PLANNING DEPARTMENT

P.O. Box 40 • Irrigon, Oregon 97844
(541) 922-4624 or (541) 676-9061 x 5503
FAX: (541) 922-3472

AGENDA

Morrow County Planning Commission
Tuesday, March 26, 2024, 6:00 pm
Morrow County Government Center, Irrigon, OR
For Electronic Participation See Meeting Information on Page 2

Members of Commission

Stanley Anderson	Tripp Finch	Elizabeth Peterson
Charlene Cooley	John Kilkenny, Vice Chair	Karl Smith
Stacie Ekstrom, Chair	Mary Killion	Brian Thompson

Members of Staff

Tamra Mabbott, Planning Director
Stephen Wrecsics, Associate Planner, GIS
Michaela Ramirez, Administrative Assistant
Daisy Goebel, Principal Planner
Landon Jones, Planning Tech

1. Call to Order

2. Roll Call

Pledge of Allegiance

3. Minutes: (Draft) February 27th, 2024 pgs. 4-5

AC-153-24 Comprehensive Plan Amendment; Goal Exception. Passage Solar- OneEnergy Inc., Applicant. Goal 3 exception required to impact up to 738.6-acres of High-Value Farmland for the construction and operation of a 120-MW solar photovoltaic energy generation facility within the Exclusive Farm Use (EFU) zone. The property is located ±17 miles southeast of Hermiston and ±22 miles southeast of Boardman (Tax Lot 1200 of Assessor's Map 03N27 & Tax Lot 100 of Assessor's Map 02N27). Applicable Criteria include Morrow County Zoning Ordinance (MCZO) Article 8 Amendments and Oregon Administrative Rules (OAR) 660-004-0010. pgs. 7-45

CUP-N-364-24 Passage Solar- OneEnergy Inc., Applicant Conditional Use Permit for the construction and operation of a 120-MW solar photovoltaic energy generation facility within the Exclusive Farm Use (EFU) zone. The property is located ±17 miles southeast of Hermiston and ±22 miles southeast of Boardman (Tax Lot 1200 of Assessor's Map 03N27 & Tax Lot 100 of Assessor's Map 02N27). Criteria for approval are found in MCZO Article 3 Section 3.010 and Article 6 Conditional Uses. pgs. 46-203

CUP-S-365-24 Jacob Trahan Applicant and Owner The property is described as Tax Lot 2005 of Assessor's Map 1S25E, and is located approximately two miles west of the Town of Lexington on Highway 74. Property is zoned Exclusive Farm Use (EFU) and is outside the Lexington UGB. The request is to allow a Home

pgs. 205-213

Occupation by Conditional Use. Criteria for approval are found in the MCZO Article 3 Section 3.010 and Article 6 Conditional Uses.

4. Other Business: March Planning Update

5. Correspondence:

6. Public Comment:

7. Adjourn

Next Meeting: Tuesday, April 30, 2024, at 6:00 p.m.
Location: Bartholomew Building, Heppner, OR

ELECTRONIC MEETING INFORMATION

Morrow County Planning is inviting you to a scheduled Zoom meeting. Topic: Planning Commission
Time: March 26, 2024, 06:00 PM Pacific Time (US and Canada)

Join Zoom Meeting
https://us02web.zoom.us/j/6554697321?pwd=dFMxR2xlaGZkK1ZJRFVrS1Q0SmRxUT09&omn=84249165172

Meeting ID: 655 469 7321
Passcode: 513093

Find your local number: https://us02web.zoom.us/u/kdmj6471tm

Should you have any issues connecting to the Zoom meeting, please call 541-922-4624. Staff will be available at this number after hours to assist.

This is a public meeting of the Morrow County Planning Commission and may be attended by a quorum of the Morrow County Board of Commissioners. Interested members of the public are invited to attend. The meeting location is accessible to persons with disabilities. A request for an interpreter for the hearing impaired, or for other accommodations for persons with disabilities, should be made at least 48 hours before the meeting to Tamra Mabbott at (541) 922-4624, or by email at tmabbott@co.morrow.or.us.

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PLANNING DEPARTMENT

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FAX: (541) 922-3472

Draft Minutes of the Public Meeting of the Morrow County Planning Commission Tuesday, February 27, 2024, 6:00 pm Bartholomew Building

110 N. Court Street Heppner, OR
(Meeting was held in person in Heppner and through video conference via Zoom)

Morrow County Planning Commissioners Present: John Kilkenny, Brian Thompson, Stacie Ekstrom, Tripp Finch

Attendance via Zoom: Charlene Cooley, Elizabeth Peterson, Mary Killion, Stanley Anderson

Excused Absent: Karl Smith

Morrow County Staff Present: Director Mabbott, Michaela Ramirez, Office Manager, Daisy Goebel, Principal Planner, Landon Jones, Planning Tech

Morrow County Staff Attendance via Zoom: Stephen Wrecsics, Associate Planner

Call to Order- Meeting was called to order at 6:00 PM by Chair Ekstrom

Roll Call

Pledge

Director Mabbott asked that everyone introduce themselves.

Approval of Minutes: Chair Ekstrom asked if there were any corrections or amendments that needed to be made to the January minutes. There were none, the minutes were accepted as presented.

PUBLIC HEARINGS: There were none.

Director Mabbott

Oregon's Statewide Planning Program – Training by Department of Land Conservation and Development Commission staff, Gordon Howard, Community Services Division Manager and Dawn Marie Hert, Eastern Region Representative. A PowerPoint was presented (see packet)

Other Business: January Planning Update

Correspondence: None

Public Comment: None

Adjourned: Meeting adjourned at 8:24 PM

Next Meeting: Tuesday, March 26, 2024, at 6:00 p.m. The next meeting will be held in Irrigon, OR in the Morrow County Government Center.

Respectfullly submitted,

Michaela Ramirez

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STAFF REPORT AND PRELIMINARY FINDINGS

PLAN AMENDMENT (AC-153-24)

I. GENERAL INFORMATION AND FACTS

Applicant:
Passage Solar OR, LLC,
a wholly owned subsidiary of OneEnergy Development, LLC
2003 Western Ave, Suite 225
Seattle, WA 98121

Applicant Contact:
Elaine Albrich
Davis Wright Tremaine, LLP
1300 SW Fifth Avenue
Suite 2400
Portland, OR 97201

Property Owners:
Timothy and Shannon Rust Living Trust
77252 Mader Rust Lane
Echo, OR 97826

Shannon Rust Share
Frank and LaVonne Mader Living Trust
77252 Mader Rust Lane
Echo, OR 97826

Clarkston Development Company
1836 NW Boulevard
Coeur d'Alene, ID 83814

Proposal: This Plan Amendment is intended to amend the Agricultural Lands Element of the Morrow County Comprehensive Plan by adopting an exception to Statewide Planning Goal 3 to allow a solar photovoltaic (PV) energy generation facility sized up to 120 megawatts alternating-current (MWac) and optional battery energy storage system (BESS) on up to 753 acres on land zoned Exclusive Farm Use. The exception to Statewide Planning Goal 3 is required where the project will occupy more than 12 acres of high-value farmland and more than 20 acres of arable land. The applicant is concurrently filing Conditional Use Permit application CUP-N-364-24.

Project Tract: The Project is situated across two tax lots located in Township 03 North, Range 27 East, Section 33, and Township 02 North, Range 27 East, Section 04 as listed below:

Tax Lot	Acres
03N27000001200	1,939
02N27000000100	3,861
Total	5,800

Morrow County has jurisdiction for permitting as the project is below the Energy Facility Siting Council (EFSC) jurisdictional threshold set forth in ORS 469.300(11)(a)(D). Specifically, the project will not permanently occupy more than 240 acres of high-value farmland as defined in ORS 195.300 and will occupy less than 2,560 acres in total.

II. PROJECT DESCRIPTION AND LOCATION

Passage Solar OR, LLC (Applicant), a wholly owned subsidiary of OneEnergy Development, LLC (OneEnergy), proposes to develop Passage Solar, a solar PV project sized up to 120 MW with an optional battery energy storage system capable of storing up to 120 MW of energy located in Morrow County, Oregon (Project).

The Project will be located within a 5,800-acre tract of land jointly owned by the Timothy and Shannon Rust Living Trust, the Shannon Rust Share of the Frank and LaVonne Mader Living Trust, and the Clarkston Development Company and will be located approximately 17 miles southwest of the town of Hermiston within Morrow County, Oregon and 22 miles southeast of Boardman, Oregon in Morrow County (Vicinity Map, Attachment 1). The Project would interconnect to Umatilla Electric Cooperative's (UEC) Oregon Trail Substation, which is located approximately 2.5 miles northwest of the Project Area on an adjacent property.

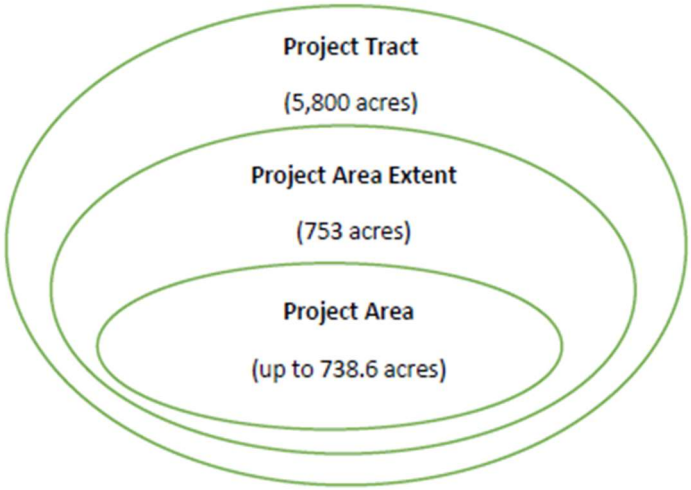
The Project would be sited on property zoned exclusive farm use (EFU) under the Morrow County Zoning Ordinance (MCZO). The Project is allowed in the EFU zone subject to a Conditional Use Permit (CUP), per Article 6 of the MCZO. Per MCZO 3.010(K)(3), the Project also requires a Goal 3 exception because it will occupy more than 12 acres of High-Value Farmland (HVF) and more than 20 acres of arable land. The Applicant is concurrently filing the CUP permit application and the Goal 3 exception request. The landowners support the Project and have given the Applicant authorization to apply for all necessary permits on its behalf (See Attachment B).

The Project would be located on up to 753 acres across two tax lots in the Project Tract which is defined in Section I. The Project Tract is privately-owned by three joint parties: the Timothy and Shannon Rust Living Trust, the Shannon Rust Share of the Frank and LaVonne Mader Living Trust, and the Clarkston Development Company (Landowners). Coordinates for the Project are 45°41'24.17" N, 119°26'33.51" W. The Applicant has executed a site control agreement with the Landowners.

The Project Area Extent, defined below, historically consisted of undeveloped/vacant and agricultural lands from the early 1900s to 1950s. Agricultural land use increased from the 1960s to present; the land is currently used to cultivate dryland crops. To develop this project, no tree cutting or clearing will be required. No wetlands or floodplains will be affected.

As shown in the Preliminary Site Plan (Attachment A) the Project would consist of PV panels, inverters, mounting infrastructure, an electrical collection system, operation and maintenance building, access roads, interior roads, security fencing, a new collector substation and electrical interconnection infrastructure. The Applicant proposes an optional battery storage system within the fenced area that would support the solar generation by balancing the resource and injecting energy onto the power grid during lower solar resource conditions.

Project Area Definitions
The Project's total maximum footprint would not exceed 753 acres, defined as the Project Area. As currently designed, the Project Area includes 738.6 acres within the Project fenced area, including approximately 18.7 acres of gravel access roads, 15.6 acres of equipment staging areas, and 0.25 acres reserved for the facility substation. A generation-tie line will be located wholly outside of the fenced area and will be routed to the existing Oregon Trail substation, which is located approximately 2.5 miles from the Project Area Extent. The Applicant is evaluating final routing and design with the Umatilla Electric Cooperative (UEC) and will file a separate Type II Land Use Decision application under separate cover. The Project Area would be located wholly within a broader micro siting boundary of 753 acres, defined as the Project Area Extent. The Project Area Extent is wholly within the 5,800-acre Project Tract.



