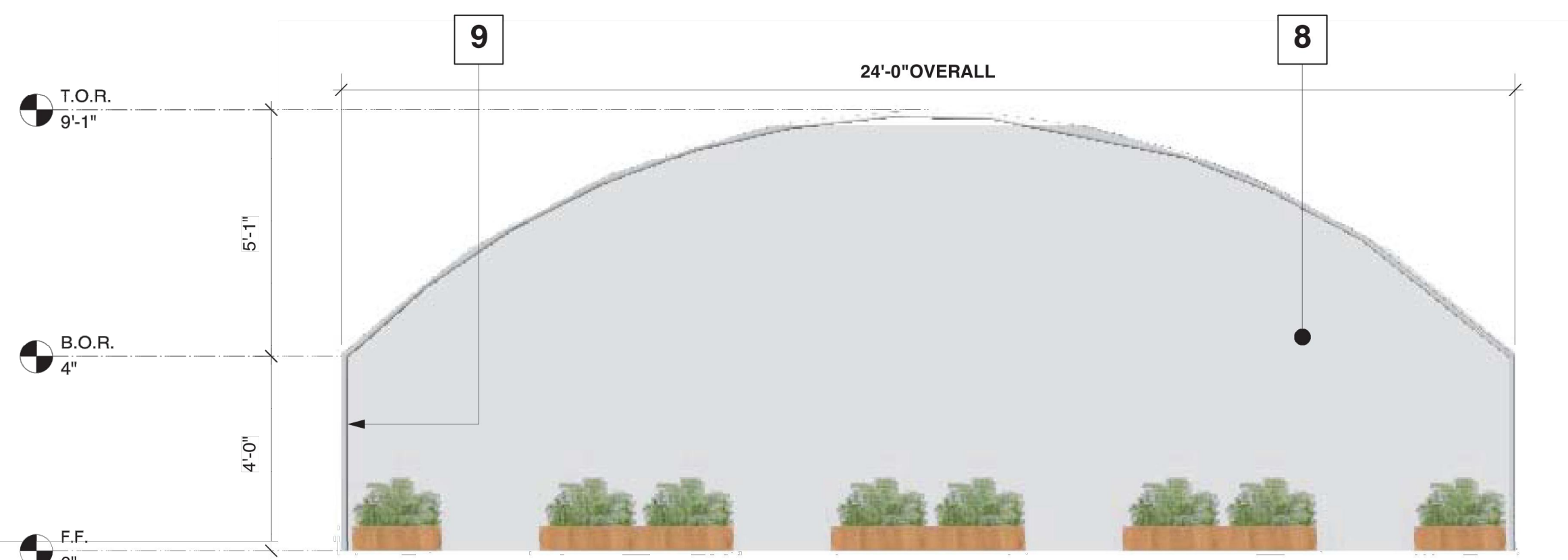
A-003



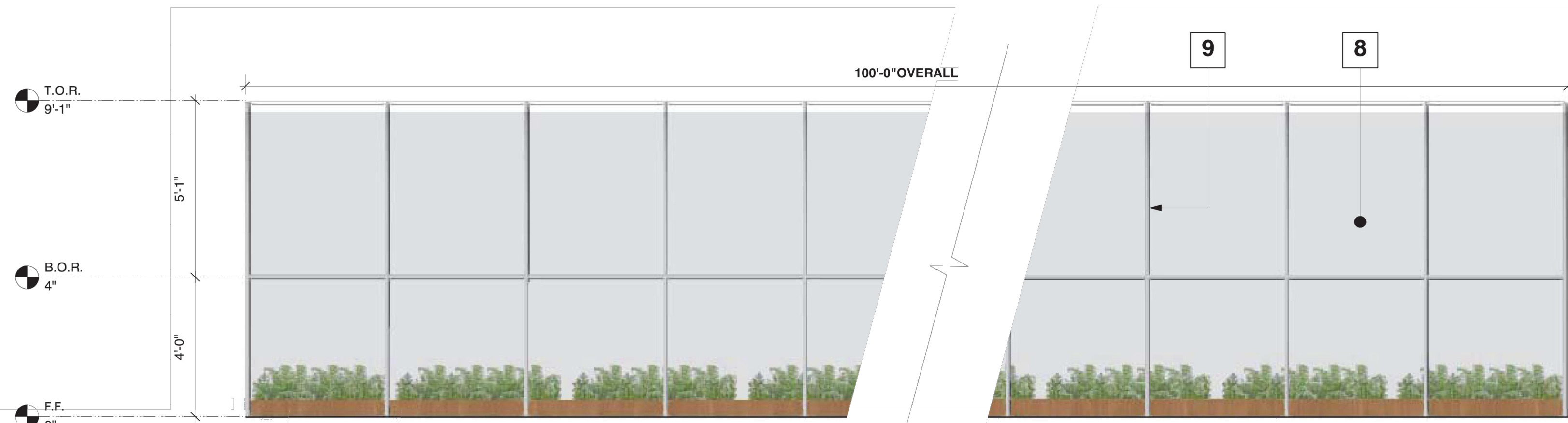
1 LOS OSOS SITE #2 INDOOR GROW
Scale: 1/32" = 1'-0"



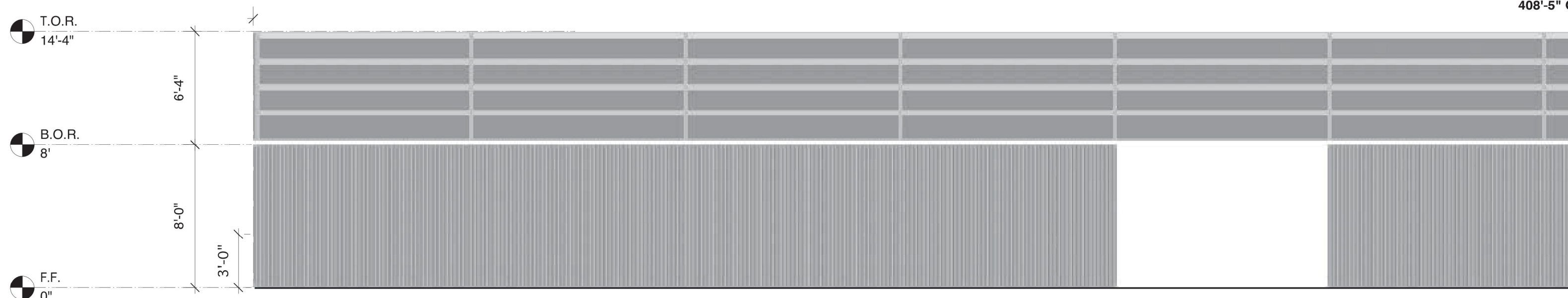
2 STANDARD HOOP HOUSE
Scale: 1/8" = 1'-0"



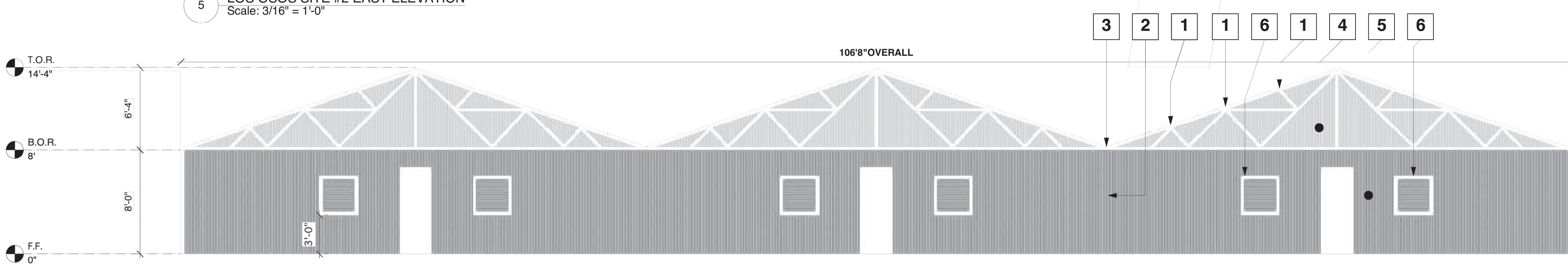
3 HOOP HOUSE SOUTH ELEVATION
Scale: 3/8" = 1'-0"



4 HOOP HOUSE EAST ELEVATION
Scale: 3/8" = 1'-0"



5 LOS OSOS SITE #2 EAST ELEVATION
Scale: 3/16" = 1'-0"



6 LOS OSOS SITE #2 SOUTH ELEVATION
Scale: 3/16" = 1'-0"

REFERENCE NOTES:

- 1 2" S.Q. STEEL PURLINS
- 2 3" S.Q. STEEL COLUMN
- 3 TENZALLOY COLUMN CAP
- 4 8MM CLEAR POLYCARBONATE TWINWALL
- 5 ALUMINUM WALL
- 6 INTAKE SHUTTERS
- 7 GARADGE DOOR
- 8 GREENHOUSE FILM
- 9 14-GUAGE 1.66" O.D. PIPE

CONSTRUCTION WASTE MANAGEMENT PLAN

CONSTRUCTION WASTE MANAGEMENT. RECYCLE AND/OR SALVAGE FOR REUSE A MINIMUM OF 65% OF THE NONHAZARDOUS CONSTRUCTION AND DEMOLITION WASTE IN ACCORDANCE WITH THE CALIFORNIA GREEN BUILDING STANDARDS CODE CHAPTER 4 DIVISION 4.4 PER 2016 CRC

CODE COMPLIANCE

CODES: ALL CONSTRUCTION SHALL CONFORM TO THE FOLLOWING CODES:
-2016 CALIFORNIA BUILDING CODE (CBC), BASED ON THE 2015 IBC
-2016 CALIFORNIA RESIDENTIAL CODE (CRC), BASED ON THE 2015 IRC
-2016 CALIFORNIA MECHANICAL CODE (CMC), BASED ON THE 2015 UMC
-2016 CALIFORNIA PLUMBING CODE (CPC), BASED ON THE 2015 UPC
-2016 CALIFORNIA ELECTRICAL CODE (CEC), BASED ON THE 2014 NEC
-2016 CALIFORNIA GREEN BUILDING STANDARDS CODE
-2016 CALIFORNIA ENERGY CODE
-2016 CALIFORNIA RESIDENTIAL ENERGY STANDARDS
-2016 CALIFORNIA GREEN BUILDING CODE (CGBG)
-2016 CALIFORNIA FIRE CODE (CFC), BASED ON THE 2015 IFC
-NFPA NATIONAL FIRE CODES
PROJECT CONDITIONS OF APPROVAL
-COUNTY OF SAN LUIS OBISPO STANDARD CONIDITIONS, AMENDMENTS AND SELECTED CODE REQUIREMENTS ON FILE AT THE COMMUNITY DEVELOPMENT DEPARTMENT, PLANNING AND BUILDING DIVISION
-ALL OTHER CODES AND ORDINANCES ADOPTED BY THE COUNTY OF SAN LUIS OBISPO AGENCIES HAVING JURISDICTION OVER THIS PROJECT

STATEMENT OF COMPLIANCE

THIS PROJECT HAS BEEN DESIGNED IN ACCORDANCE WITH AND MEETS THE COUNTY OF SAN LUIS OBISPO ADOPTED CODE AND ORDINANCE REQUIREMENTS INCLUDING, BUT NOT LIMITED TO THE CALIFORNIA STATE ACCESSIBILITY STANDARDS AND IWVE WILL BE RESPONSIBLE FOR ALL CLARIFICATIONS DEEMED NECESSARY DURING THE CONSTRUCTION PHASES.

