Apps# 11929

(Updated) CMMLUO SITE/OPERATIONS OVERVIEW



APN: 212-311-002

Project Description: The applicant is seeking Humboldt County Planning Division approval to allow continued outdoor cannabis cultivation up to 9,975 ft² and development of a 1,470 ft² propagation nursery on the subject parcel. Cultivation is proposed to occur within three (3) greenhouses. Pre-2016 cultivation was not readily visible in typical air imagery however, an investigative archaeological report included with this submission indicates that the pre-2016 cultivation (in a single year) exceeded the cultivation square footage requested.

The applicant acknowledges that the commercial cannabis activity approval being sought is subject to compliance with all other applicable Humboldt County zoning and land use regulations, as well as other applicable provisions of the Humboldt County Code and applicable state laws. Determination of compliance will require multi-agency review of proposed activity/development described in the aforementioned special permit and, may also require site inspections by personnel from various governmental agencies.

If development and/or activities on the subject parcel are determined, for some reason, to be out of compliance with any applicable State or County code, regulation or policy, a compliance agreement can be formulated between the applicant and relevant agency or agencies, which includes a compliance timeline whereby operations may continue under a "Provisional Clearance or Permit" and corrective action is initiated to achieve compliance under agreed upon terms.

Parcel Information: The subject parcel (212-311-002) is approximately 13.34 acres and is split-zoned with AE and TPZ. Proposed cultivation is within the AE zoned portion of the parcel.

Topography/Landscape: The parcel is situated on a southerly hillside partially covered with native tree species and open grasslands. The northern portion of the parcel (where cultivation is proposed) is gently sloped.

Surface Water Features: A class III watercourse flows through the SE corner of the parcel and another class III watercourse is located at the most NW corner of the parcel. All proposed cultivation is greater than 140 feet from either cultivation area.

Roads/Stream Crossings/Easements: The subject parcel gains access from a short (0.4 mile) private driveway emerging east off of Avenue of the Giants. There are no stream crossings on the subject parcel. Interior road conditions were assessed in the development of a site-specific Water Resources Protection Plan (WRPP) completed by Timberland Resource Consultants. A copy of the WRPP is included with this submission. Where necessary, the WRPP prescribes corrective measures to specific road deficiencies identified and sets a time frame in which to complete work. Work prescribed within a WRPP does not preclude the need to comply with other state and county road requirements applicable to the aforementioned permit application. Also, ongoing seasonal monitoring of roads and stream and the effectiveness of corrective measures implemented will take place as required under RWQCB order No. R1-2015-0023.

Utilities: Electrical power is supplied from PG&E; a water well supplies domestic and agricultural water. The residence is served by a conventional septic system and domestic propane.

Water Supply: Agricultural water is sourced from a drilled well (well completion report included).

Documentation which demonstrates and defines the legal authorization, terms and conditions for the ongoing use of the existing water source(s) and/or development of other potential water sources (applicable to activity/development proposed under the aforementioned permit application) shall be provided upon availability.

Water Storage: Currently 3,000 gallons via hard plastic storage tank.

Cultivation Area(s): Relocation to Environmentally Superior Location

Decommissioning of pre-2016 *guerrilla* cultivation (as described in the attached Archaeological Report) located in the TPZ zoned portion of the parcel for relocation into the AE zoned portion of the parcel. The resultant area of relocated cultivation will be **9,900 ft**².

The relocation of legacy *guerrilla* cultivation scattered about the hillside (within TPZ zone) to a gently sloped AE zoned area is an **environmentally superior** cultivation option for this particular parcel.

The **9,900** ft² cultivation area(s) proposed will be contained within three (3) greenhouses on improved flats allowing for efficient implementation of BMP's and site monitoring required under R1-2015-0023.

The use of rough-cut trails to attend individual plants (*guerrilla cultivation*) can cease in favor of relocation to the AE zoned area described above; thus reducing erosion/sediment transport into surface waters and adverse impacts to native plant/animal species.