Project Siting Characteristics
The Applicant selected this location in Morrow County after consideration of many suitability characteristics, including but not limited to the high solar energy resource, the underlying topography and land traits, access to electrical infrastructure, compatible zoning criteria, and low impacts to land use and habitat.

The Project Area Extent is 2.5 miles southeast of UEC's Oregon Trail Substation, constructed in 2021. The new UEC substation has sufficient electrical capacity to support the addition of 120 MW of generation without cost-prohibitive upgrades to the grid (more information on interconnection is provided below). This combination of a good solar resource and direct access to low-cost interconnection constitutes a unique resource upon which the Project is dependent. Please refer to the Project Overview section of the CUP for more details of the Project such as components, construction, operations, and decommissioning.

III. MORROW COUNTY ZONING CODE STANDARDS APPLICABLE TO LEGISLATIVE DECISIONS.

The following sections of the Morrow County Zoning Ordinance (MCZO) apply to this land use application. The relevant County Ordinance sections are shown below in bold italic text, followed by a Finding in standard text. All of the following criteria must be satisfied in order for

this request to be approved.

MORROW COUNTY ZONING ORDINANCE
Article 8. Amendments

SECTION 8.040. CRITERIA. The proponent of the application or permit has the burden of proving justification for its approval. The more drastic the request or the greater the impact of the application or permit on the neighborhood, area, or county, the greater is the burden on the applicant. The following criteria shall be considered by the Planning Commission in preparing a recommendation and by the County Court in reaching their decision.

A. The local conditions have changed and would warrant a change in the zoning of the subject property(ies).

Finding: The application notes that Article 8 applies to text or zone map amendments. While this is not a map amendment, it is a text amendment insofar as approval of an exception will become part of the Agricultural Lands section of the Comprehensive Plan. Additionally, there is a local precedent in which Section 8 applied to similar goal exceptions and to all legislative amendments (text, map, plan, etc.) Additionally, in similar legislative decisions Morrow County adopted Findings to show compliance with Article 8. (See AC-121-18 and AC-140-22).

The proposed Goal 3 exception is a legislative request to amend the text of the Comprehensive Plan Agricultural Lands Section. The request is not to rezone the subject property. The scope of the request is to allow an exception only for the solar photovoltaic power generation facility.

This standard requires findings to show that local conditions have changed and would warrant a change in the zoning. The application does not claim that local conditions have changed, however, state and national markets for renewable energy have changed and so has management of farmland. In this case, the landowner has adapted historic business practices so that a portion of the farm may be set aside for renewable energy. The demand for solar energy has effectively changed the cost of doing business comparatively given other opportunities for land development in the local area.

The application did not include an analysis of the impacts resulting from the removal of 753 acres of agricultural land from productive use. Agricultural mitigation plans have been approved for other projects that have included Goal 3 exceptions, and Staff has recommended requiring the applicant to submit, and the county to adopt, an agricultural mitigation plan to support this Goal 3 exception. With this inclusion, the application can be found to show that the application does comply with this criterion.

B. The public services and facilities are sufficient to support a change in designation including, but not limited to, water availability relevant to both quantity and quality, waste and storm water management, other public services, and streets and roads.

Finding: The project will have minimal impacts to water quantity and quality, waste or storm water or other public infrastructure including the transportation system. The applicant further considers and mitigates anticipated impacts in the companion Conditional Use Permit Application. This application may be found to meet this standard.

2. ***A plan or land use regulation amendment significantly affects a transportation facility if it:***
   a. ***Changes the functional classification of an existing or planned transportation facility;***
   b. ***Changes standards implementing a functional classification;***
   c. ***Allows types or levels of land use that would result in levels of travel or access that are inconsistent with the functional classification of a transportation facility; or***
   d. ***Would reduce the level of service of the facility below the minimal acceptable level identified in the Transportation System Plan. (MC-C-8-98)***

Finding: The subject site is located on the border of Umatilla and Morrow Counties, and both proposed transportation alternatives included in the Applicant's Transportation Plan (Attachment M) provide access via ODOT highways through Umatilla County. The Legislative Amendment will not significantly affect a transportation facility as defined above. Morrow County is not permitting construction traffic on Morrow County Roads with without a Road Use Agreement (see condition of approval below), and the development will be under the 400-trip threshold that would otherwise trigger a Transportation Impact Analysis.

All local haul routes will be on roads owned by the landowner. A copy of the CUP application was provided to Umatilla County Public Works; where a road use agreement or traffic mitigation is requested, a condition of approval was included in the CUP permit. County may find the application complies with this standard.

C. That the proposed amendment is consistent with unamended portions of the Comprehensive Plan and supports goals and policies of the Comprehensive Plan, that there is a public need for the proposal, and that the need will be best served by allowing the request. If other areas in the county are designated for a use as requested in the application, then a showing of the necessity for introducing that use into an area not now so zoned and why the owners there should bear the burden, if any, of introducing that zone into their area.

Finding: The proposed solar photovoltaic energy generation facility requires an exception to Statewide Planning Goal 3- Agricultural Lands, as it will impact over 20 acres of arable land and it will use, occupy, or cover more than 12 acres of high value farmland. Below the applicant addresses how the proposed Goal 3 exception supports and furthers the goals and policies of the Comprehensive Plan and how the Project implements goals and policies under MCCP's Goal 13 (Energy

Conservation), Goal 9 (Economic Development), and Goal 11 (Public Facilities and Services). Further, Applicant has shown why other areas within the County cannot accommodate the Project (Attachment R). Applicant maintains that because it is not proposing a new zone or zone change to the Project Site this criterion is not directly applicable given that the focus of MCZO 8.040(C) is introducing a new use or a new zone in an area. Nonetheless for the reasons discussed above, the Goal 3 exception request is consistent with the unamended portion of the MCCP, furthers the goals of the MCCP, and the public need for the benefits promoted by the applicable MCCP goals and policies is well served by allowing the Goal 3 exception request. Accordingly, the County may find the application complies with MCZO 8.040(C).

The Morrow County Comprehensive Plan Economic Element (Goal 9) was updated in 2016 in part to recognize that county supports responsible energy sector development. Goal 9 policy supports county ability to "maintain and improve energy generation and movement in and through Morrow County."

Further, Economic Element Goal 9 policy 3 "to diversify local business, industries and commercial activities and to promote economic growth and stability of the county" lends support for the proposed solar project.

Economic Element Policy 4 is "[t]o encourage the development of compatible land uses throughout the county and to protect areas suitable for industrial development from encroachment of incompatible uses."

Based on the above policies in MCCP Economic Element, the proposed solar project can be found to be in compliance with this criterion.

D. The request addresses issues concerned with public health and welfare, if any.

Finding: Applicant maintains that the Goal 3 exception request does not present any public health or welfare concerns. While unlikely, possible public health or welfare concerns could be related to construction related impacts like dust or prevention of public access to electrical equipment. Applicant proposes to manage such potential impacts by implementation of dust control measures, stormwater prevention and control, noxious weed prevention and control and by following all applicable fire code as addressed in the Conditions of Approval for the associated conditional use permit. Accordingly, the County may find MCZO 8.040(D) met.

IV. APPLICABLE STATEWIDE PLANNING GOALS

Statewide Planning Goal 1: Citizen Involvement

Goal 1 requires a citizen involvement program that is widespread, allows two-way communication, allows for citizen involvement through all planning phases and is understandable, responsive and funded.

Generally, Goal 1 is satisfied when a county complies with public notice and hearing requirements in the Oregon Statutes and in the local Comprehensive Plan and Land Use Code.

The County's Zoning Ordinance is consistent with State law with regards to notification requirements. Pursuant to Section 9 of Morrow County Zoning Ordinance at least one public hearing before the Planning Commission and Board of Commissioners is required. Legal notice in a newspaper of general circulation is required. The County has met these requirements and notified DLCD 35 days prior to the first evidentiary hearing.

Finding: Staff provided notice to DLCD on February 16, 2024, mailed notice to affected landowners, agencies, and interested parties on March 1, 2024, and published legal notice of the public hearings in newspapers of general circulation on March 5th and 6th, 2024. Given the public vetting of the report, scheduled public hearings and notice provided, Goal 1 is satisfied.

Statewide Planning Goal 3: Farmland

This application includes a request for county to approve an exception to Statewide Planning Goal 3 which is required if a photovoltaic solar power generation facility is built on more than 12 acres of high-value farmland or 20 acres of arable land. The exception is subject to OAR 660-033-0130(38). Specifically, subsections (g), (i) and (k) state:

> ***OAR 660-033 -0130(38)(g)**: (g) For high-value farmland described at ORS 195.300(10), a photovoltaic solar power generation facility shall not use, occupy, or cover more than 12 acres unless: (A) The provisions of paragraph (h)(H) are satisfied; or (B) A county adopts, and an applicant satisfies, land use provisions authorizing projects subject to a dual-use development plan. Land use provisions adopted by a county pursuant to this paragraph may not allow a project in excess of 20 acres. Land use provisions adopted by the county must require sufficient assurances that the farm use element of the dual-use development plan is established and maintained so long as the photovoltaic solar power generation facility is operational or components of the facility remain on site. The provisions of this subsection are repealed on January 1, 2022.*
>
> ***OAR 660-033 -0130(38)(i):** For arable lands, a photovoltaic solar power generation facility shall not use, occupy, or cover more than 20 acres.*
>
> ***OAR 660-033-0130(38)(k)**: An exception to the acreage and soil thresholds in subsections (g), (h), (i), and (j) of this section may be taken pursuant to ORS 197.732 and OAR chapter 660, division 4.*

Finding: As summarized in the Soils Analysis (Attachment C), the entire Project Tract is predominately cultivated and therefore considered arable land under OAR 660-033-0130(38)(a). The Project will use, occupy, or cover up to 738.6 acres of land within a portion of the Project Tract and therefore triggers a Goal 3 exception under OAR 660-033-0130(38)(i). The Project also triggers a Goal 3 exception under OAR 660-033-0130(38)(g) because it will use more than 12 acres of high-value farmland (HVF).

Approximately 152.9 acres of the Project Area Extent is classified as

high-value farmland. As further described in the Soils Analysis (Attachment C), some of these areas are classified as HVF because they have certain characteristics (including slope, aspect and elevation) and are within the Columbia Valley viticultural area (ORS 195.300(10)(f)(C)).

In total, the Project anticipates permanent impacts on up to 152.9 acres of HVF and up to 753 acres of arable land within the Project Area Extent. The Applicant therefore requests a Goal 3 exception for up to 753 acres within the Project Area Extent.

Legal Framework for Goal 3 Exception

The County may adopt an exception to Goal 3 and amend the Morrow County Comprehensive Plan under the "reasons" exception in ORS 197.732(2)(c), which states:

> ***ORS 197.732(2)****: A local government may adopt an exception to a goal if:*
> *(c) The following standards are met:*
> *(A) Reasons justify why the state policy embodied in the applicable goals should not apply;*
> *(B) Areas that do not require a new exception cannot reasonably accommodate the use;*
> *(C) The long-term environmental, economic, social and energy consequences resulting from the use at the proposed site with measures designed to reduce adverse impacts are not significantly more adverse than would typically result from the same proposal being located in areas requiring a goal exception other than the proposed site; and*
> *(D) The proposed uses are compatible with other adjacent uses or will be so rendered through measures designed to reduce adverse impacts.*

The following sections 3.2.A-D are Applicant's response to subsections A-D of ORS 197.732(2)(c).

ORS 197.732(2)(c)

A. *Reasons justify why the state policy embodied in the applicable goals should not apply;*
B. *Areas that do not require a new exception cannot reasonably accommodate the use;*
C. *The long-term environmental, economic, social and energy consequences resulting from the use at the proposed site with measures designed to reduce adverse impacts are not significantly more adverse than would typically result from the same proposal being located in areas requiring a goal exception other than the proposed site; and*
D. *The proposed uses are compatible with other adjacent uses or will be so rendered through measures designed to reduce adverse impacts.*

OAR 660-004-0022 provides reasons necessary to justify an exception under ORS 197.732(2)(c). Relevant here, are the reasons contained in OAR 660-004-0022(1) and OAR 660-004-0022(3).