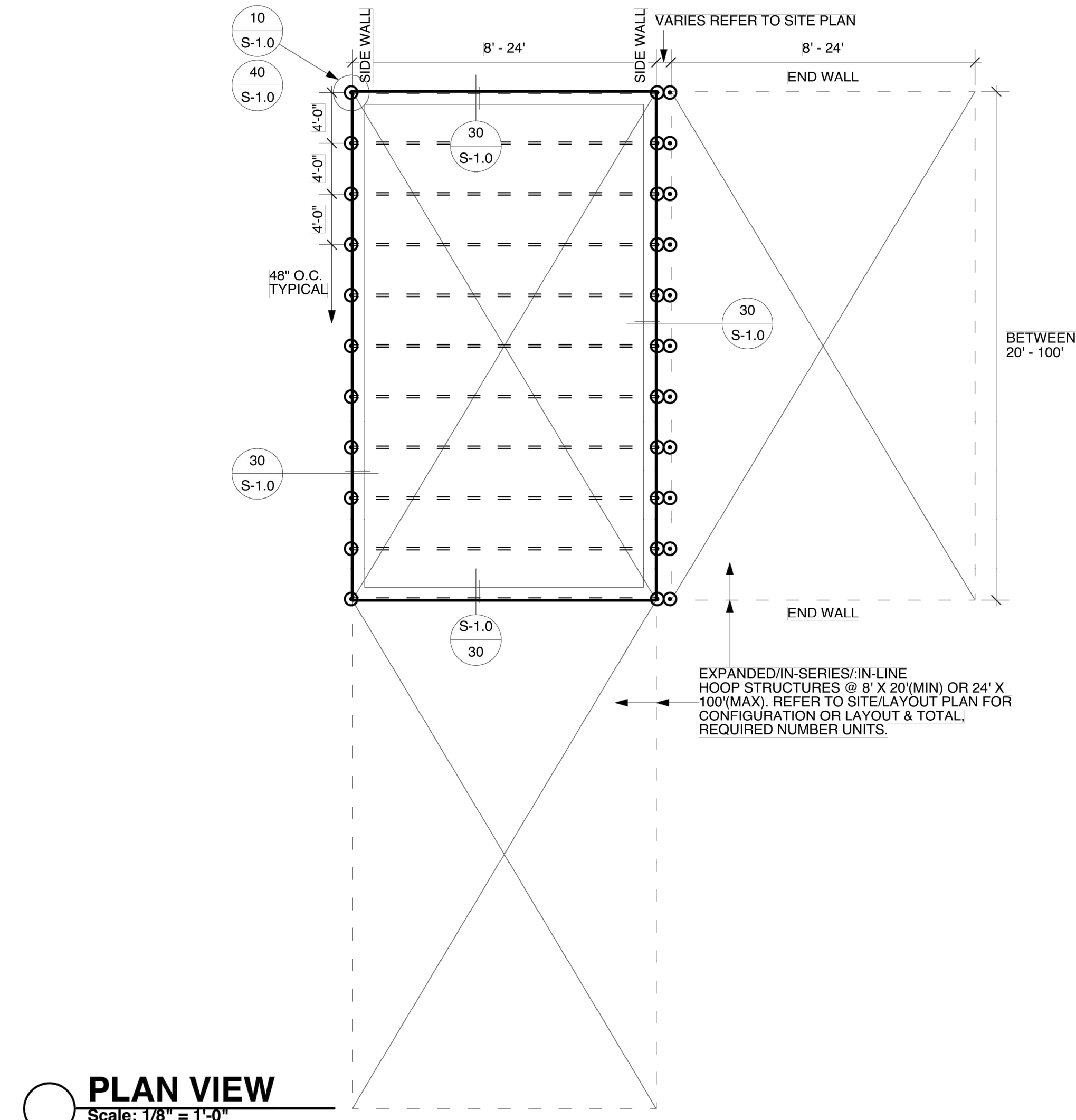
THIS PROJECT SHALL COMPLY WITH TITLE 24 AND 2016 CALIFORNIA BUILDING CODE (CBC), CALIFORNIA MECHANICAL CODE (CMC), CALIFORNIA PLUMBING CODE (CPC), CALIFORNIA ELECTRICAL CODE (CEC), AND CALIFORNIA ENERGY CODE (CENC).

EROSION AND SEDIMENT CONTROL BEST MANAGEMENT PRACTICES

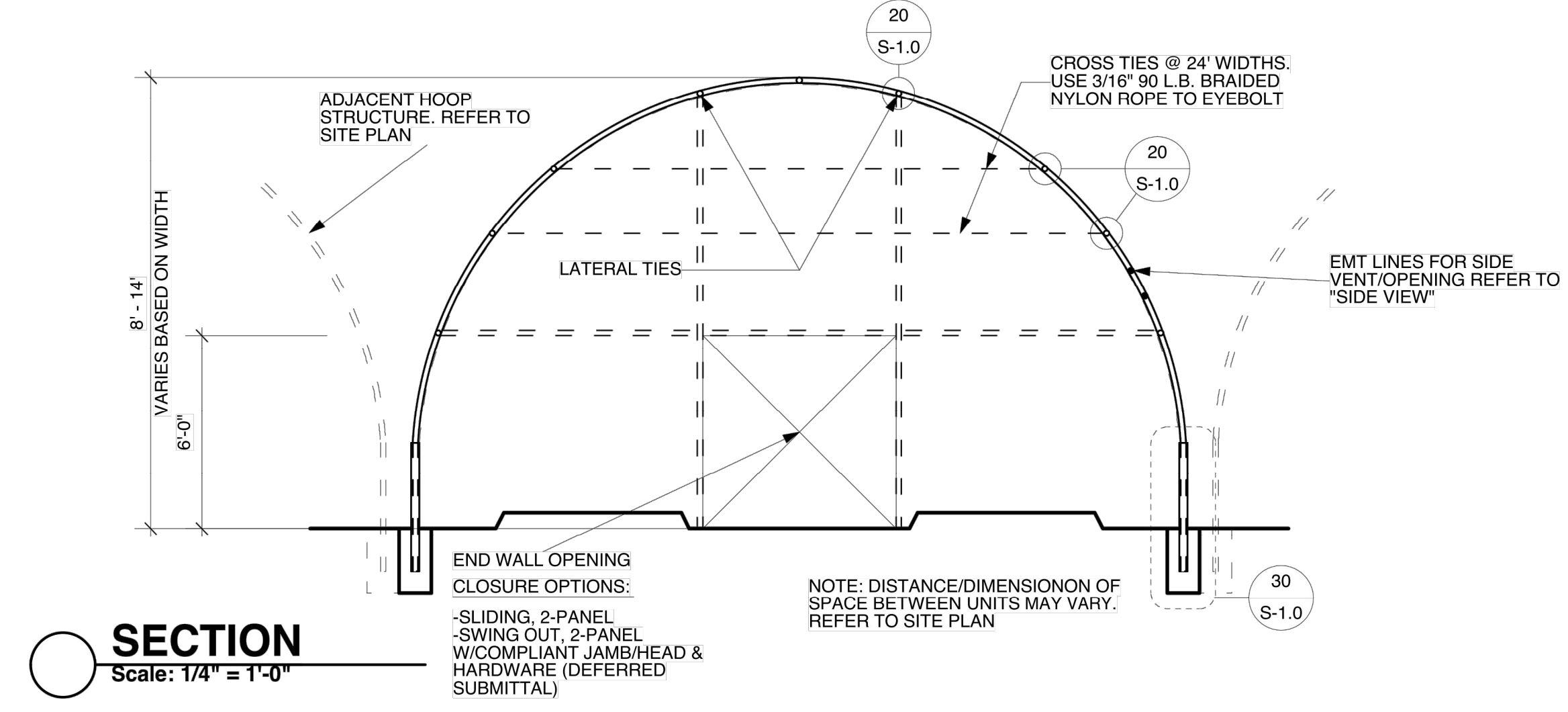
EROSION CONTROL MEASURES SHALL BE IMPLEMENTED AND MAINTAINED DURING ALL CONSTRUCTION AND GROUND DISTURBING ACTIVITIES PER THE COUNTY OF SAN LUIS OBISPO STANDARDS.

EROSION AND SEDIMENT CONTROL BEST MANAGEMENT PRACTICES MUST BE IN PLACE AND FUNCTIONAL PRIOR TO THE FIRST INSPECTION. NO INSPECTIONS CAN BE PERFORMED IF THEY ARE NOT IN PLACE OR HAVE FAILED TO PROVIDE EROSION CONTROL. FAILURE TO MAINTAIN EROSION CONTROL WILL CAUSE INSPECTIONS TO BE DELAYED UNTIL EROSION CONTROL MEASURES ARE FUNCTIONAL.