Cultivation relocation will allow for the removal and proper disposal of cultivation waste materials - which will prevent unwanted materials from being transported by animals/weather to sensitive locations or impacting habitat.

The use of fertilizers and petroleum products associated with cannabis cultivation limited to a consolidated location reduces the risk of spillage and/or unwanted discharge from needlessly transporting to remote areas.

Relocation of *guerrilla* cultivation to an area more conducive to recognized agricultural practices prevents ongoing habitat fragmentation and reduces the total disturbance footprint from *guerrilla* cultivation activity.

Considering the AE zoning available on the subject parcel along with the aforementioned factors the continuance of *guerrilla* cultivation as described in the attached archaeological report is not warranted.

All materials related to prior *guerrilla* cultivation shall be removed and disposed of at Redway Transfer Station. None of the *guerrilla* cultivation areas were located within riparian buffer zones; there was no grading or tree/vegetation removal associated with the cultivation (as it was the cultivators' intent to utilize natural conditions as a means of camouflage).

Once all materials have been removed and properly disposed of the areas will remain undisturbed allowing native grass/vegetation to continue to repopulate the spots where bags and pots were once located.

Recent field observations by Timberland Resource Consultants staff found that the decommissioned area(s) posed no threat to water quality and required no additional measures other than those specifies above.

Proposed and pre-existing cultivation areas and surrounding ground surfaces were evaluated in the development of a site-specific Water Resources Protection Plan (WRPP) prepared by Timberland Resource Consultants. Where necessary, the WRPP prescribes corrective measures to address conditions which may adversely impact water resources and establishes a timeline in which to achieve compliance with RWQCB Order No. R1-2015-0023. Corrective measures prescribed in the WRPP do not preclude the need for Cultivation Areas or other manmade features to be brought into compliance with all applicable state and local grading, excavation and erosion/sediment control requirements.

Peak Water Demand: The peak monthly water demand anticipated to maintain cultivation during the warmest summer months is 24,000gallons/month. The "Monthly Water Use" table below shows water use at different growth stages during the grow season. Water usage will be monitored and recorded by use of in-line totalizing flow meters in accordance with applicable regulations.

	Plant Stage	Gallons
March	seedling	7,000
April	veg	13,000
May	veg	15,000
June	veg	17,000
July	Veg/flower	21,000
August	veg	24,000
September	Veg/flower	20,000
October	flower	15,000

Irrigation Method(s): Irrigation is accomplished by top-feed hand watering which allows operators to carefully monitor water/fertilizer application rates. Mulch is carefully placed as a top dressing to optimize soil water retention.

Irrigation Runoff/Erosion control: Irrigation runoff from the cultivation area(s) is minimized by carefully monitoring liquid application rates to individual plants which in turn - prevents any overwatering or residual discharge of nutrient solutions outside of the "targeted" root zone. In the unlikely event that residual discharge did occur, it would be absorbed upon contact with permeable soil surrounding the cultivation area. Cultivation activities are limited to the immediate cultivation area and conducted so materials are kept confined. The ground surface within and around the cultivation area is formed, managed and monitored year-round to prevent any movement of entrained constituents such as fine sediment, fertilizer or other organic particles beyond the cultivation area.

Watershed Protection: Watershed Protection is accomplished through implementation of BMP's and corrective measures prescribed in a site-specific Water Resources Protection Plan developed by Timberland Resource Consultants, RWQCB approved Third Party Program Administrator.

Once enrolled under R1-2015-0023, participants are required to engage in ongoing monitoring, reporting and maintenance including periodic site inspections and reviews of operational practices to ensure regulatory requirements related to the following items are being met.