OAR 660-004-0022(1) provides:

> *(1) For uses not specifically provided for in this division, or in OAR 660-011-0060, 660-012-0070, 660-014-0030 or 660-014-0040, the reasons shall*

justify why the state policy embodied in the applicable goals should not apply. Such reasons include but are not limited to the following:

a. There is a demonstrated need for the proposed use or activity, based on one or more of the requirements of Goals 3 to 19; and either:

A. A resource upon which the proposed use or activity is dependent can be reasonably obtained only at the proposed exception site and the use or activity requires a location near the resource. An exception based on this paragraph must include an analysis of the market area to be served by the proposed use or activity. That analysis must demonstrate that the proposed exception site is the only one within that market area at which the resource depended upon can reasonably be obtained; or

B. The proposed use or activity has special features or qualities that necessitate its location on or near the proposed exception site.

OAR 660-004-0022(3) provides:

(3) Rural Industrial Development: A local government may consider a photovoltaic solar power generation facility as defined in OAR 660-033-0130(38)(f) to be a rural industrial use. For the siting of rural industrial development on resource land outside an urban growth boundary, appropriate reasons and facts may include, but are not limited to, the following:

a. The use is significantly dependent upon a unique resource located on agricultural or forest land. Examples of such resources and resource sites include geothermal wells, mineral or aggregate deposits, water reservoirs, natural features, or river or ocean ports;

b. The use cannot be located inside an urban growth boundary due to impacts that are hazardous or incompatible in densely populated areas; or

c. The use would have a significant comparative advantage due to its location (e.g., near existing industrial activity, an energy facility, or products available from other rural activities), which would benefit the county economy and cause only minimal loss of productive resource lands. Reasons for such a decision should include a discussion of the lost resource productivity and values in relation to the county's gain from the industrial use, and the specific transportation and resource advantages that support the decision.

The following section demonstrates that the Applicant can satisfy ORS 197.732(2)(c)(A) under OAR 660-004-0022(1) (the "Other Reasons Test") and under OAR 660-004-0022(3) ("Rural Industrial Development Reasons Test"). The Applicant also provides sufficient evidence to demonstrate that the Project complies with ORS 197.732(2)(c)(B)-(D).

ORS 197.732(2)(C)(A)

Reasons justify why the state policy embodied in the applicable goals should not apply.

1. OTHER REASONS TEST

The Other Reasons Test has two prongs. First, the Applicant must demonstrate a need for the proposed Project based on one or more of the requirements of Goals 3 to 19. Then, the Applicant must demonstrate that the proposed Project has special features or qualities that necessitate its location on or near the proposed exception site.

Test 1: Requirements of Other Goals Justify and Exception to Goal 3

Statewide Planning Goals are implemented at the local level via the County's comprehensive plan. The County's comprehensive plan is acknowledged as being consistent with the Statewide Planning Goals. Therefore, for purposes of analyzing the Project under OAR 660-004-0022(1)(a), the Applicant demonstrates why the requirements contained in the County's goals and policies implementing Goal 13 (Energy Conservation), Goal 9 (Economic Development), and Goal 11 (Public Facilities and Services) evidence a need for the proposed Project and justify removing up to 738.6 acres of the Project Area Extent from cultivation.

Energy Conservation Element (Goal 13)

Introduction:

"In general terms, the primary goals set forth in the element of the "Plan" are directed at conserving energy, maintaining energy sources and costs, and identification of alternate energy sources."

Energy Resources:

"Morrow County residents may be able to utilize solar and wind resources to provide power in the future…Many sites are available which are not suitable for agricultural purposes."

Findings:

"2…economic sources of energy that could feasibly be developed in Morrow County include solar, and wind-power electrical generation.
4. Morrow County receives about 300 days of sunshine per year. Solar energy may be a very feasible source of energy."

Policies:

"1. To encourage renewable and/or efficient energy systems design, siting and construction materials in all new development and improvements in the County.
2. To conserve energy and develop and use renewable energy sources.
3. Encourage development of solar and wind resources.
9. The County will encourage development of alternative energy sources in County industries and businesses.
15. All plans should be directed toward energy conservation and should consider as a major determinant the existing and potential capacity of the renewable energy sources to yield useful energy output. Renewable energy sources include water, sunshine, wind, geothermal heat and municipal, forest and farm waste."

The goals, findings, and policies of Morrow County's Energy Conservation Element make direct

and frequent reference to the benefits of developing solar energy and in fact, encourage the development of renewable energy sites. The Project enables the County to advance many of its policies found here. Policies 2 and 3 could not be clearer in supporting a Goal 3 exception for the Project in order to advance Goal 13.

Economic Element (Goal 9)

Energy Sector:

> *"Comprehensive Plan Goals and Policies…need to outline the benefits of the energy sector and provide mechanisms to maintain and improve energy generation and movement in and through Morrow County."*

Goals and Policies:

> *Goal 3: "Diversify local businesses, industries and commercial activities and promote the economic growth and stability of the County."*
> *Policy 3A: "To encourage local producers to new markets for local products and to seek out new products that are in demand in the market place and that can be produced locally."*

The Economic Element in the County's comprehensive plan specifically addresses the need to outline the benefits of the energy section and maintain and improve energy generation in the County. The Element further encourages diversifying businesses and industries and encouraging local producers to new markets. The County's plan is forward-thinking and broad in order to allow the County to adapt to changing markets and demands.

In the case of solar energy production, the "local producers" are the County's landowners who for generations have cultivated the land for its agricultural products. Just like with wheat (the traditional crop grown in this part of Morrow County), a farmer can produce and harvest solar energy via a solar land lease which generates a profit from the occupied acreage. The Project will create solar generation capacity of up to 120 MW, resulting in approximately 260,000 MWh of renewable electricity each year. That is enough to power over 22,000 average households and results in an annual emissions reduction of over 183,000 metric tons CO2e based off data from the US Environmental Protection Agency.

The state's mandated Renewable Portfolio Standard, discussed below under state policies, has created new demand for renewable energy created in Oregon. This demand must be accompanied by new supply of renewable energy, thus the birth of a "new market". Morrow County's high insolation rate, abundance of sunny days, and robust electrical infrastructure make it an ideal location for efficiently producing renewable energy as a "local product".

Solar development at the Project Area supports the County in achieving its Economic Element goals. The County can find that promoting and encouraging solar projects will create a new product that can be efficiently produced locally and is in demand in a new marketplace.

Further, the development, construction, and ongoing operation of the Project will deliver notable economic benefits to the Morrow County community and the broader region in the form of direct and indirect spending. Capital investment directly in the local and regional economy will include project development technical support, sub-contracting for construction, construction material procurement, property taxes, landowners' lease payments, and long-term operations and maintenance. The Applicant estimates that during the construction phase, the Project will directly employ up to 300 jobs during peak construction. Additional "indirect" spending that occurs as a result of this Project, including lodging and meals during the construction period, is expected to provide further benefit for the local economy.

Public Facilities and Services Element (Goal 11)

General Policies:

"5. Utilities

A. Programs should be continued to develop additional sources of electric power and other power sources to assure adequate service to the County area and its projected growth."

Now more than ever, the County is seeing growth requiring additional electricity. As reported by the Eastern Oregonian on May 9, 2017, in an article titled "Morrow County thwarts employment trends of rural Oregon", the County's economic base is growing as it adds food processors, biofuels, and new data centers. This Project will generate power that will feed the local power grid and those burgeoning industries.

There is a demonstrated need for the deployment of renewable resources, including solar, in Morrow County. The Project will produce a significant advancement of important county and state policies, without undermining the policies behind Goal 3.

Test 2: The Project Requires Specific Site Characteristics and High Solar Resource Value

This prong of the Other Reasons Test requires that the Project have "special features or qualities that necessitates" locating the Project on the Project Area Extent.

The Project is locationally dependent, and the Project Area Extent was identified as a prime location due both to its proximity to electrical infrastructure capable of economically interconnecting the Project and its access to the County's high solar insolation rates.
The Project Area Extent is located on parcels that are within a reasonable distance to Umatilla Electric Cooperative's (UEC) Oregon Trail Substation. Through the interconnection study process with UEC and BPA, it has been determined that interconnecting the Project to this substation is both technically and economically feasible.
As stated in Goal 13 of the Morrow County Comprehensive Plan, the County receives 300 days of sunshine per year, making it a favorable location for siting solar projects.

Solar data collected by the U.S. Department of Energy show that this area provides some of the best solar resource in Oregon. The combination of a good solar resource and access to feasible interconnection to the grid constitutes a unique resource upon which the Project is dependent.

Test 2. RURAL INDUSTRIAL DEVELOPMENT REASONS TEST
The proposed facility is significantly dependent on the robust solar resource available in Morrow County. The Applicant selected this specific location after consideration of many suitability characteristics, including, in addition to the high solar energy resource, the underlying flat topography, lack of irrigation and water resources, access to electrical infrastructure, and low impacts to land use, surface waters and habitat. Accordingly, subpart (a) of the test is met. The use is dependent on rural land because ground-mounted PV would be incompatible in densely populated areas where there is insufficient land supply for a 753-acre project. Accordingly, subpart (b) of the test is met.

The proposed facility is located in close proximity to an existing substation that will serve as the point of interconnection with the regional grid. The location takes advantage of existing transmission infrastructure. It also minimizes the need to build new, long transmission lines, limiting the gen-tie line to about 3.5 miles. The project will be microsited to be as efficient as possible and minimize the permanent footprint. Accordingly, subpart (c) of the test is met.

ORS 197.732(2)(c)(B)

> ***ORS 197.732(2)(c)(B):*** *Areas that do not require a new exception cannot reasonably accommodate the use*

It is appropriate to consider multiple factors when determining whether there is alternate land that could "reasonably accommodate" solar development. It is not simply whether the zoning would allow the development without a Goal 3 exception. The feasibility and practicality of developing such lands for a successful solar project must be considered in addition to the consideration of access to existing electrical and transportation infrastructure. These factors help determine whether a project could “reasonably” be accommodated on other land.

The Applicant has prepared a Goal 3 Alternatives Analysis (Attachment R) that reviewed and analyzed potential sites within Morrow County that met the siting criteria such as land use, acreage, and interconnection ability. In addition to meeting the siting criteria the alternative site must be reasonably able to accommodate the Project without a goal exception. The Alternatives Analysis shows that there are no sites in Morrow County that meet the Project’s defined siting criteria and would not require a goal exception.

ORS 197.732(2)(c)(C)

> ***ORS 197.732(2)(c)(C):*** *The long term environmental, economic, social and energy consequences resulting from the use at the proposed site with measures designed to reduce adverse impacts are not significantly more adverse than would typically result from the same proposal being located in areas requiring a goal exception other than the proposed site; and*

Environmental
The Applicant does not anticipate any unmitigated adverse impacts on soils, wetlands, protected areas, water resources, threatened and endangered species, scenic resources, historic, cultural, archaeological resources, or public services as a result of this Goal 3 exception request, particularly given that the Project will be subject to conditional use review.

Wetlands and Water
As demonstrated in the Wetland Delineation Report (Attachment D) and the FEMA Map

(Attachment J), the Project is located outside any wetlands and is outside the 100-year floodplain. The applicant has also prepared a Vegetation and Weed Management Plan (Attachment L) that outlines actions to mitigate erosion and surface runoff during construction as well as operation, therefore impacts to waters and wetlands have a low potential to occur. As a condition of approval to the associated Conditional Use Permit, Applicant is required to provide more information on anticipated water usage and potential sources.

Wildlife and Habitat
A site review for any potential impact to Federal endangered species was completed in January 2024 via the United States Fish & Wildlife Service's (USFWS) Information for Planning and Conservation (IPaC) Trust Resource Report. No critical habitats were found within the Project Area Extent (see Attachment I, USFWS IPaC Report).