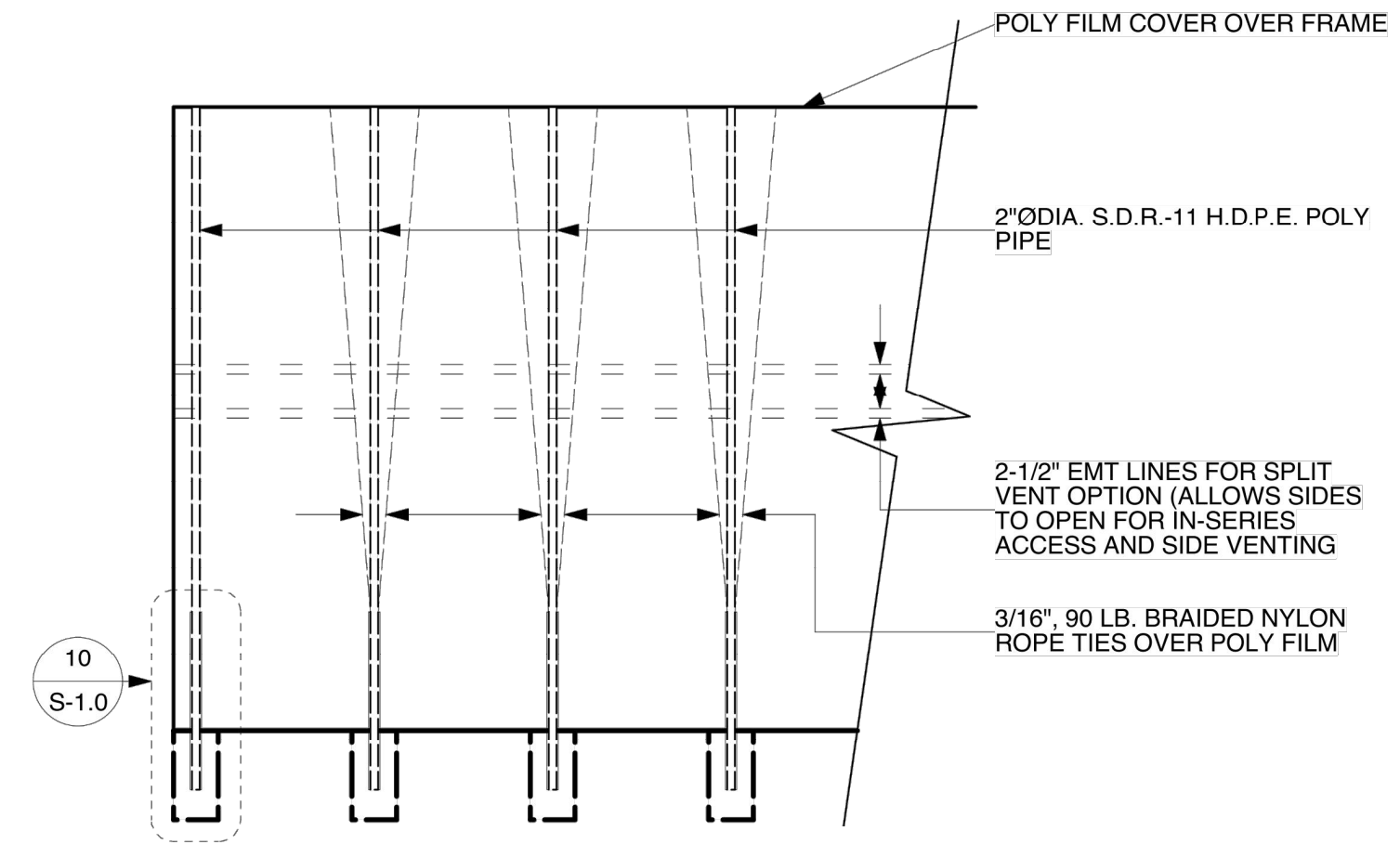
NOTE: SUBJECT TO CHANGE AS PROJECT CONSTRUCTION PROGRESSES AND GENERAL CONTRACTOR TAKES ON RESPONSIBILITY



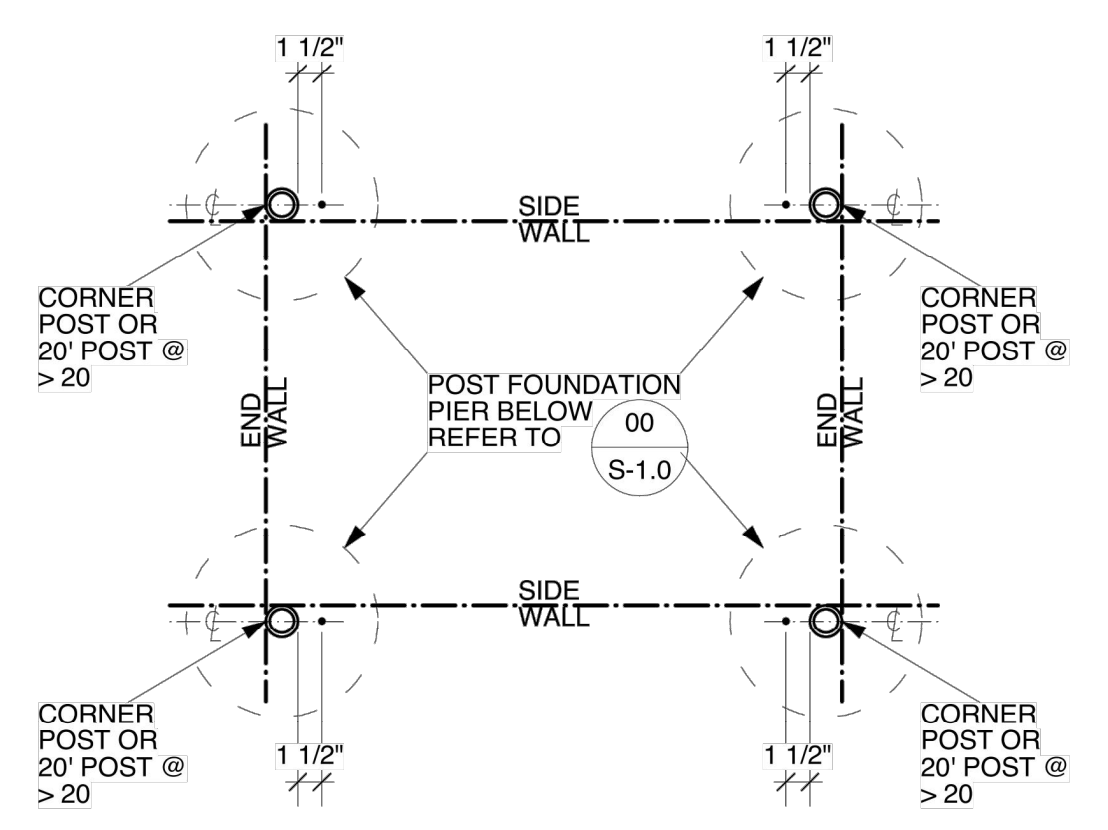
PLAN VIEW
Scale: 1/8" = 1'-0"



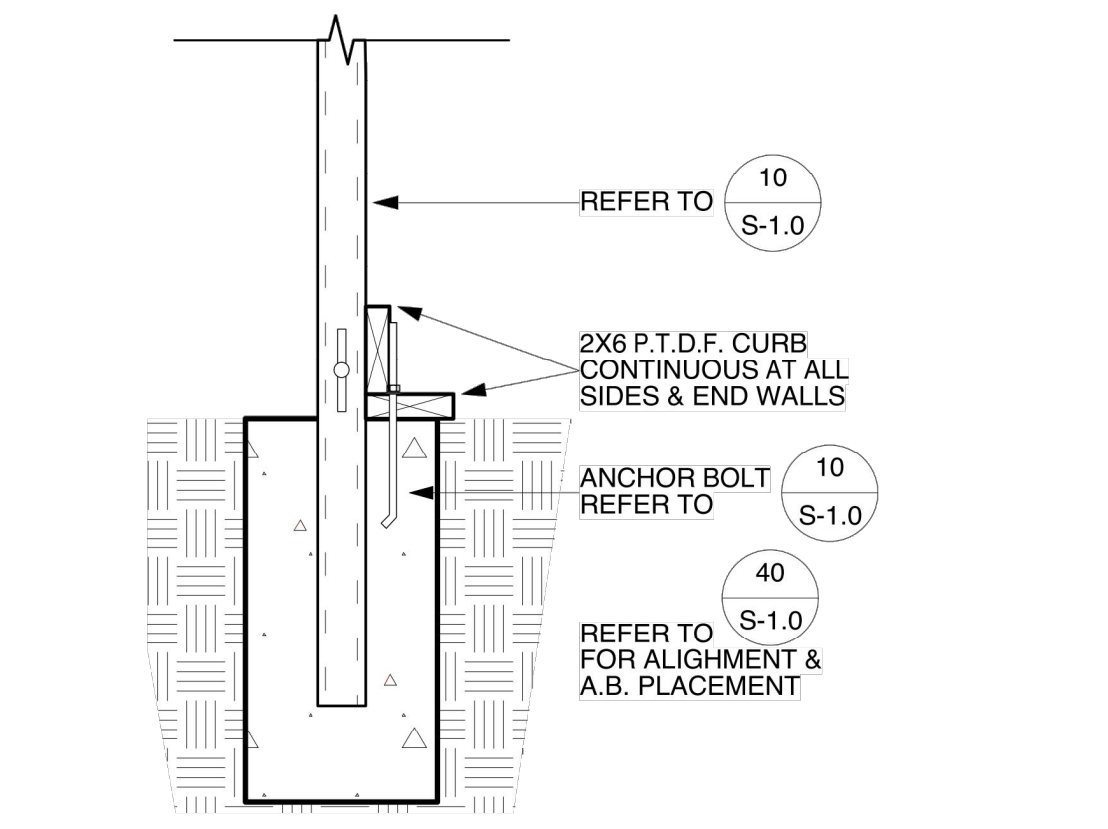
SECTION
Scale: 1/4" = 1'-0"



