



Project Title: Fine-Scale Vegetation Map for Clark County

Purchase Order: 4800013250-002

Project Number: 2023-COGAN-2337A

Deliverable #: D05

Deliverable Title: Quarterly Progress Report #1

Deliverable Date: December 5, 2025

1. Accomplishments:

Contract Award and Mobilization

CTI participated in the contracting process by submitting and updated proposals, answering questions, and participating in conference calls and virtual meetings.

Project Kick-off Meetings

CTI met with John Ellis via virtual call to review the scope of the project, discuss contract specifics, and plan for the next stages of the project.

Vexcel Imagery

CTI negotiated with several vendors on acquiring new basemap imagery for the fine scale mapping project. The Vexcel cooperation was selected due to a combination of pricing and high quality of their imagery. CTI worked directly with Vexcel staff on getting the necessary licenses and contracts.

Work Plan and Data Management Plan

CTI submitted both a detailed work and data management plan to the County that outlined major tasks, milestones, and deliverables along with a description of how the data will be managed and delivered.

Image Acquisition

Vexcel has provided imagery for the project area through both their streaming service and as downloads. Imagery for two portions of the project area have been successfully downloaded and stored on CTI Servers (**Figure 1**).

Permits

CTI submitted copies of all the required permits as needed for the project at this time.

Begin Fine-Level Mapping

CTI has begun the fine-level mapping for work zone using Vexcel imagery (**Figure 2**).

High Resolution Image Processing for 2 Work Zones

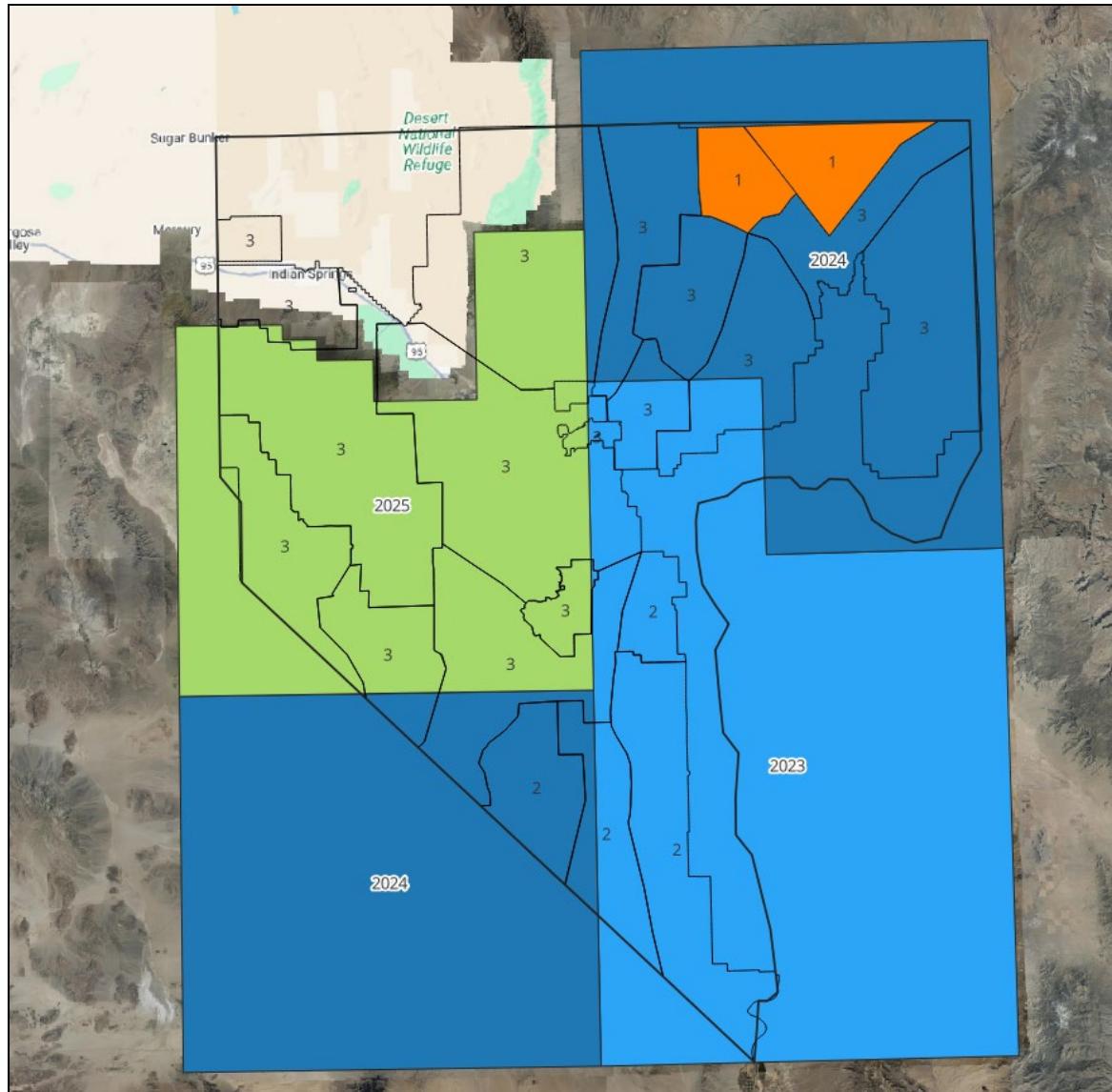
CTI has successfully downloaded two sets of Vexcel imagery.