In consultation with the Oregon Department of Fish and Wildlife (ODFW), the Applicant contracted with Tetra Tech, Inc. (Tetra Tech) to complete a Threatened Endangered and Sensitive Species (TESS) survey, raptor nest survey, habitat mapping and botanical surveys for the Project Area Extent in 2023. The results of these surveys are found in the Wildlife and Habitat Survey Report (Attachment E).

The report shows that the Project Area Extent is composed almost entirely of Category 6 habitat with a minimal amount of Category 4 habitat. The project will be designed to avoid all Category 4 habitat. Please see the Wildlife and Habitat Survey Report for a detailed description of the habitat types, including a map. Table 2 below is a summary of the type and acreage of each habitat. Pursuant to ongoing consultation with ODFW, the Applicant has been advised that a Habitat Mitigation Plan is not required for this project, since no quality habitat will be impacted (See Attachment E for ODFW correspondence).

Table 2: ODFW habitat categories within the Project Area Extent

Habitat Type	ODFW Habitat Category	Acres
Eastside Grassland	4	4.5
Agriculture, Pasture, and Mixed Environs	6	744.8
Urban and Mixed Environs	6	3.4
Total		752.7

Historic, Cultural and Archaeological
The Applicant has consulted with the Oregon State Historic Preservation Office (SHPO), the Confederated Tribes of the Umatilla Indian Reservation (CTUIR), the Burns Paiute Tribe and the Confederated Tribes of Warm Springs for the Project. CTUIR and SHPO both responded to requests for reviews and based on feedback from these groups, the Applicant hired Tetra Tech to complete a cultural resources survey with support from CTUIR personnel. The findings of the Cultural Resources Survey Report are included under the confidential Attachment F. The report was submitted to SHPO, and confirmation of receipt was sent from SHPO on February 5, 2024. Additionally, the Applicant submitted the Cultural Resources Survey Report to the interested tribes on January 25th, 2024. The assigned SHPO Case Number is 23-1030 (see Attachment H).

The report is currently under review by CTUIR, the Burns Paiute Tribe, and the Confederated Tribes of Warm Springs. The cultural resources survey identified ruts associated with the Oregon National Historic Trail within the Project Area Extent and is recommended that this resource be eligible for NRHP listing. Based off these findings, the Applicant has placed a 30-meter setback from this resource. The Applicant is awaiting final review of the Cultural Resources Report by SHPO and interested tribes. The Applicant will work with SHPO and the affected tribes to incorporate any recommended setbacks or mitigation required by SHPO or the interested tribes. The areas identified during the cultural resources survey are depicted in the Confidential Preliminary Layout (Confidential Attachment G). Any mitigation caused by impacts to this cultural resource will be provided under a Confidential Mitigation Agreement and shared with the County prior to construction as a condition of the Conditional Use Permit.

Additionally, the cultural resources survey identified a historic property of religious and cultural significance (HPRCSIT) to the CTUIR. Impacts to the HPRCSIT are being identified with CTUIR and mitigation will be completed prior to permit approval. Mitigation will be coordinated with CTUIR under a Confidential Mitigation Agreement that will be provided to the County prior to construction as a condition of the Conditional Use Permit.

Soils and Stormwater
The Project must adhere to the solar siting standards in OAR 660-033-0130(38), which require a project-specific Soil Erosion and Sediment Control plan, and a Vegetation and Weed Management plan. The Applicant has prepared a Vegetation and Weed Management Plan (Attachment L) in consultation with the Morrow County Weed Supervisor. In addition, the Applicant will prepare a separate Soil Erosion and Sediment Control Plan prior to construction as part of the National Pollutant Discharge Elimination System (NPDES) permit. The Applicant will use best management practices for erosion control during and after construction. The Soil Erosion and Sediment Control Plan will also provide for permanent drainage and erosion control facilities as necessary to allow stormwater passage without damage to local roads or to adjacent areas and without increasing sedimentation to nearby waters.

Due to the relatively low presence of habitat, water, and other environmental resources present on the site, analysis shows that other sites that would also require a Goal 3 exception would either have the same or greater environmental impacts from the development of a solar project. See Attachment R, Alternatives Analysis.

Socioeconomic
The Project does not appear to have any adverse socioeconomic consequences. Economically, the Project will contribute additional income to the local tax base and to the landowners in the form of recurring lease payments. The economic impact on the tax base and local community in spending and job creation is described in detail above. Additionally, the Project will foster traditional rural lifestyles and opportunities by offering the landowners a long-term, predictable annual revenue stream to supplement the financial impacts of vacillating market forces inherent in farming.

Energy
The Project will create solar generation capacity of up to 120 MW, resulting in approximately 260,000 MWh of renewable electricity each year. That is enough to power over 22,000 average households and results in an annual emissions reduction of over 183,000 metric tons CO2. Thus, the energy consequences of removing the Project Area from Goal 3 protection will be positive. The renewable, emissions-free energy produced by the Project will help the region

meet increasing energy demands.

Additionally, the Project will support HB 2021, an Oregon law passed in 2021, which sets 100% clean energy targets for the State. The Project's electricity generation would contribute towards the requirements of Oregon retail electricity providers to provide electricity that does not emit greenhouse gas into the atmosphere.

ORS 197.732(2)(c)(D)

> ***ORS 197.732(2)(c)(D):*** *The Proposed uses are compatible with other adjacent uses or will be so rendered through measures designed to reduce adverse impacts.*

Solar development within the Project Area Extent is compatible with adjacent land uses, which include agricultural use and residences.

Beyond the fenced project footprint and the generation-tie line, no roads or other facilities will be constructed and accommodations for the Project will not negatively impact the landowners' current operations. As noted in the Landowner Support Letter (Attachment B), the landowners will continue to farm the remainder of their cultivated land.

The adjacent parcels will also continue to be farmed and/or used for common agricultural practices. The Project will be unoccupied and will not cause any change to or increase in the cost of accepted agricultural practices. Plowing and harvesting patterns on adjacent properties can continue unchanged. In compliance with OAR 660-033-0130(38), Applicant has consulted with the Morrow County Weed Control Supervisor to develop and implement the Vegetation and Weed Management Plan (Attachment L). This will prevent the spread of noxious weeds and reduce further impacts to nearby agricultural operations.

There are few residences near the project, with none closer than one mile. The project is situated atop a relatively high point, with little impact on the nearby viewshed. A GIS viewshed analysis reveals that neither residences nor public roads fall into the 3-mile viewshed of the project.

There are no anticipated long-term adverse traffic impacts associated with the Project's construction or operation. Any increase in traffic will largely occur at the beginning of construction during delivery of construction equipment and materials. Truck delivery trips are estimated to be up to 40-50 vehicles/roundtrips per day at peak construction. Daily construction traffic for personnel is estimated to be up to 150 vehicles per day.

There will be limited traffic to and from the Project during operation. Traffic will mostly be limited to maintenance crews for mowing and vegetation maintenance. Quarterly to yearly maintenance on the solar array components will most likely occur, along with site visits for any operational issues that may arise during normal operation.

The Project Will Further Important State Policies

According to the application, the Project will advance state policies, specifically, it "will help Oregon achieve its 100% clean energy targets set by the Clean Energy Targets bill (HB 2021) which was passed by the Oregon Legislature and signed into law in 2021.

The Clean Energy Targets bill requires certain electricity providers serving electricity in Oregon to reduce the greenhouse gas emissions associated with the electricity they provide. Ultimately, those electricity providers must reduce their greenhouse gas emissions to 100% below baseline emissions by 2040."

The Oregon Legislative Assembly has enacted numerous tax credits and economic development incentives favoring renewable energy development, including House Bill 3492 that was effective October 5, 2015. Oregon's numerous programs together reflect a comprehensive state policy of supporting renewable energy development. See further ORS 757.612 (creating system benefit charge, a portion of the funds from which go to renewable energy); ORS 757.603(2) (requiring Oregon electric utilities to provide retail customers with at least one option including significant percentage of renewable energy); ORS 469A.205.

VI. SUMMARY AND RECOMMENDATION

With this application, the County can reasonably find that a Goal 3 exception is justified for the Project Area Extent (753 acres) as each criterion in ORS 197.732(2)(c)(A)-(D) and MCZO Section 8 is met. There are compelling reasons that justify removing the Project Area from Goal 3 protection, which include: 1) the location provides a comparative advantage for the renewable energy development which will benefit the county economy and cause only minimal loss of resource lands, and 2) the Project is consistent with requirements of Goals 9, 11 and 13. Other areas that do not require a new exception and that could otherwise reasonably accommodate the use are not available (see Attachment R- Alternatives Analysis). The Project does not create any significant adverse economic, social, environmental, or energy consequences. Solar development on the Project Area Extent is compatible with adjacent land uses. For these reasons and those set forth in the record, County may approve the Goal 3 exception request.

VII. AGENCIES NOTIFIED:

Jim Johnson, Oregon Department of Agriculture; Dawn Hert, Jon Jinings, and Hilary Foote, Department of Land Conservation and Development; Daniel Somers, Oregon Department of Fish and Wildlife; Greg Silbernagel, Oregon Water Resources Department; Sean Rochette, Oregon Department of Environmental Quality; Mike Haugen and Eric Imes, Morrow County Public Works; Corey Sweeney, County Weed Coordinator; Dan Kearns, County Land Use Counsel; Mike Gorman and Sandi Patton, Morrow County Assessor; Matt Kenny, Morrow County Surveyor; Brian Snyder, Sherif's Office; Bob Waldher, Umatilla County Community Development; Teresa Penninger and Cheryl Jarvis-Smith, Oregon Department of Transportation; Kevin Payne, Morrow County Soil and Water Conservation; Sarah Esterson, Oregon Department of Energy; Lisa Mittelsdorf, Port of Morrow; Virgil Mike Hughes and Marty Broadbent, Boardman Fire Protection District; Tod Farmer, Oregon Military Department; Kim Peacher, United States Navy; Teara Farrow, Confederated Tribes of the Umatilla Indian Reservation; Chris Grant, Umatilla Fire; Brandon Hammond and Glenn McIntire, City of Boardman;

35-Day Notice for this Post Acknowledgement Plan Amendment (PAPA) was submitted to Department of Land Conservation and Development on February 16,

2024.

VIII. HEARING DATES:

- Planning Commission Hearing: March 26th, 2024
- Board of Commissioners: April 17th, 2024 Land Use Hearing and First Reading
- Board of Commissioners May 1st, 2024 Second Reading

VIIII. RECOMMENDATION: Adopt the attached Goal 3 Exception as an amendment to Agricultural Lands Element of the Comprehensive Plan.

MORROW COUNTY BOARD OF COMMISSIONERS

_____

David Sykes, Chair

_____

Jeff Wenholz, Vice-Chair

_____

Roy Drago Jr., Commissioner

Approved as to Form:

_____

Morrow County Counsel

Attachments:

- Applicant's "Attachment R", Goal 3 Alternatives Analysis

Attachment R

ALTERNATIVES ANALYSIS

Passage Solar
February 2024

OneEnergy Renewables
2003 Western Ave, Suite 225
Seattle, Washington 98121

oneenergy
renewables
.com

Goal 3 Alternatives Analysis

Passage Solar Project
Morrow County, Oregon

Submitted to

Morrow County Planning Department

Applicant

Passage Solar OR, LLC,

a wholly-owned subsidiary of OneEnergy Development, LLC

2003 Western Avenue, Ste. 223

Seattle, WA 98121

Prepared by

Tetra Tech Inc.

TETRA TECH

1750 SW Harbor Way, Suite 400

Portland, OR 97201

February 2024

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1.0 Executive Summary

Passage Solar OR, LLC (Applicant), a wholly-owned subsidiary of OneEnergy Development, LLC (OneEnergy), is seeking to construct and operate a solar photovoltaic project up to 120-megawatt alternating current (MWac) in Morrow County, Oregon (Passage Solar Project or Project). The Project will be sited on approximately 753 acres zoned exclusive farm use (EFU) under the Morrow County Zoning Ordinance (MCZO). The Project is allowed in the EFU zone subject to a Conditional Use Permit (CUP) and a Goal 3 exception, per MCZO 3.010(K)(3). The Applicant is concurrently filing the CUP permit application and the Goal 3 exception request.