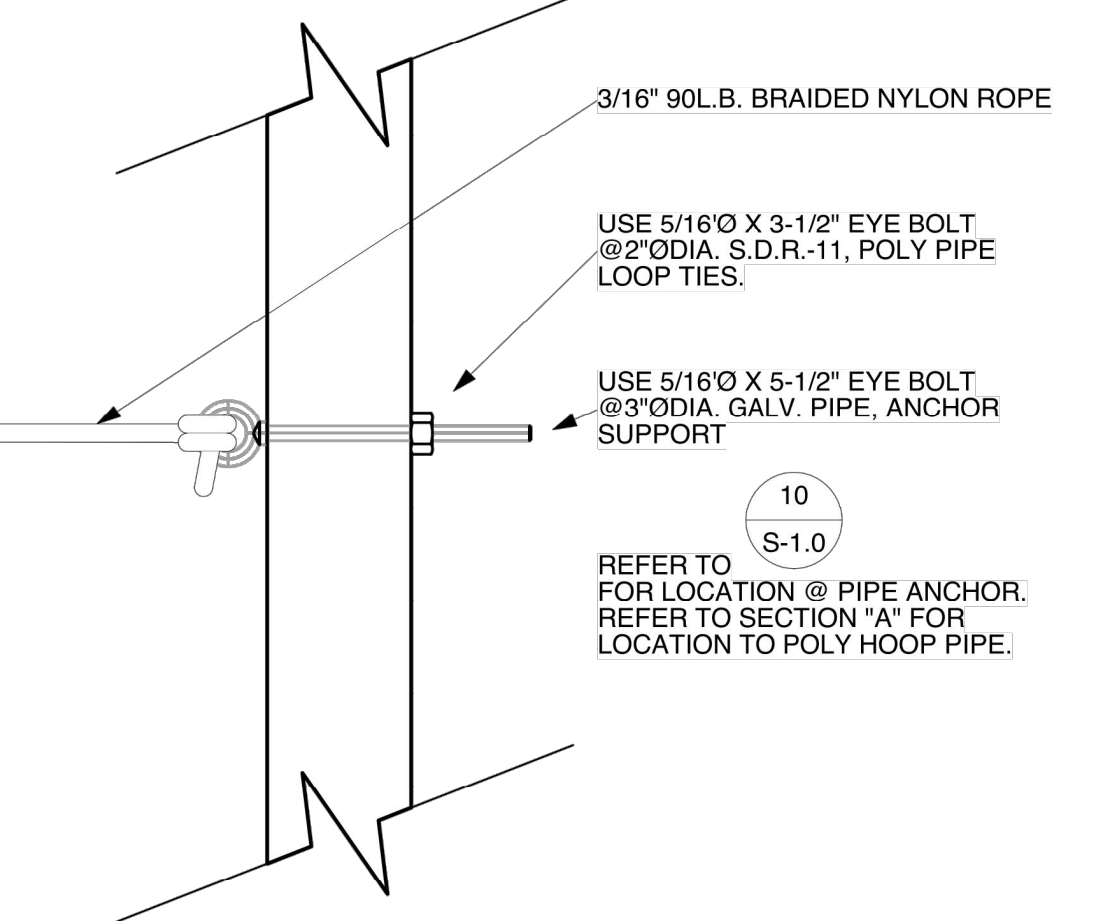
SIDE VIEW
1/4" 50



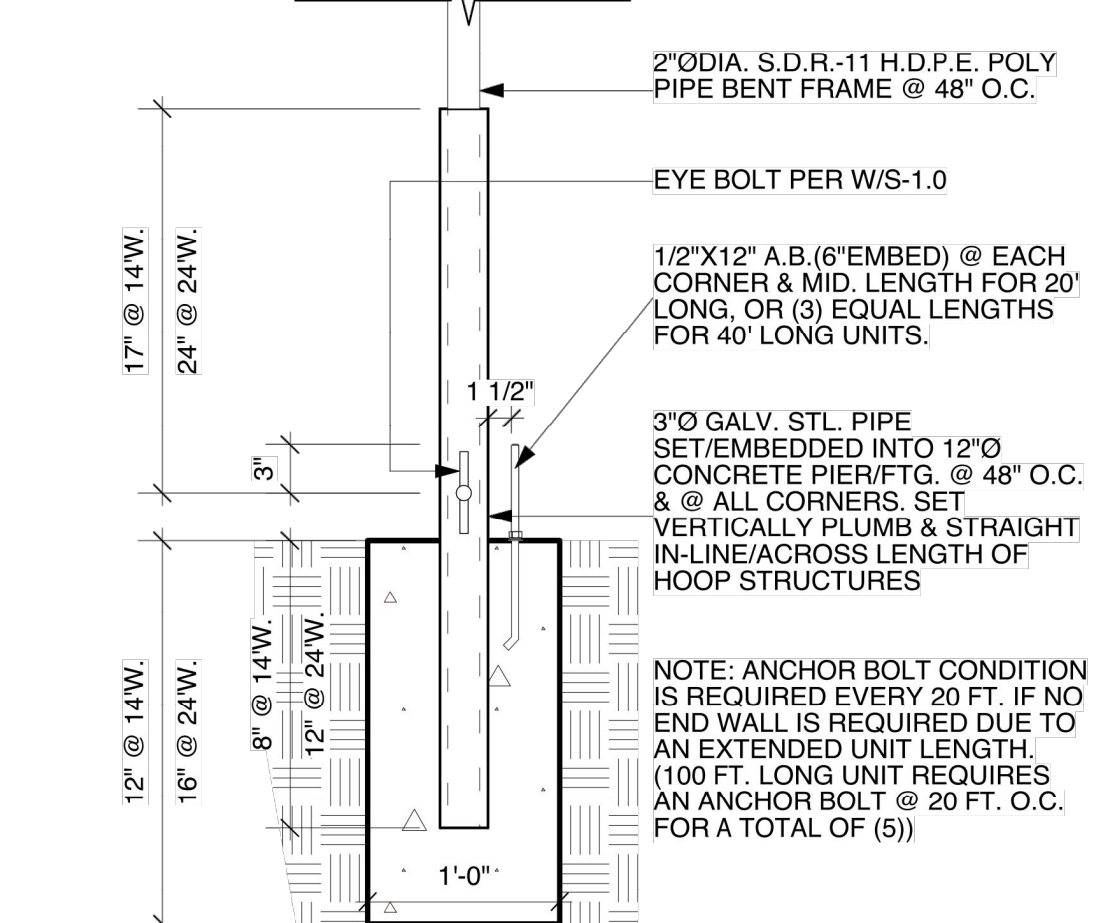
FOUNDATION PIERS
40



REDWOOD CURB
1" 30



EYE BOLT
20



FOOTING
1" 10

CONSTRUCTION WASTE MANAGEMENT. RECYCLE AND/OR SALVAGE FOR REUSE A MINIMUM OF 65% OF THE NONHAZARDOUS CONSTRUCTION AND DEMOLITION WASTE IN ACCORDANCE WITH THE CALIFORNIA GREEN BUILDING STANDARDS CODE CHAPTER 4 DIVISION 4.4 **PER 2016 CRC**

CODES: ALL CONSTRUCTION SHALL CONFORM TO THE FOLLOWING CODES:

- 2016 CALIFORNIA BUILDING CODE (**CBC**), BASED ON THE 2015 **IBC**
- 2016 CALIFORNIA RESIDENTIAL CODE (**CRC**), BASED ON THE 2015 **IRC**
- 2016 CALIFORNIA MECHANICAL CODE (**CMC**), BASED ON THE 2015 **UMC**
- 2016 CALIFORNIA PLUMBING CODE (**CPC**), BASED ON THE 2015 **UPC**
- 2016 CALIFORNIA ELECTRICAL CODE (**CEC**), BASED ON THE 2014 **NEC**
- 2016 CALIFORNIA GREEN BUILDING STANDARDS CODE
- 2016 CALIFORNIA ENERGY CODE (**CEC**)
- 2016 CALIFORNIA RESIDENTIAL ENERGY STANDARDS
- 2016 CALIFORNIA GREEN BUILDING CODE (**CGBC**)
- 2016 CALIFORNIA FIRE CODE (**CFC**), BASED ON THE 2015 **IFC**

AFRA NATIONAL FIRE CODE

PROJECT CONDITIONS OF APPROVAL

COUNTY OF SAN LUIS OBISPO STANDARD CONDITIONS, AMENDMENTS AND SELECTED CODE REQUIREMENTS ON FILE AT THE COMMUNITY DEVELOPMENT DEPARTMENT, P.O. BOX 2000, SAN LUIS OBISPO, CA 93901

ALL OTHER CODES AND ORDINANCES ADOPTED BY THE COUNTY OF SAN LUIS OBISPO AGENCIES HAVING JURISDICTION OVER THIS PROJECT

THIS PROJECT HAS BEEN DESIGNED IN ACCORDANCE WITH AND MEETS THE COUNTY OF SAN LUIS OBISPO ADOPTED CODE AND ORDINANCE REQUIREMENTS INCLUDING, BUT NOT LIMITED TO THE CALIFORNIA STATE ACCESSIBILITY STANDARDS AND I/WE WILL BE RESPONSIBLE FOR ALL CLARIFICATIONS DEEMED NECESSARY DURING THE CONSTRUCTION PHASES.

THIS PROJECT SHALL COMPLY WITH TITLE 24 AND 2016 CALIFORNIA BUILDING CODE (CBC), CALIFORNIA MECHANICAL CODE (CMC), CALIFORNIA PLUMBING CODE (CPC), CALIFORNIA ELECTRICAL CODE (CEC), AND CALIFORNIA ENERGY CODE (CEnC).

EROSION CONTROL MEASURES SHALL BE IMPLEMENTED AND MAINTAINED DURING ALL CONSTRUCTION AND GROUND DISTURBING ACTIVITIES PER THE COUNTY OF SAN LUIS OBISPO STANDARDS.

EROSION AND SEDIMENT CONTROL BEST MANAGEMENT PRACTICES MUST BE IN PLACE AND FUNCTIONAL PRIOR TO THE FIRST INSPECTION. NO INSPECTIONS CAN BE PERFORMED IF THEY ARE NOT IN PLACE OR HAVE FAILED TO PROVIDE EROSION CONTROL. FAILURE TO MAINTAIN EROSION CONTROL WILL CAUSE INSPECTIONS TO BE DELAYED UNTIL EROSION CONTROL MEASURES ARE FUNCTIONAL.