Draft Taxonomic Classification

CTI reviewed and updated the taxonomic classification using the field data collected during the coarse-level portion of the project. A total of 150 potential plant associations and corresponding alliances (higher levels) were then sorted and merged into the fine level classification.

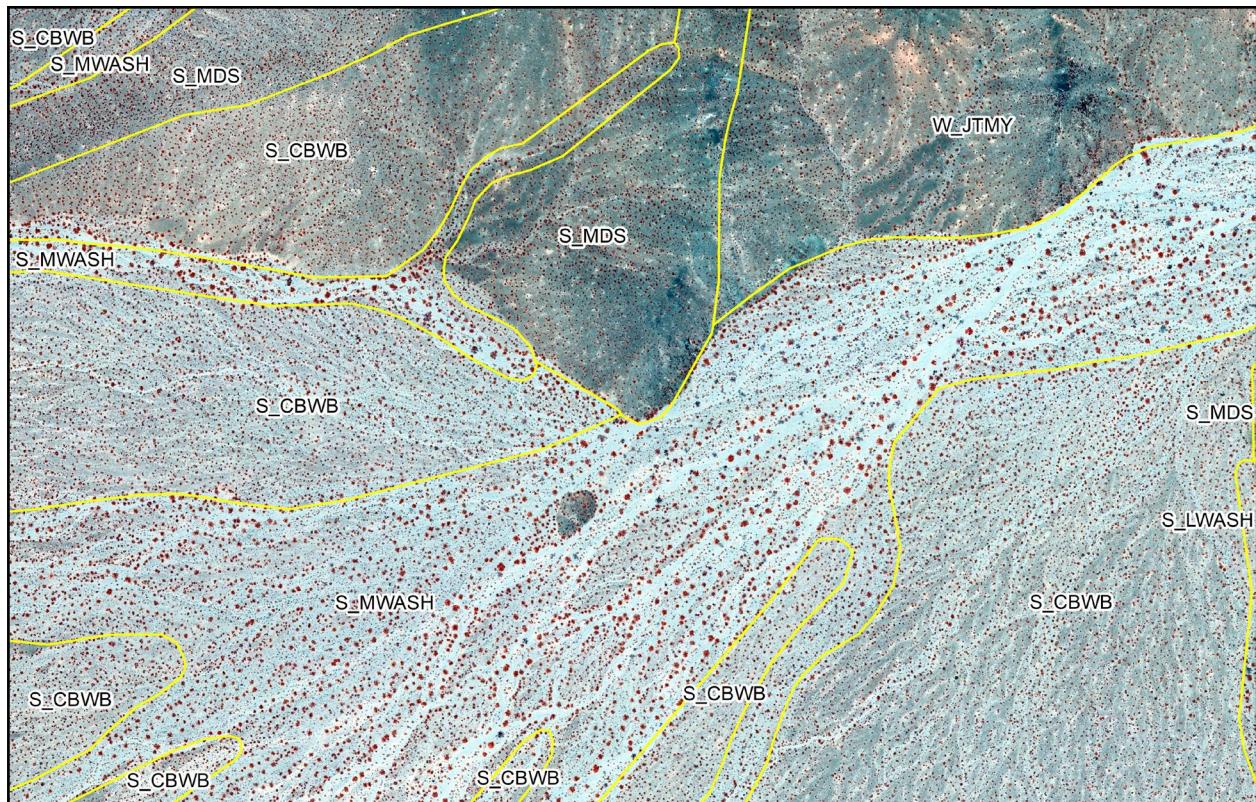
Based on the refinement a total of 128 potential map units (93 vegetated and 35 land-use/land-cover) were identified and updated. New vegetation types were cross-walked to the US National Vegetation Classification (USNCV) when possible. Special map units were created for several unique early succession and landform types. Finally, land cover map units were also assigned based on known land use patterns in Clark County.

Figure 1. Vexcel Imagery Acquisition Dates and the Vegetation Mapping Work Zones.



Note: Imagery for the two dark blue areas (2024) have been downloaded. The orange areas represent the two work zones that are currently being mapped to a fine-scale level.

Figure 2. Example of the fine-scale mapping using the color infrared 4-band Vexcel Imagery.



2. Problems and Issues:

None at this time

3. Activities Not Completed:

None at this time

4. Calculated Percent of Work Completed:

Approximately 5% of the fine scale mapping has been completed.

5. Problems with Future Project Activities:

None at this time

6. Other Items for DCP:

None at this time

7. Items Produced During this Time Period:

- Work Plan
- Data Management Plan
- Acquired and Processed Vexcel Imagery (two sets)
- Renewed Business Permit
- Draft Taxonomic Classification
- Map Unit Revisions
- Quarterly Progress Report 1