The Project will be located on two parcels in unincorporated Morrow County: tax lot 1200 in Township 3 North, Range 27 East and tax lot 100 in Township 2 North, Range 27 East (known hereafter as the "Project Parcels"). The Project is located approximately seven miles south of Interstate 84 and immediately adjacent to and west of Morrow County's eastern boundary with Umatilla County. The Project Parcels are privately-owned by Timothy and Shannon Rust Living Trust, the Shannon Rust Share of the Frank and LaVonne Mader Living Trust, and the Clarkston Development Company. Coordinates for the center of the Project are 45°41'41.77" north latitude and 119°26'30.12" west longitude.

The Project will lease approximately 753 acres of the approximately 5,800-acre combined Project Tract. The Project Area will be located within the 753-acre micrositing boundary (Project Area Extent). See Figure 1.

The Project will interconnect to the Umatilla Electric Cooperative (UEC) transmission system at the UEC Oregon Trail Substation, which is located approximately 2.5 miles northwest of the Project Area Extent. Interconnection will require the construction of an approximately 3.5-mile generation-tie line to route from the Project site to the Oregon Trail substation, while avoiding irrigated agricultural land.

Applicant seeks an exception to Statewide Planning Goal 3 (Agriculture), per Oregon Revised Statutes (ORS) 197.732 and Oregon Administrative Rule (OAR) Chapter 660, Division 4. Under ORS 197.732(1)(b), "exception" means a comprehensive plan provision, including an amendment to an acknowledged comprehensive plan. Furthermore, OAR 660-004-0000(2) specifies that the documentation of an exception must be set forth in a local government's comprehensive plan and such documentation must support a conclusion that the standards for an exception have been met. OAR 660-004-0020 Goal 2, Part II(c), Exception Requirements specifies the process and standards for an exception. Compliance with OAR 660-004-0020 is discussed in the Project's Comprehensive Plan Amendment Application (under separate cover). Under OAR 660-004-0020(2)(b), the applicant must show that "areas that do not require a new exception cannot reasonably accommodate the use" and subparts (A) and (B) under this provision require an alternative analysis to show why the particular site is justified.

This report describes the alternative analysis that was conducted in response to the requirements under OAR 660-004-0020(2)(b)(A) and (B). The alternatives analysis study area includes the entire area of Morrow County. Applicant identified siting criteria that include the minimum requirements necessary to reasonably accommodate the proposed Project. The siting criteria were then applied to the entire area of Morrow County in an investigation to find alternatives sites that do not require a new goal exception. The results of the analysis show that there are no sites within Morrow County that meet the Project's defined siting criteria and would not require a new goal exception. Thus, there are no sites within the alternatives analysis study area that can reasonably accommodate the Project without a goal exception.

2.0 Analysis Approach and Siting Criteria

Before Morrow County can grant the requested goal exception, the Applicant must demonstrate that "areas that do not require a new exception cannot reasonably accommodate the use" (OAR 660-004-0020(2)(b)). Furthermore, the following subsections of OAR 660-004-0020(2)(b) must be met:

(A) The exception shall indicate on a map or otherwise describe the location of possible alternative areas considered for the use that do not require a new exception. The area for which the exception is taken shall be identified;

(B) To show why the particular site is justified, it is necessary to discuss why other areas that do not require a new exception cannot reasonably accommodate the proposed use. Economic factors may be considered along with other relevant factors in determining that the use cannot reasonably be accommodated in other areas. Under this test the following questions shall be addressed:

i. Can the proposed use be reasonably accommodated on nonresource land that would not require an exception, including increasing the density of uses on nonresource land? If not, why not?

ii. Can the proposed use be reasonably accommodated on resource land that is already irrevocably committed to nonresource uses not allowed by the applicable Goal, including resource land in existing unincorporated communities, or by increasing the density of uses on committed lands? If not, why not?

iii. Can the proposed use be reasonably accommodated inside an urban growth boundary? If not, why not?

iv. Can the proposed use be reasonably accommodated without the provision of a proposed public facility or service? If not, why not?

(C) The "alternative areas" standard in paragraph B may be met by a broad review of similar types of areas rather than a review of specific alternative sites. Initially, a local government adopting an exception need assess only whether those similar types of areas in the vicinity

could not reasonably accommodate the proposed use. Site specific comparisons are not required of a local government taking an exception unless another party to the local proceeding describes specific sites that can more reasonably accommodate the proposed use. A detailed evaluation of specific alternative sites is thus not required unless such sites are specifically described, with facts to support the assertion that the sites are more reasonable, by another party during the local exceptions proceeding.

Based on OAR 660-004-0020(2)(b)(B), "economic factors may be considered along with other relevant factors in determining that the use cannot reasonably be accommodated in other areas." Additionally, OAR 660-004-0020(2)(b)(C) allows that the alternative area analysis "may be met by a broad review of similar types of areas rather than a review of specific alternative sites," and that "detailed evaluation of specific alternative sites is thus not required unless such sites are specifically described…. by another party during the local exceptions proceeding."

The alternative analysis study area includes the entire area of Morrow County to allow for a broad review of similar types of areas that could accommodate the proposed use, but not require a new exception. In consideration of both physical and economic factors, the alternatives analysis employs the following assumptions regarding the minimum siting criteria that must be met for a reasonable alternative:

1. Requires the proposed use be sited on vacant land (to accommodate the ground-mounted photovoltaic solar array design) and be located within a Morrow County land use district that allows for solar development either outright or conditionally. This includes the following districts: Exclusive Farm Use (EFU), Port Industrial (PI), Rural Light Industrial (RLI), Airport Light Industrial (ALI), Resource Related Industrial (RRI), and Space Age Industrial (SAI). The General Industrial (MG) district does not list solar energy facilities (or any type of energy facilities) as an allowed use (conditionally or otherwise). However, given that other energy facilities such as the Boardman Coal Plant have been located in the MG zone, this analysis includes the MG zone as a potentially viable zone for utility scale solar.
2. Requires a minimum of 750 acres of contiguous vacant land (to accommodate up to a 120-MW solar project) owned by one landowner.
    a. Ground-mounted solar photovoltaic projects typically require 5 to 7 acres per MW.
    b. The Project lease area is composed of just over 750 acres of vacant land over two adjacent parcels all owned by Timothy and Shannon Rust Living Trust, the Shannon Rust Share of the Frank and LaVonne Mader Living Trust, and the Clarkston Development Company. Alternative sites can include more than one parcel as long as they are adjacent and owned by a single landowner (similar to the Project lease area).
3. Requires an alternative site to be sited within 3.5 miles of a reliable existing transmission line or existing substation with available capacity.

a. The Project proposes to interconnect to the northwest grid at UEC's existing Oregon Trail substation located about 2.5 miles from the Project and would only require an approximately 3.5-mile gen-tie line. See Regional Context Map below (Figure 1).

b. For the Project to be financially viable, alternative sites must provide similar interconnection opportunity, such as available capacity and distance to existing electrical infrastructure. Distance from existing electrical infrastructure increases costs due to length of gen-tie lines. If existing electrical infrastructure does not have available capacity, then costs to interconnect increase due to costs to upgrade the existing system.

c. The Project can only directly connect (via a wiretap) into a transmission line with a minimum of 115-kilovolts (kV) capacity due to the Project's voltage requirements. Transmission lines with higher capacity than 115k -kV (i.e. 230 kV) were also excluded from the siting criteria due to the infrastructure investment necessary to directly connect (via a wiretap) to transmission lines with voltage higher than 115-kV.

d. Additionally, the Project can only connect into a substation that can currently accommodate a 115-kV transmission line due to the infrastructure investment necessary to connect to a substation that currently only accepts voltages lower than 115-kV.

e. Therefore, all lands within 3.5 miles of all existing 115-kV lines and substations in Morrow County were initially evaluated in this analysis.

f. Available information regarding available capacity of existing transmission lines and substations was also evaluated as part of this analysis.

4. Requires alternative sites to be located adjacent to an existing road to allow for direct or near direct access to the Project site and avoid the construction of new access roads.

5. Requires alternative sites to have a grade of 10 percent or less to reduce grading/ground disturbance, and the costs and environmental impacts associated with larger amounts of grading/ground disturbance.

6. Requires alternative sites to have a minimum of 750 acres available outside of any sensitive environmental features, including Federal Emergency Management Agency (FEMA)-designated 100-year floodplains, U.S. Fish and Wildlife Service (USFWS)-designated critical habitat, Oregon Department of Fish and Wildlife (ODFW)-designated big game winter ranges, and any National Hydrography Dataset (NHD) or National Wetland Inventory (NWI)-mapped wetlands or waters.

    a. The Project is proposed on a site that avoids the FEMA floodplains, USFWS critical habitat, ODFW designated big-winter ranges, and NHD/NWI wetlands and waters. Thus, minimizing impacts to resources protected by the state and county.

   b. An alternative site that may impacts these resources would present regulatory and economic challenges (i.e. costs for mitigation) that are not required by the proposed site. Therefore, an alternative site that requires impacts to one or more of these environmental features does not reasonably accommodate the proposed use.

7. Requires alternative sites be located where there is a solar resource available without obstruction (e.g., not blocked for large periods of the day by adjacent buildings or trees); and
8. Requires alternative sites to be available to lease and/or be owned by a landowner willing to develop a photovoltaic solar facility on their parcel, and that the proposed use be compatible with surrounding neighbors and land uses.
9. Requires alternative sites to be permittable within 1 year or less to meet the Project's Commercial Operation Date.

Using the analysis tools in ArcMap (a geospatial processing program) and publicly available data sets, a series of analyses were performed to evaluate whether there are alternative areas in Morrow County that can reasonably meet on balance, the siting factors identified and thus reasonably accommodate the Project without requiring a new exception from a Statewide Planning Goal 3.

The first step in the analysis was to identify and map existing 115-kV transmission lines or existing substations that can accommodate a 115-kV transmission line. Locations of existing transmission lines and substations in Morrow County was obtained from UEC and Homeland Infrastructure Foundation (HIFLD 2021 and 2022) data.[1] Figure 2 shows the location of the transmission lines and substations in Morrow County with compatible voltage for the Project.

After further investigation into an available BPA interconnection system impact study (BPA 2017), one transmission line, the Alkali-Tower Road-Boardman 115 kV line and Tower Substation located on the line, were identified as being constrained by existing generation and higher-queued generation interconnection requests. This line runs west out of Boardman, north of the Boardman airport, through Threemile Canyon Farms and eventually to the Columbia Ridge Landfill in Gilliam County. Per the BPA study, no new generation can be interconnected to this line. Additionally, the Tower Substation does not have available connection capacity based on the existing infrastructure. Therefore, this line and substation were dropped from the analysis.

Using the refined list of compatible transmission lines and substations, a Gen-tie Line Buffer Area was developed in ArcMap that included all land in Morrow County within a 3.5-mile buffer of the compatible transmission lines and substations. A Non-buildable Areas layer was created to exclude areas that have slopes over 10 percent or are constrained by sensitive environmental features (e.g., areas within winter game range, within the 100-year flood plain, within a wetland, etc.). Both layers are identified in Figure 3.

The following analysis investigates all parcels in Morrow County located within or intersecting with the Gen-tie Line Buffer Area that have 750 acres or more land not constrained by the Non-Buildable

[1] Transmission line and substation spatial data is limited in its availability, comprehensiveness, and accuracy.

Area layer. These parcels/alternative sites were then evaluated for locations that would meet the remaining siting criteria (vacant land, permissive zoning designation, etc.) and would not require a Goal 3 exception.