Site maintenance, erosion control, and drainage features	Stream crossing maintenance
Riparian and wetland protection and management	Spoils management
Water storage and use	Irrigation runoff
Fertilizers and soil amendments	Pesticides and herbicides
Petroleum products and other chemicals	Cultivation-related wastes
Refuse and human waste	

Additionally, participants ensure that management measures and controls are effectively protecting water resources, and that any newly developing problems representing a water quality concern are identified and corrected quickly.

Fertilizers, Pesticides, and other Regulated products:

List and describe machinery and equipment used for cultivation and associated activities:

Back-up generator, fans, dehumidifier

Describe equipment service and maintenance; including where it is done.

Equipment service/maintenance is done by qualified service providers in Redway or Garberville.

List and describe petroleum products and automotive fluids used onsite.

Gasoline in standard metal canisters.

List and describe compressed gases, cleaners, solvents and sanitizers; indicate amounts normally stored and how/where they are stored. Domestic propane tank. Household cleaners in retail amounts stored in house.

Fertilizers, Pesticides, other Regulated products: The fertilizers/amendments listed below are used at the start of the grow season; only quantities needed are purchased and brought to the site. They are stored within a locking barn equipped with an impermeable floor. Annual reporting of fertilizer/amendment use is required under RWQCB Order No. R1-2015-0023 and the data is provided on page 4, Appendix C (RWQCB Order No. R1-2015-0023).

Mixing of the products listed below takes place only within a small area near cultivation sites and the products are kept protected from accidental spillage or disturbance from wildlife while mixing takes place. If any leftover product remains it will be kept in original packaging and be stored on shelves inside of the barn.

The products listed are primarily used at the start of the cultivation season. Any product remaining after initial start-up is kept securely protected in original packaging/containers atop pallets inside the barn. Quantities of products stored should not exceed 500 pounds at		
		any particular time.
		ntainer on shelf inside barn in original container
er on shelf inside barn in original container		

The applicant acknowledges that the storage and/or use of certain materials in specified volumes and/or weights will be subject to regulation through Humboldt County Division of Environmental Health CUPA and may require: submittal of inventories for those materials, documentation of emergency and training procedures, maintenance of hazardous waste disposal records, obtaining an EPA generator ID number and be subject to site inspections.

Cultivation related wastes are sorted such that compostable materials are recycled/composted onsite within a small area equipped with perimeter and top containment to prevent unwanted movement of materials due to weather conditions or animals/pests. Other materials, unsuitable for composting, are stored in conventional trash containers with tight fitting lids and hauled to an approved transfer station as needed. If it becomes necessary, exhausted soil will be removed from cultivation beds and carefully mixed and spread over native soils on level ground at select locations to initiate microbial reconditioning and prevent unwanted constituent migration. Spent growth medium containing inorganic substances such as perlite, will be stored in weatherproof containers and hauled to an approved waste facility as needed

Human Waste: The residence on the parcel is served by a conventional septic tank/leach-field system. The residence is in close proximity to all cultivation activities.

Cultivation Operations/Practices:

		Ave. Hr. Light Use
January	No activity	
February	No activity – may evaluate site and plan activities	
March	Prepare garden beds, initiate propagation, ensure site maintenance up-to-date	6
April	Ongoing garden care, general maintenance of infrastructure etc.	6
May	Ongoing garden care, initiate light-dep over hoops	
June	Ongoing garden care and site maintenance	
July	Ongoing garden care, start 1 st round harvest, dry	
August	Complete 1 st round harvest,	
September	Ongoing garden care	
October	Ongoing garden care-harvest 2 nd round and full term, initiate site cleanup	
November	Start site preparations for winter.	

Processing: Plants are harvested at peak ripeness and immediately transferred to the garage where they are hung to dry. Natural air flow may be supplemented with household fans and dehumidifiers to aid the drying. Trimming of dried plants will occur at a licensed off-site processing facility.

Security: Access to the subject parcel is restricted by placement of locked metal gates at entrance roads. The owner/applicant or other residents are usually onsite and the cultivation areas are fenced. There is a dog normally present onsite also.