**NOTE: SUBJECT TO CHANGE AS PROJECT CONSTRUCTION PROGRESSES
AND GENERAL CONTRACTOR TAKES ON RESPONSIBILITY**



NOTE: REFER TO THE
SPECIFIC/DEVELOPED SITE PLAN FOR
COMPLETE CONFIGURATION & LAYOUT

CAST IRON COVER

THREADED CLEANOUT PLUG

CONCRETE (TYP.)

NOTE: C.D.T.G. @ EXTERIOR IS TO EXTEND VERTICAL 4" ABOVE F.G. W/C CAST IRON COVER

6" PVC PIPE

6" PVC PIPE

6" BEND

6" BRANCH

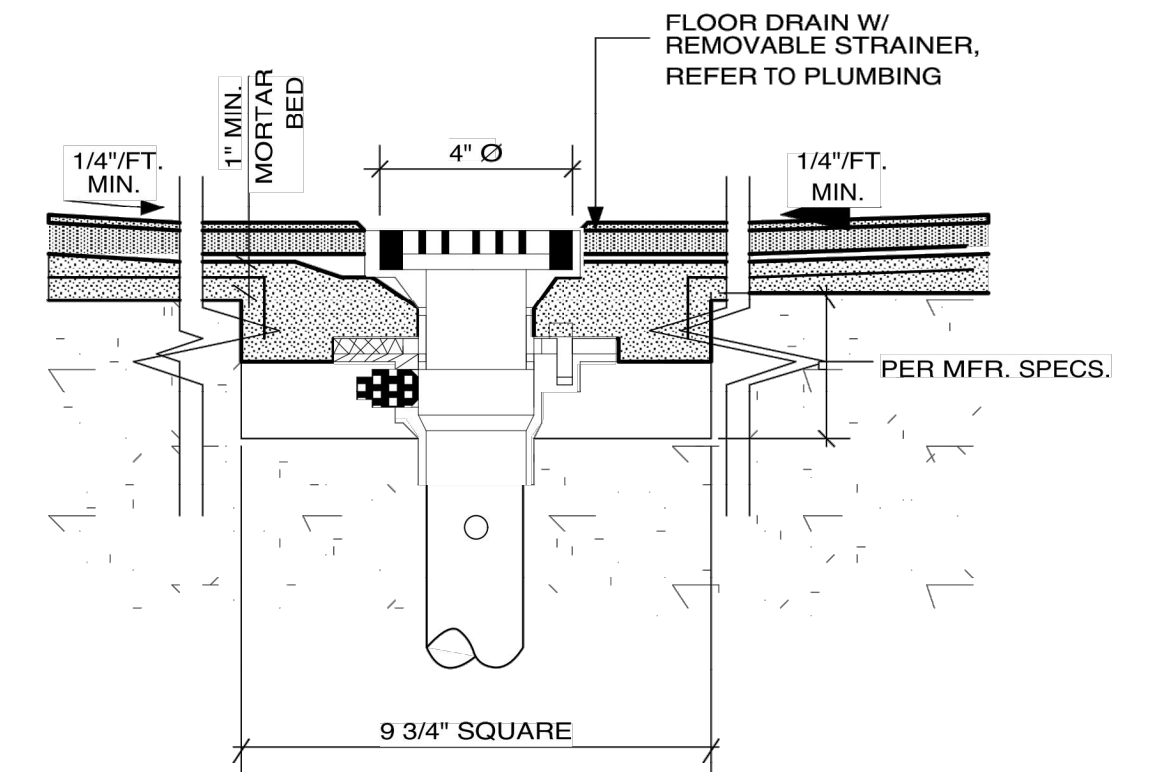
WYE FITTING

6" PVC PIPE

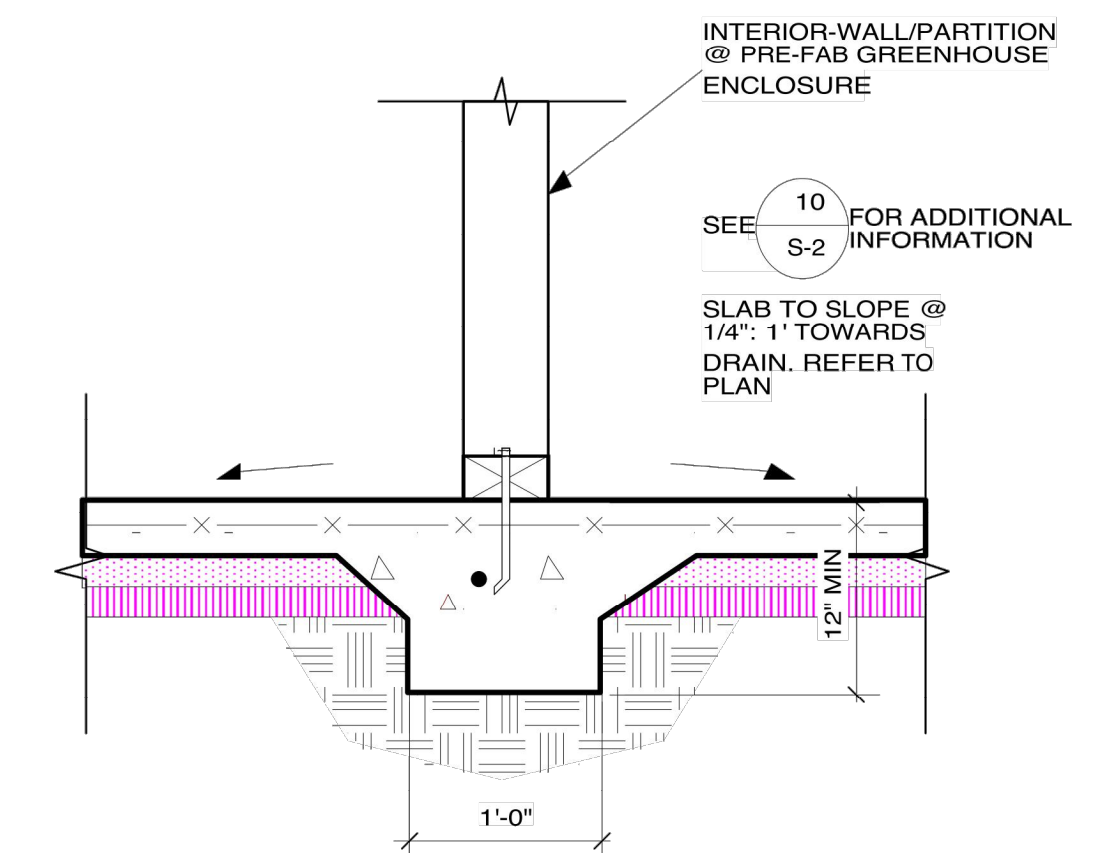
"WATERTIGHT" PLUG OR CAP UNTIL HOUSE CONNECTION IS COMPLETED

← FLOW

21

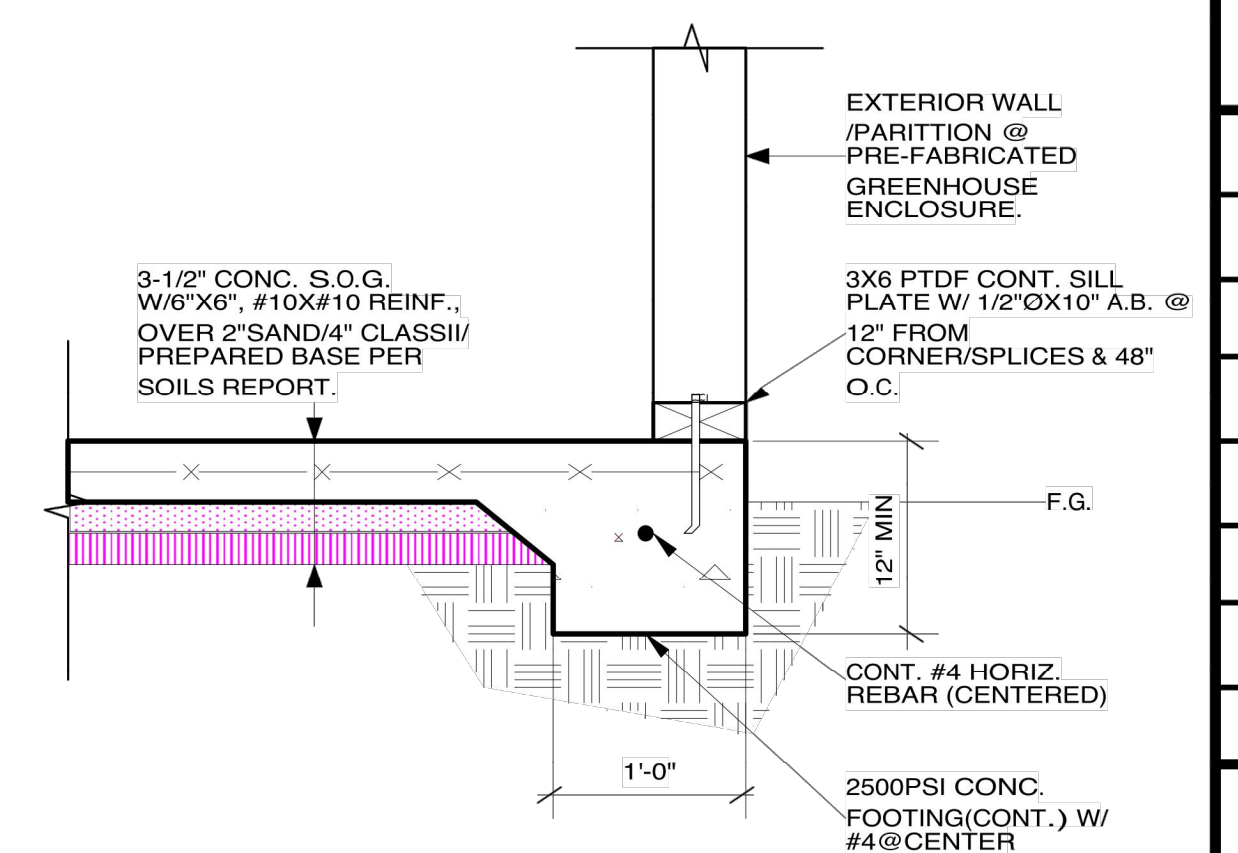


20



1"