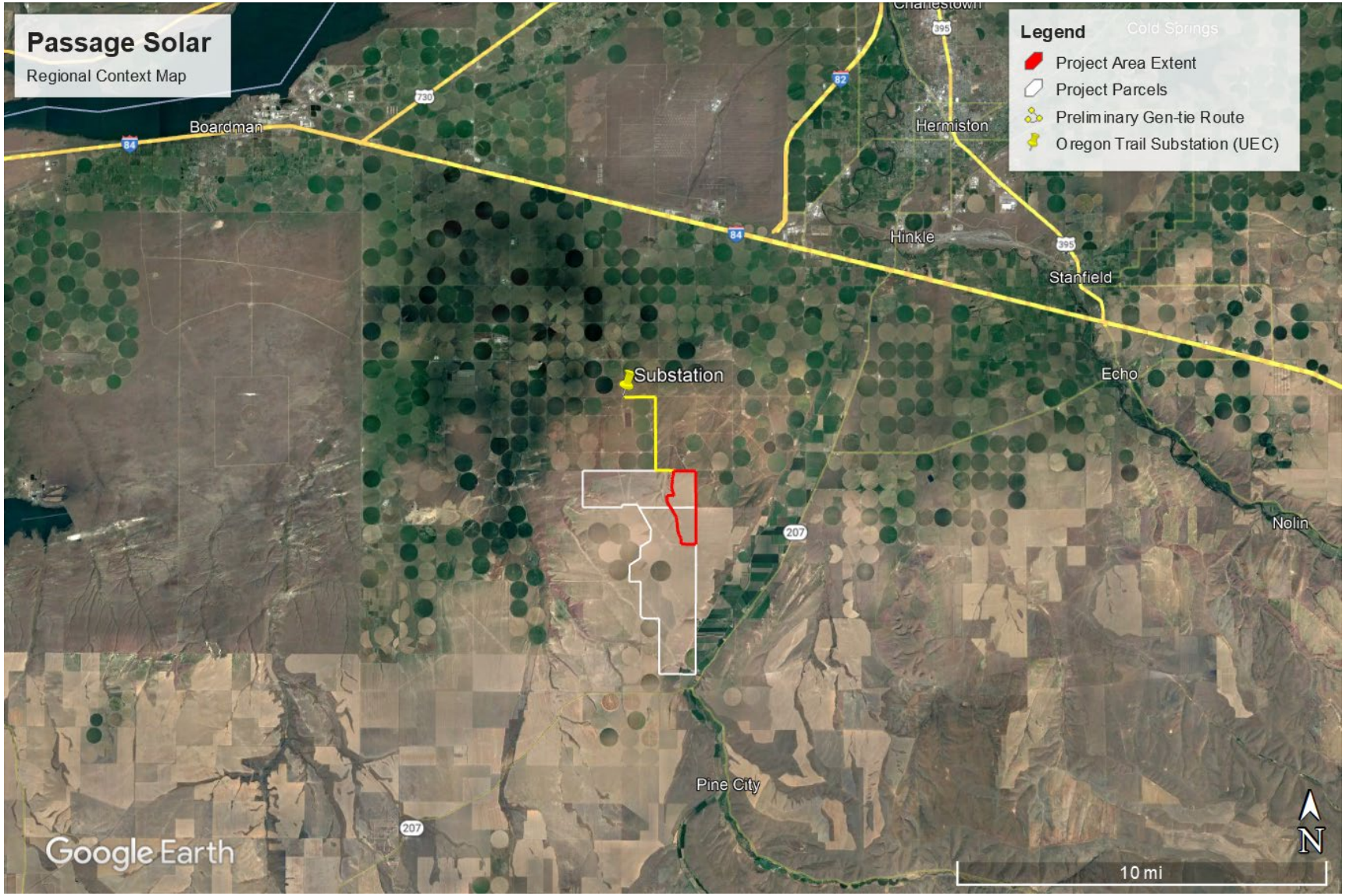
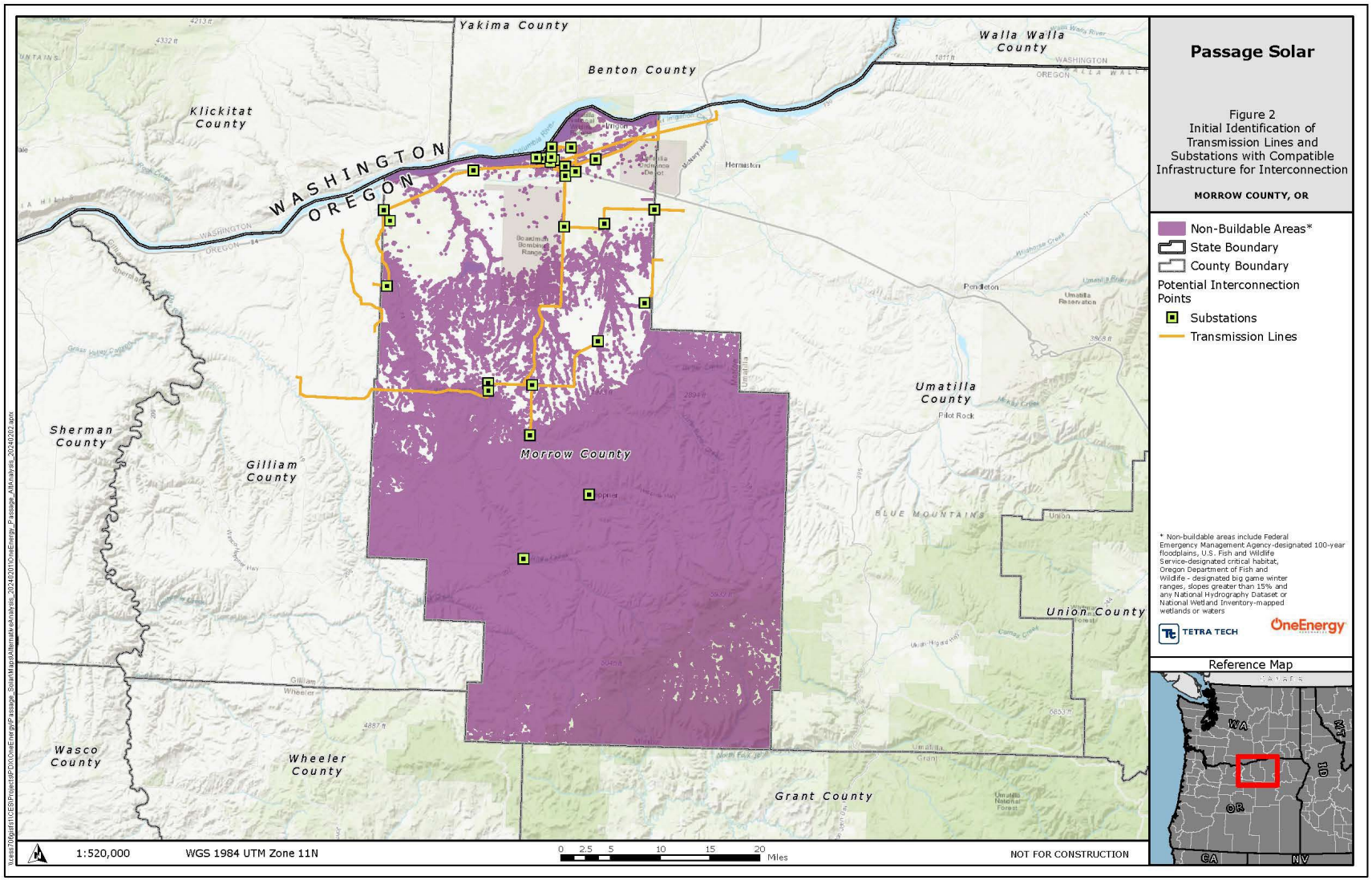


Figure 1: Regional Context Map


Yakima County
Benton County
Walla Walla County
Klickitat County
WASHINGTON
OREGON
Hermiston
Pendleton
Umatilla County
Pilot Rock
Sherman County
Gilliam County
Morrow County
BLUE MOUNTAINS
Union County
Wasco County
Wheeler County
Grant County
Passage Solar
Figure 2
Initial Identification of Transmission Lines and Substations with Compatible Infrastructure for Interconnection
MORROW COUNTY, OR
Non-Buildable Areas*
State Boundary
County Boundary
Potential Interconnection Points
Substations
Transmission Lines
* Non-buildable areas include Federal Emergency Management Agency-designated 100-year floodplains, U.S. Fish and Wildlife Service-designated critical habitat, Oregon Department of Fish and Wildlife - designated big game winter ranges, slopes greater than 15% and any National Hydrography Dataset or National Wetland Inventory-mapped wetlands or waters
TETRA TECH
OneEnergy
Reference Map
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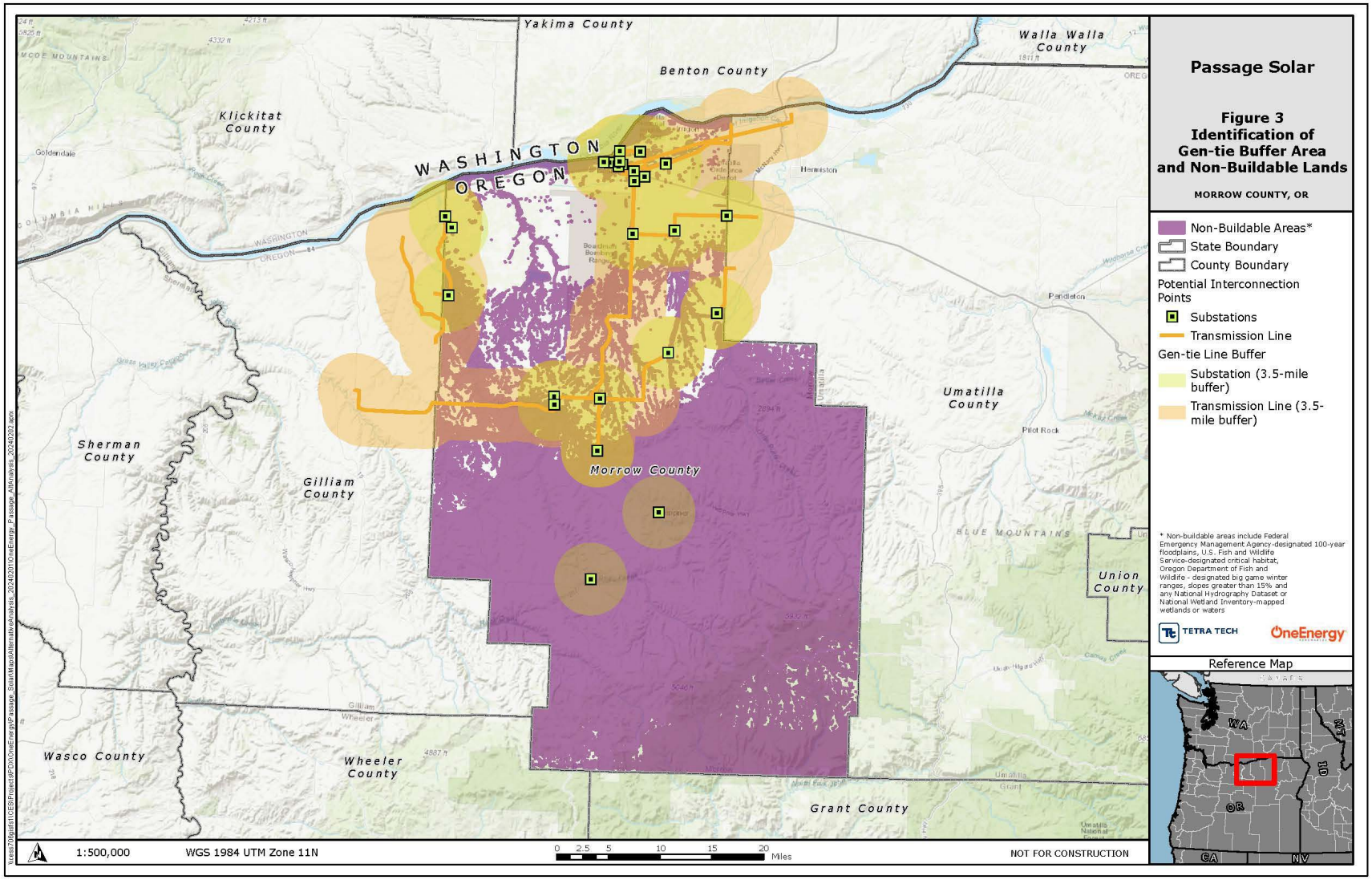
WGS 1984 UTM Zone 11N
0 2.5 5 10 15 20 Miles
NOT FOR CONSTRUCTION