11



1"

10

EQUIPMENT LEGEND

SYMBOL	DESCRIPTION
	EQUIPMENT & WALKWAY ACCESS

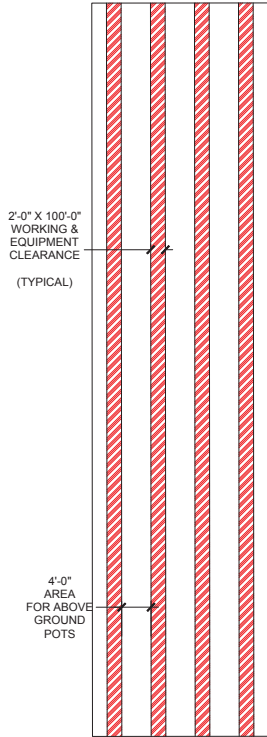
SQUARE FOOTAGE FOR FLOWERING:

HOOP HOUSE SIZE 100'X24'=2400 FT²
WALKING & EQUIP= 800 FT²
NET SQUARE FEET= 1600 FT² GROW AREA



HOOP HOUSE INTERIOR

SCALE: 1/8" = 1'-0"



NOTE: EMAIL CONFIRMATION FROM CDFA

From: CDFA CalCannabis Scientists@CDFA <cdfa.CalCannabis_Scientists@cdfa.ca.gov>
Sent: Thursday, July 5, 2018 1:59 PM
To: Lisa Bugrova
Subject: RE: Canopy Definitions

Hello Lisa,

Yes, it is appropriate to calculate the canopy based on the net space utilized for canopy within the hoops as long as each row has clearly identifiable boundaries. Please refer to the updated definition of canopy in section 8000 of the emergency regulations found here:
<https://static.cdfa.ca.gov/MCCP/document/060418%20CalCannabis%20Text%20of%20Proposed%20Emergency%20Regulations%20Readopt.pdf>.

TEXT OF EMERGENCY REGULATIONS - static.cdfa.ca.gov
static.cdfa.ca.gov

TEXT OF EMERGENCY REGULATIONS . Page 1 of 65 Changes are indicated by ~~strikeout~~ and underline.
CALIFORNIA CODE OF REGULATIONS . TITLE 3. FOOD AND AGRICULTURE

ELECTRICAL LOAD EXAMPLES OF 43,200 SQUARE FEET GREENHOUSE

43,200 sqft Greenhouse Electrical Load Estimate Spreadsheet v8

Facility-wide Electrical Load Estimates				
Lighting	Count	Voltage (V)	Current (A)	Power (kW)
HPS lights in the Flower Zone	600	277	3.77	626.6
	0			0.0
Cooling	Count	Voltage (V)	Current (A)	Power (kW)
54" 1-HP single speed 3 phase exhaust fans	40	460	1.7	31.3
24" 3/4-HP two speed exhaust fans	10	115	6.8	7.8
Evaporative pad wall pumps	4	115	11	5.1
Drive motor for roof vents in corridor (1/20 HP)	10	115	0.68	0.8
Drive motor for vent on evap pad wall	4	480	0.87	1.7
Shutters on upper gable wall	10	120	0.28	0.3
Vertical air flow fans for mixing	30	460	0.6	8.3
Fogco Odor Mitigation Pump, VFD 10.6 gal/min	1	480	12	5.8
Fogco Zone Valves	12	480	1	5.8
Heating	Count	Voltage (V)	Current (A)	Power (kW)
Unit heaters in the grow area, apx (Delta - T to supply)	0	0	0	0.0
Unit heaters in the Central Corridor, apx	2	120	2.1	0.5
Shade & Heat Curtain/ Light Dep Curtain	Count	Voltage (V)	Current (A)	Power (kW)
Drive motor for Shade Curtain	6	115	2.5	1.7
Drive motor for Backout Curtain	6	115	2.5	1.7
CO ₂ Generators	Count	Voltage (V)	Current (A)	Power (kW)
CO ₂ Burners	10	120	1.00	1.2
Maximum coincident load: the largest load you can expect at any time				
	(kW or KVA)			698
	(Amps)			2541
Total of equipment minus lighting	(kW or KVA)			72
	(Amps)			279

ACREAGE CALCULATIONS

APN: 067-061-056				
TYPE	USE	SIZE (SF)	QUANTITY	TOTAL GROSS SIZE
HOOP HOUSE	FLOWERING	100' x 24'	63	151,200
	WORKING CLEARANCE	100' x 8'	63	50,400
HOOP HOUSE	FLOWERING	100' x 24'	10	24,000
	WORKING CLEARANCE	100' x 8'	10	8,000
				TOTAL NET
				116,800
HOOP HOUSE	DRYING/CURING	100' x 24'	10	24,000
	WORKING CLEARANCE	100' x 8'	10	8,000
				TOTAL NET
				16,000
*HOOP HOUSE	VEGETATIVE	150' x 24'	10	36,000
	WORKING CLEARANCE	150' x 8'	10	12,000
				TOTAL NET
				24,000
*INDOOR GREENHOUSE (230' x 210')	FLOWERING	115' x 210'	1	24,150
	WORKING CLEARANCE	115' x 20'	1	2,300
				CANOPY
				21,850
	VEGETATIVE	115' x 210'	1	24,150
	WORKING CLEARANCE	115' x 20'	1	2,300
				TOTAL NET
				43,700
*INDOOR GREENHOUSE	VEGETATIVE	230' x 80'	1	18,400
	WORKING CLEARANCE	230' x 10'	1	2,300
				TOTAL NET
				16,100
*denotes existing				

PROJECT: 6860 LOVR

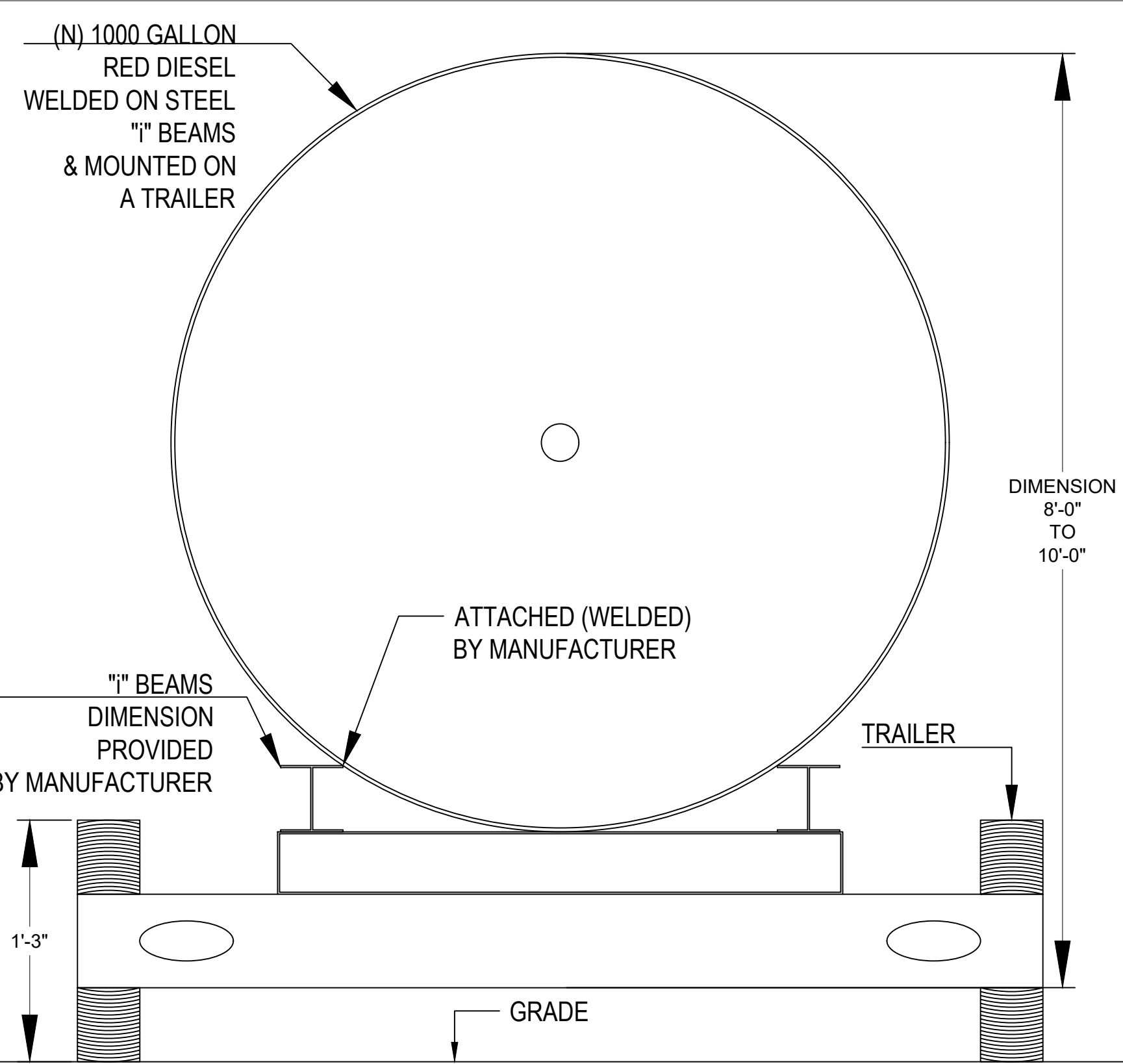
6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405