Yakima County
Benton County
Walla Walla County
Klickitat County
WASHINGTON
OREGON
Umatilla County
Sherman County
Gilliam County
Morrow County
Union County
Wasco County
Wheeler County
Grant County
Passage Solar
Figure 3
Identification of Gen-tie Buffer Area and Non-Buildable Lands
MORROW COUNTY, OR
Non-Buildable Areas*
State Boundary
County Boundary
Potential Interconnection Points
Substations
Transmission Line
Gen-tie Line Buffer
Substation (3.5-mile buffer)
Transmission Line (3.5-mile buffer)
* Non-buildable areas include Federal Emergency Management Agency-designated 100-year floodplains, U.S. Fish and Wildlife Service-designated critical habitat, Oregon Department of Fish and Wildlife - designated big game winter ranges, slopes greater than 15% and any National Hydrography Dataset or National Wetland Inventory-mapped wetlands or waters
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3.0 Analysis/Results

3.1 Non-Resource Lands

If the Project were located on non-resource land, it would avoid the need for a Goal 3 exception. OAR 660-004-0020(2)(b)(B)(i) and (iii) asks the applicant:

- "Can the proposed use be reasonably accommodated on non-resource land that would not require an exception, including increasing the density of uses on non-resource land? If not, why not?"
- "Can the proposed use be reasonably accommodated inside an urban growth boundary? If not, why not?"

"Resource Land" is defined under OAR 660-004-0005(2) as land subject to one or more of the statewide goals listed in OAR 660-004-0010(1)(a) through (g) except subsections (c) and (d). This includes Agricultural Lands (subpart a), Forest Lands (subpart b), Estuarine Resources (subpart e), Coastal Shorelands (subpart f), and Beaches and Dunes (subpart g). Per OAR 660-033-0020(1)(c), Agricultural Land does not include land within acknowledged urban growth boundaries (UGB). Therefore, non-resource land in Morrow County would include land within a UGB or land not located on Agricultural Lands or Forest Lands.

3.1.1 Land Within an Urban Growth Boundary

Using ArcMap, a query was made to find all 750-acre or larger vacant areas located within a UGB and intersect with the Gen-tie Line Buffer Area (i.e., within 3.5 miles of an existing 115-kV transmission line or existing substation with available capacity). There are five UGBs in Morrow County associated with the cities of Boardman, Ione, Irrigon, Heppner, and Lexington, as shown on Figure 4. No areas were identified within a UGB in Morrow County that met the minimum acreage requirement and contained vacant land. Therefore, the proposed use cannot reasonably be accommodated within an urban growth boundary in Morrow County.

3.1.2 Land Not Located on Agricultural Lands or Forest Lands

Agricultural Land is defined under OAR 660-033-0020(1)(a) as including:

(A) Lands classified by the U.S Natural Resource Conservation Service (NRCS) as predominately Class I-VI soils in Eastern Oregon;

(B) Land in other soil classes that is suitable for farm use as defined in ORS 215.203(2)(a)[2], taking into consideration soil fertility; suitability for grazing; climatic conditions;

[2] "Farm use" under ORS 215.203(2)(a) means the current employment of land for the primary purpose of obtaining a profit in money by raising, harvesting and selling crops or the feeding, breeding, management and

existing and future availability of water for farm irrigation purposes; existing land use patterns; technological and energy inputs required; and accepted farming practices; and

(C) Land that is necessary to permit farm practices to be undertaken on adjacent or nearby agricultural lands.

Similarly, the Morrow County Zoning Ordinance (MCZO) Section 1.030 defines "Agricultural Land" as "lands classified by the U.S. Soil Conservation Service (SCS) as predominately Class I-VI soils, and other lands in different soil classes that are suitable for farm use taking into consideration soil fertility, suitability for grazing and cropping, climatic conditions, existing and future availability of water for farm irrigation purposes, existing land use patterns, technological and energy inputs required, and accepted farming practices. Lands in other classes that are necessary to permit farm practices to be undertaken on adjacent or nearby lands shall be included as agricultural land in any event."

"Forest Lands" are defined under OAR 660-006-0005(7) as "those lands acknowledged as forest lands, or, in the case of a plan amendment, forest lands shall include: (a) Lands that are suitable for commercial forest uses, including adjacent or nearby lands which are necessary to permit forest operations or practices; and (b) Other forested lands that maintain soil, air, water and fish and wildlife resources."

A query was made to find vacant areas (including multiple contiguous parcels owned by the same landowner) 750 acres or more in size located outside a UGB, not within Agricultural Lands or Forest Lands, and intersecting with the Gen-tie Line Buffer Area. To simplify this query, the analysis investigated lands based on their zoning designation, assuming that all lands located within the EFU, Small Farm (SF), or Forest Use (FU) zones would qualify as Agricultural Lands or Forest Lands. However, per the Project's siting criteria, the alternative site must also be located within a zoning district that allows photovoltaic solar energy facilities as a use. This includes the PI, RLI, ALI, MG, RRI, and SAI zones.

Figure 5 shows the non-resource lands with compatible zoning in Morrow County (i.e. PI, RLI, ALI, MG, RRI, and SAI zones) overlaid by the UGBs and the Gen-tie Line Buffer. Few parcels (including multiple contiguous parcels owned by the same landowner) were identified as having a minimum 750 acre outside the Non-Buildable layer and zoned PI, RLI, ALI, MG, RRI, or SAI zones, and

sale of, or the produce of, livestock, poultry, fur-bearing animals or honeybees or for dairying and the sale of dairy products or any other agricultural or horticultural use or animal husbandry or any combination thereof. "Farm use" includes the preparation, storage and disposal by marketing or otherwise of the products or by-products raised on such land for human or animal use. "Farm use" also includes the current employment of land for the primary purpose of obtaining a profit in money by stabling or training equines including but not limited to providing riding lessons, training clinics and schooling shows. "Farm use" also includes the propagation, cultivation, maintenance and harvesting of aquatic, bird and animal species that are under the jurisdiction of the State Fish and Wildlife Commission, to the extent allowed by the rules adopted by the commission. "Farm use" includes the on-site construction and maintenance of equipment and facilities used for the activities described in this subsection. "Farm use" does not include the use of land subject to the provisions of ORS chapter 321, except land used exclusively for growing cultured Christmas trees as defined in subsection (3) of this section or land described in ORS 321.267 (Lands not eligible for special assessment) (3) or 321.824 (Lands not eligible for special assessment) (3).

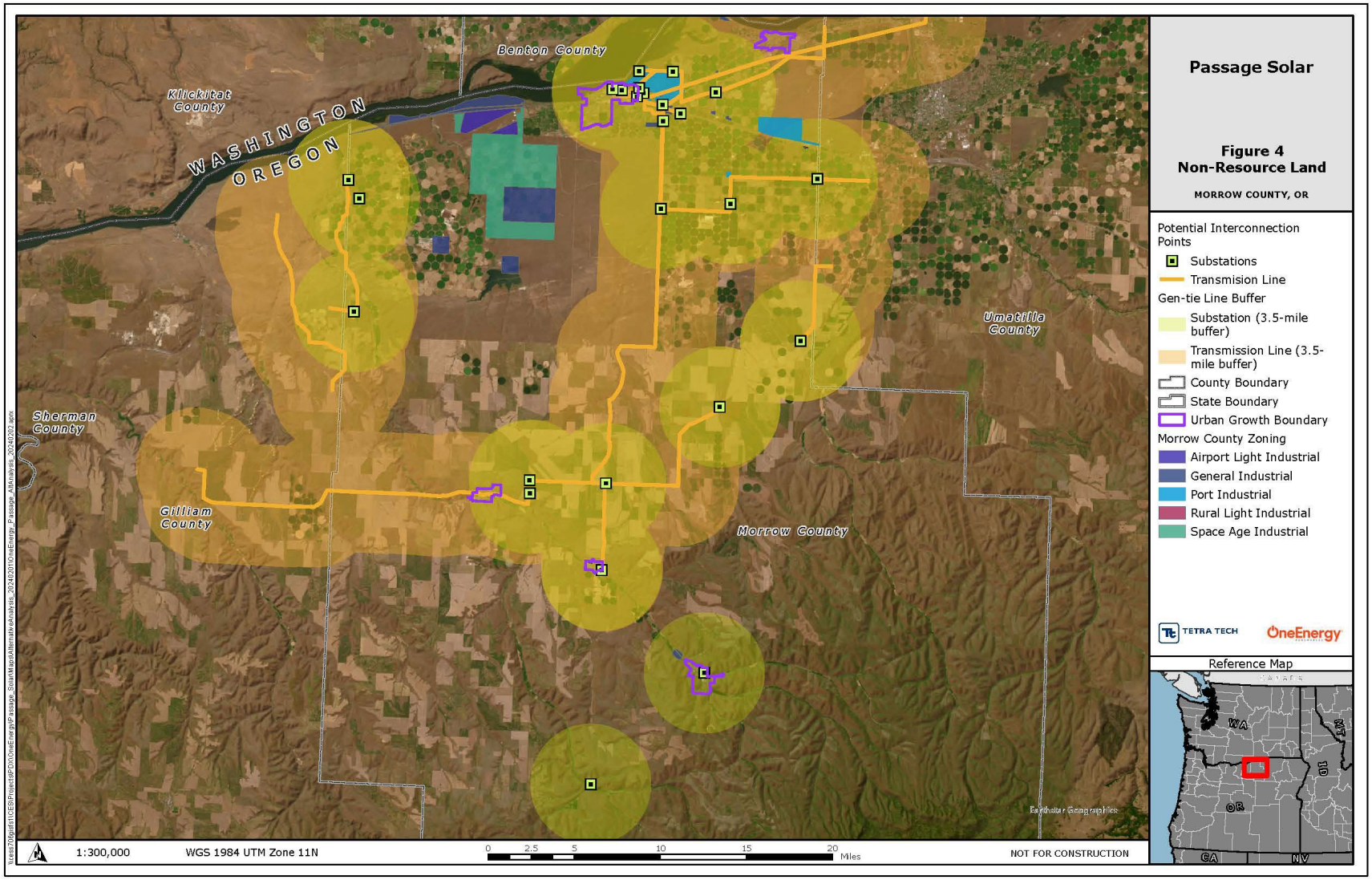
intersecting with the Gen-tie Line Buffer. There are two large areas zoned PI in Morrow County that intersect with the Gen-tie Line Buffer, one east of the Boardman UGB (i.e. Port of Morrow) and one located in the former Umatilla Army Chemical Depot. Further investigation of the PI zone east of Boardman resulted in no contiguous vacant areas that met the minimum 750 acreage criteria.

One alternative site was identified in the PI zone at the former Umatilla Army Chemical Depot as potentially meeting the minimum acreage, intersecting with the Gen-tie Line Buffer Area, and not being constrained by the Non-buildable layer. This site is owned by Columbia Development Authority (CDA) and includes parcels: 04N26E000000104 and 04N27E000000126. See Figure 5 for a map of these two parcels and their associated zoning. Although this site is zoned PI (which conditionally allows for solar development) it is constrained by the following:

- Parcel 04N26E000000104 includes 282 acres but is partially constrained by existing development (see Figure 5). Therefore, only 220 acres would be available for development.
- Parcel 04N27E000000126 includes 1,567 acres; however, 959 acres of parcel is subject to an overlay district called "UMCD PI Limited Use Overlay Zone" which includes historic roads and bunkers used as part of the Army Depot. Per MCZC Section 3.120, this overlay zone limits land disturbance activities. Commercial solar power generation is listed as a conditional use in this overlay zone; however, in the Umatilla Chemical Depot Redevelopment Plan (UMADRA 2010), it describes this restricted overlay zone as being limited to the utilization of the existing/historic igloos for storage and that all traffic in the restricted overlay zone should be restricted to the existing roads.