DRAWN BY: GA
DATE: 8/20/18

SHEET NUMBER: **FQ-101**

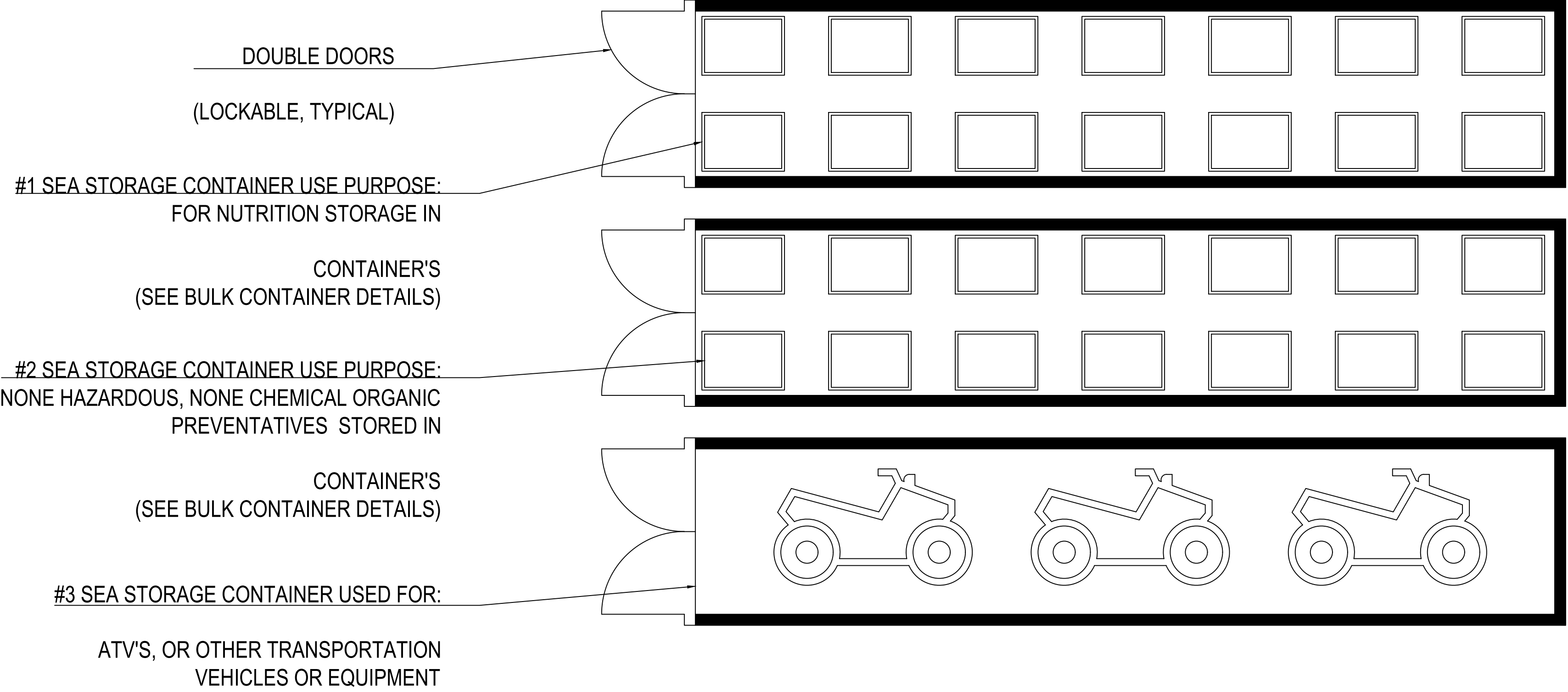
CONTAINER FLOOR PLANS

SCALE: 1 1/2" = 1'-0"



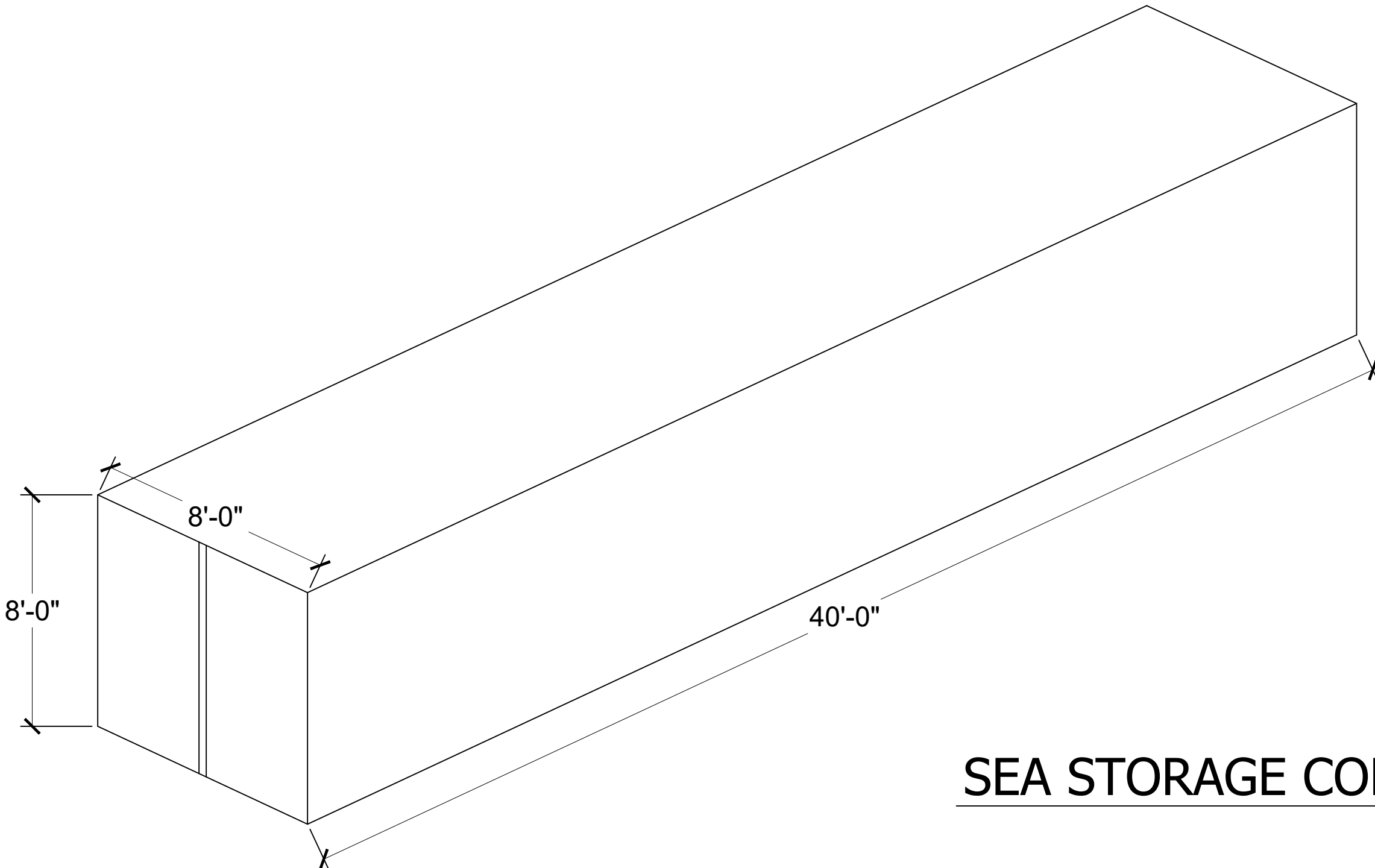
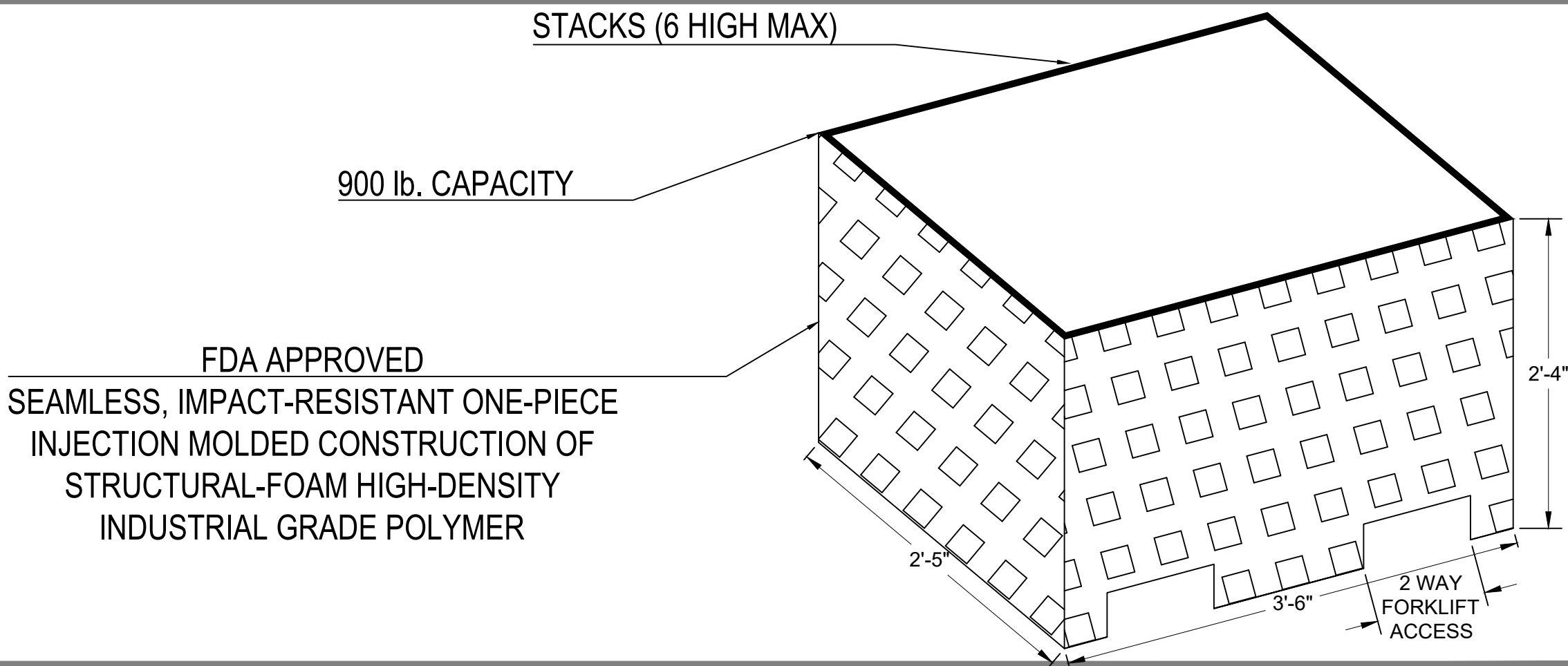
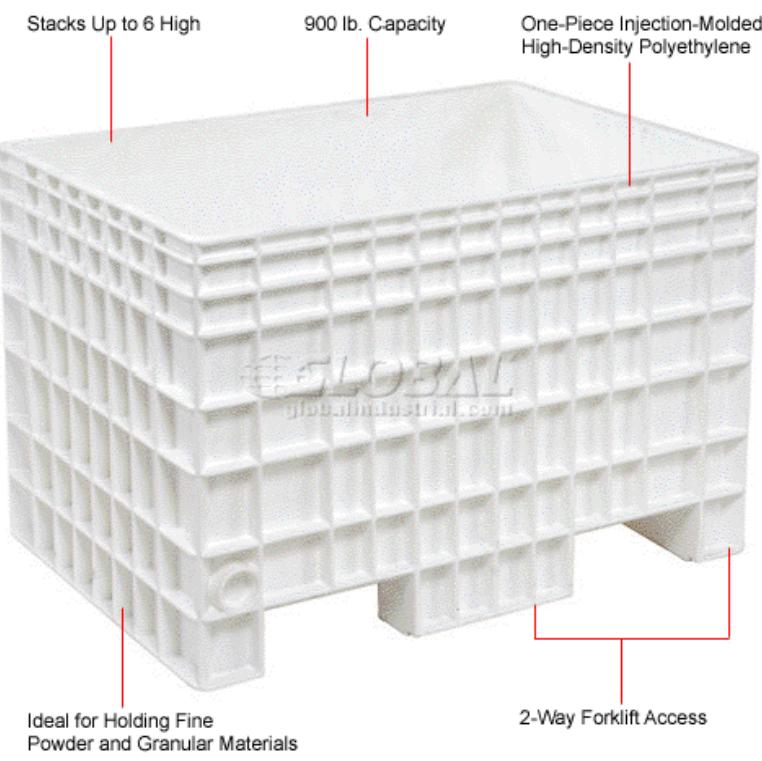
CONTAINER FLOOR PLANS

SCALE: 1/4" = 1'-0"



BULK CONTAINER DETAILS

SCALE: 1" = 1'-0"



SEA STORAGE CONTAINER DIMENSIONS

SCALE: 1/4" = 1'-0"

PROJECT: 6860 LOVR

6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405

PROJECT:

DRAWN BY: GA

DATE: 8/20/18

SHEET NUMBER:

FQ-102

DATASHEETS

Odor Control and Air Handling Systems

The proposed greenhouse ventilation and air treatment system will provide internal pressurized air conditioning, temperature control and extensive air filtration odor control. The primary system utilizes a dynamic, pellet-based media air-cleaning component installed on the air intake side. An atomized water mist evaporates and will release an odor neutralizing component into the air to eliminate odors. This works in conjunction with an activated carbon filtration system installed in the duct system on the air exhaust side of the system at an individual scale. Dynamic air cleaners are used due to their ability to remove harmful spores and bacteria, as well. This type system is best suited for the required odor removal, affect a high plant yield and quality, and lessen the overall maintenance of the system.

This dynamic, low static pressure air cleaner system offers efficient passive filters, which, in turn, are more energy efficient. The advantage is primarily due to the ability to eliminate the traditional large scale, pellet-based carbon systems and improve upon the resistance to airflow for lower energy consumption. Additionally, the ACM systems due not shed carbon dust therefore no additional filtration is required downstream to further restrict airflow. Most importantly, for agricultural operation, the ceramic carbon does not absorb moisture to lead prematurely in humid or wet conditions making it more efficient. This system has a number of other benefits: it reduces foreign contaminants, reduces costs from CO2 and energy, and avoids crop contamination.

Additionally, in conjunction to the dynamic system, smaller type units, or carbon filled wall exhaust/fan fans may also be used to complement the main system and to provide individual, or specific ventilation treatment and conditioning to any single green house that would require an elevated air flow or more extensive filtration without involving the entire greenhouse complex. During different levels of propagation, odor levels can fluctuate and be more intense than at other levels. Therefore, this applied method is both efficient and relative to crop development. These smaller type units utilize an absorbent carbon filter for odor removal and energy efficiency.

This system will be employed in all interior greenhouse cultivation areas. The system will be monitored for air-quality with a constant maintenance program to insure efficiency and air quality are kept at an acceptable and complete level of operation.

Dynamic
Activated Carbon Matrix



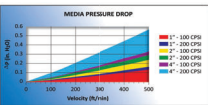
For precise control of gas phase contaminants without the energy penalty

Dynamic
Activated Carbon Matrix



Activated carbon filtration systems have been used for decades in critical applications for the removal of harmful odors and chemical gases. Carbon works through a process called adsorption – the deposition of a gas adsorb. Because of its molecular structure, carbon is an excellent natural adsorbent. For this reason, hospitals, museums, and clean manufacturing facilities all rely on the power of activated carbon to capture contaminants.

Scalable Versatility™ Technology
Versacomb carbon matrix material was developed using advanced composites and extrusion technologies to increase carbon utilization. The patented, revolutionized design utilizes an activated carbon/ceramic honeycomb matrix that features unrestrictive air channels to provide a pathway for air to flow with low resistance. Because the carbon and ceramic are sealed for long periods at extremely high temperatures, they are tightly bonded together, eliminating dust shedding and the need for down-stream filters. Today, Dynamic Carbon Matrix is a perfect solution for a wide range of applications. Dynamic Carbon Matrix systems require less space, operate with a very low pressure drop and require no post filters, enabling Dynamic Carbon Matrix to be used today in a variety of applications where carbon filtration was previously not an option.



Dynamic Carbon Matrix can be used in:

- Specialty Applications: such as museums, hospitals, labs, manufacturing, embassies.
- Problem Applications: to address issues such as environmental of kitchen fumes or engine exhaust fumes.
- General Applications: clearing the air of gas phase contaminants in commercial buildings or for reduced outdoor air applications.
- Industrial Applications: including pulp and paper, petrochemical plants and refineries, as well as municipal and private wastewater treatment plants.

Dynamic
Activated Carbon Matrix

Outstanding Performance:
Carbon effectiveness and longevity are functions of weight and contact time. More weight means more capacity for odor removal and a longer service life. Our gram of activated carbon has 12,000 square feet of internal surface area. One pound of activated carbon has a surface area equal to about 125 acres. Based on the contaminants of concern and their concentration levels, the media life for Dynamic Carbon Matrix is predictable. In addition, the media can be engineered on a job-by-job basis to meet specific performance requirements such as static pressure drop, maximum face velocity and residence time. Common target contaminants include Hydrogen Sulfide, Chlorine, Sulfur Dioxide, Chlorine Dioxide and other acid gases and odors.

Physical Properties

- Density – 26.6 lb/ft³
- Crush Strength – 300 psi minimum
- Dust-free under normal operation

Removal Capacity

- Hydrogen Sulfide – 40% by weight
- Sulfur Dioxide – 15% by weight
- Xylene – 13% by weight
- Toluene – 9% by weight



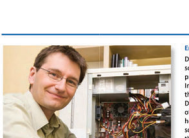
Dynamic Carbon Matrix is available in various types of carbon material for different applications:

Gasess Controled	Untreated	At Menstrual	Untreated	At Menstrual
Animal Odors	Hydrogen Sulfide	Cooking Odors	Chlorine Dioxide	Ammonia
Vehicle Exhaust	Sulfur Dioxide	Food Odors	Hydrogen Sulfide	Hydrogen Sulfide
Odors	Chlorine	Dead Fumes	Sulfur Dioxide	Ammonia
Hydrocarbons	Vehicle Exhaust	Chlorine	Chlorine Sulfide	Ammonia
Tobacco Odor	Sulfur	Odors	Sulfur	Ammonia
	Ylene	Chlorine	Sulfur	Ammonia
	Toluene	Hydrocarbons	Sulfur	Ammonia
	Mercaptans	Tobacco Odor	Ylene	Ammonia

Dynamic
Activated Carbon Matrix

Dynamic Carbon Matrix systems offer many advantages over pellet based systems. The most widely used commercial carbon filtration systems consist of 1"-2" deep trays filled with carbon pellets. Large arrays are typically used and air handling systems require powerful fans to overcome very high resistance to airflow. And because carbon pellet systems can shed carbon dust, downstream filters become necessary which can further restrict airflow.

Extended life pellets were introduced in the marketplace over a decade ago, and are formulated to maintain their shape and integrity for a period of four years of operation. Over time, pellets are subject to gradual and seasonal swings in temperature and humidity, as well as constant vibrations. Granular material will eventually flake screen material and lead to chattering in the media, which can allow untreated, contaminant laden air to enter the protected space.



Dynamic Carbon Matrix systems can be retrofitted into existing pellet cassettes (V-banks) and HVAC units and provide significant advantages including:

- Dynamic Carbon Matrix systems have up to a 60% lower pressure drop, reducing blower horsepower by up to 50% compared to pellet systems.
- Half the size and a fraction of the weight of a pellet based system.
- Easier to use and maintain because they do not require vacuum trucks, pellet handling or confined space entry that is associated with media change out.
- Dynamic Carbon Matrix systems have significantly smaller footprints and much lower weights, making installation easier and less costly than traditional pellet systems.
- Fast and effective contact at velocities up to six times greater than traditional pelletized carbon beds.
- Unlike pellet based systems which typically break through after about 60% utilization of the pellet media, properly retained Dynamic Carbon Matrix systems use 100% of the media as the media modules are replaced over time.

Engineered Solutions
Dynamic Carbon Matrix systems can provide a purified air cleaning solution to prevent corrosion of valuable electronic equipment in process industries – helping reduce downtime and costly repairs. In addition, Dynamic Carbon Matrix removes odors and protects the environment from subsequent destruction of olefin solvents. Dynamic Air Quality Solutions will provide a comprehensive solution of equipment, activated carbons, service and technical know-how, backed by state-of-the-art research capabilities, our team of scientists and engineers understands the unique chemistry between the air we breathe and its effects on your environment.

Dynamic Air Quality Solutions
P.O. Box 1258
Princeton, New Jersey 08542
(800) 578-7871, (609) 524-8324 fax
www.DynamicAQCS.com

Dynamic
Air Quality Solutions

DYN-236 (3/16)

PROJECT:

DRAWN BY: GA

DATE: 8/20/18

SHEET NUMBER:

Z-101

6860 LOVR

6860 LOS OSOS VALLEY RD
SAN LUIS OBISPO, CA 93405