Avoiding the areas of this alternative site that are either constrained by existing infrastructure (i.e. not vacant) or are within the historic igloos area (i.e. the limited use overlay zone) would results in less than the required 750 minimum acre area to qualify as a feasible alternative site. In addition, the Applicant coordinated with CDA in 2023 to explore the possibility of developing solar within the former Umatilla Army Chemical Depot site. CDA indicated that it was not interested in solar development within the Port Industrial or Depot Industrial zoned areas of the Umatilla Army Depot site as the redevelopment plan intended for those area to be used for light and heavy industrial uses (Debbie Pedro, personal communication, Sept. 25, 2023). Therefore, OneEnergy considers CDA as a non-willing landowner uninterested in negotiating a lease for solar development further disqualifying it as a feasible alternative site.

Based on the results of this analysis, the proposed use cannot reasonably be accommodated on non-resource lands in Morrow County and meet the siting criteria.


Passage Solar
Figure 4
Non-Resource Land
MORROW COUNTY, OR
Potential Interconnection Points
Substations
Transmision Line
Gen-tie Line Buffer
Substation (3.5-mile buffer)
Transmission Line (3.5-mile buffer)
County Boundary
State Boundary
Urban Growth Boundary
Morrow County Zoning
Airport Light Industrial
General Industrial
Port Industrial
Rural Light Industrial
Space Age Industrial
TETRA TECH
OneEnergy
Reference Map
Benton County
Klickitat County
WASHINGTON
OREGON
Umatilla County
Sherman County
Gilliam County
Morrow County
1:300,000
WGS 1984 UTM Zone 11N
0 2.5 5 10 15 20
Miles
NOT FOR CONSTRUCTION


Passage Solar
Figure 5
Possible Non-Resource Land Alternative Site in PI Zone
MORROW COUNTY, OR
Non-Resource Land: Alt. Site 1 CDA
Non-Buildable Areas*
MCD PI Limited Use Overlay Zone
Taxlot Boundary
Morrow County Zoning
Port Industrial
Rural Light Industrial
* Non-buildable areas include Federal Emergency Management Agency-designated 100-year floodplains, U.S. Fish and Wildlife Service-designated critical habitat, Oregon Department of Fish and Wildlife - designated big game winter ranges, slopes greater than 15% and any National Hydrography Dataset or National Wetland Inventory-mapped wetlands or waters
TETRA TECH
OneEnergy
Reference Map
Morrow
Boardman
1:20,000
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Miles
NOT FOR CONSTRUCTION

3.2 Resource Lands Not Requiring a Goal 3 Exception

The next step of the analysis was to evaluate whether the Project could be sited within resource land without requiring an exception. Per OAR 660-033-0130(38), the following restrictions are placed on photovoltaic solar power generation facilities cited in agricultural lands:

> *(g) For high-value farmland described at ORS 195.300(10), a photovoltaic solar power generation facility shall not use, occupy, or cover more than 12 acres unless:*
>
> *….*
>
> *(i) For arable lands, a photovoltaic solar power generation facility shall not use, occupy, or cover more than 20 acres…*
>
> *….*
>
> *(j) For nonarable lands, a photovoltaic solar power generation facility shall not use, occupy, or cover more than 320 acres…..*

Per OAR 660-033-0130(38)(k), an exception to the acreage and soil thresholds cited in subsections (g), (i), and (j) above may be taken pursuant to ORS 197.732 and OAR chapter 660, division 4.

As the Project would require over 750 acres, it would require an exception from Goal 3 even if it were sited primarily on non-arable lands. Therefore, all alternative sites located on agricultural/resource lands, regardless of the underlying high-value farmland designations or soil classifications (arable or non-arable), would require a Goal 3 exception.

4.0 Conclusion

The results of the analysis show that there are no sites within Morrow County that meet the Project's defined siting criteria and would not require a new goal exception. Thus, there are no sites within the alternatives analysis study area that can reasonably accommodate the Project without a goal exception.

5.0 References

BPA (Bonneville Power Administration). 2017. Interconnection System Impact Study (ISIS), G0532 (100 MW). January 31, 2017. Critical Energy Infrastructure Information. Controlled Distribution.

Homeland Infrastructure Foundation Level Database (HIFLD). 2021. Electric Power Transmission Lines Dataset. Downloaded from: https://hifld-geoplatform.opendata.arcgis.com/datasets/geoplatform::electric-power-transmission-lines/about on Dec. 23, 2021.

HIFLD. 2022. Electric Substations Dataset. Downloaded from: https://hifld-geoplatform.opendata.arcgis.com/datasets/electric-substations-/about on February 9, 2022.

Morrow County. 2018. Planning Commission Findings of Fact, Comprehensive Plan Amendment Request, AC-121-18, Associated with Conditional Use Request CUP-N-331. Applicant: OE Solar 1, LLC. Available at: https://www.co.morrow.or.us/sites/default/files/fileattachments/planning/page/9231/exceptions_element_-_harp_solar_project.pdf

Oregon Water Resources Department. 1977. Permit: S 41945. Available here: https://apps.wrd.state.or.us/apps/wr/wrinfo/wr_details.aspx?snp_id=144780

UMADRA (Umatilla Army Depot Reuse Authority). 2010. Section A. Redevelopment Plan, Part 1: Redevelopment and Implementation Strategy. July 29, 2010. Available at: Microsoft Word - Section A_PI_RdvPlan_final_rev1.doc (umadra.com)

PRELIMINARY FINDINGS OF FACT
CONDITIONAL USE REQUEST
CUP-N-364-24
ASSOCIATED WITH
COMPREHENSIVE PLAN AMENDMENT REQUEST
AC-153-24

REQUEST: This request is to allow by conditional use the construction and operation of a 120-megawatt Solar Photovoltaic energy generating facility on up to 753-acres of land zoned for Exclusive Farm Use. The approval of this CUP is dependent upon the approval of AC-153-24, which allows the applicant to take an exception to Statewide Land Use Planning Goal 3- Agricultural Lands.

APPLICANT:
Passage Solar OR, LLC (OneEnergy Development, LLC) a wholly owned subsidiary of OneEnergy Development, LLC
2003 Western Ave
Suite 225
Seattle, WA 98121

APPLICANT CONTACT:
Elaine Albrich
Davis Wright Tremaine, LLP
1300 SW Fifth Avenue
Suite 2400
Portland, OR 97201

PROPERTY OWNERS:
Timothy and Shannon Rust Living Trust
77252 Mader Rust Lane
Echo, OR 97826

Shannon Rust Share
Frank and LaVonne Mader Living Trust
77252 Mader Rust Lane
Echo, OR 97826

Clarkston Development Company
1836 NW Boulevard
Coeur d'Alene, ID 83814

PROPERTY DESCRIPTION:
03N27; Tax Lot 1200 & 02N27; Tax Lot 100

PROPERTY LOCATION:
Project area comprises up to 753-acres of a ±5,820-acre tract located on the Morrow-Umatilla County border, approximately ±17 miles southeast of Hermiston and ±22 miles southeast of Boardman.

I. BACKGROUND INFORMATION:

The proposed Passage Solar project is a 120-megawat photovoltaic (PV) energy generation facility that is planned to occupy up to 753-acres of the ±5,820-acre project tract. The tract is zoned Exclusive Farm Use (EFU) and is located on the Morrow-Umatilla County boarder, entirely within Morrow County. The proposed solar panel array will utilize a single axis tracking system that will rotate the solar PV panels to follow the path of the sun for maximum energy output. In addition to the solar panels, the approval of this application will allow for the construction and operation of a Substation on approximately 0.25 acres of the project site, a single-story Operations and Maintenance (O&M) Building, a graveled parking area, a Battery Energy Storage System (BESS), and limited road infrastructure to provide access to the site.

Passage Solar will interconnect the onsite substation to the Umatilla Electric Cooperative's (UEC) Oregon Trail Substation via a 3.5-mile above-ground transmission line. The necessary transmission line is not included in the proposal and must be permitted as a separate Administrative Land Use Decision. MCZO and Oregon state law require the approval of a Goal 3 exception for solar projects that use more than 12 acres of High-Value Farmland or more than 20 acres of Arable Land. The entire Passage Solar project site is located on arable land, and ±152.9 acres of the project site is considered to be high value farmland; therefore, a Goal 3 exception is required, and is requested concurrently with this Conditional Use Permit Application.

II. APPROVAL CRITERIA:

The Applicant has filed under the Morrow County Zoning Ordinance (MCZO), ARTICLE 3, USE ZONES, Section 3.010 Exclusive Farm Use Zone. Section 3.010 includes REQUIREMENTS FOR APPROVAL which are listed below in **bold type**, followed by a response in standard type:

Summary of applicable MCZO Sections:

- MCZO Section 3.010. Exclusive Farm Use, EFU Zone
- MCZO Section 3.200. Significant Resource Overlay Zone, SRO
- MCZO Article 4 Supplementary Provisions
- MCZO Article 6 Conditional Uses

Morrow County, at the time of application submittal, has not finalized the adoption of several updated provisions of ORS 215.446 and OAR 660-033-0130(38) related to the siting of solar energy generating facilities. Where state law is inconsistent with the MCZO at the time of submittal, state law prevails and has been incorporated into the decision-making criteria as applicable. These provisions are identified below.

MORROW COUNTY ZONING ORDINANCE

MCZO Section 3.010. Exclusive Farm Use, EFU Zone.

MCZO 3.010(C) Conditional Uses.
The following uses are permitted subject to county review, any specific standards for the use set forth in Section D, Article 6, the general standards for the zone, and any other applicable standards and review process in the ordinance:

24. Photovoltaic solar power generation facilities as commercial utility facilities for the purpose of generating power for public use by sale subject to Subsection K.3.

Finding: The Project is a solar photovoltaic generation Project which will operate as a "commercial utility facility" and interconnect with the regional power grid. It is therefore allowed as a conditional use in the EFU zone.

MCZO 3.010(K) Commercial Facilities for Generating Power

3. Photovoltaic Solar Power Generation Facility. A proposal to site a photovoltaic solar power generation facility shall be subject to the following definitions and provisions:

a. "Arable land" means land in a tract that is predominantly cultivated or, if not currently cultivated, predominantly comprised of arable soils.

Finding: The Project Tract is predominately cultivated and therefore the Project Area Extent is considered arable land.

b. "Arable soils" means soils that are suitable for cultivation as determined by the governing body or its designate based on substantial evidence in the record of a local land use application, but "arable soils" does not include high-value farmland soils described at ORS 195.300(10) unless otherwise stated.

Finding: Based on the definition of non-arable soils below (which states non-arable soils are NRCS Class V-VIII, the Applicant is considering "arable soils" to mean soils with a NRCS Class I-IV. Table 2 of the Applicant's Soils Analysis identifies 745.3 acres of Class I-IV soils within the Project Area Extent. However, the definition states that arable soils "do not include high-value farmland soils." There are 152.9 acres of high-value farmland soils within the Project Area Extent, therefore the Project Area Extent has 596.8 acres of arable soils, excluding those already designated as HVF.

OAR 660-033-0130(38)(c) "Dual-use development" means developing the same area of land for both a photovoltaic solar power generation facility and for farm use.

Finding: The Applicant is not currently proposing dual-use development; however the Applicant has noted that they will continue to look for dual-use opportunities to allow the land to be used for grazing purposes.

c. "Nonarable land" means land in a tract that is predominantly not cultivated and predominantly comprised of nonarable soils.

d. "Nonarable soils" means soils that are not suitable for cultivation. Soils with an NRCS agricultural capability class V-VIII and no history of irrigation shall be considered nonarable in all cases. The governing body or its designate may determine other soils, including soils with a past history of irrigation, to be nonarable

based on substantial evidence in the record of a local land use application.

Finding: The Project Tract is predominately cultivated therefore the land on the Project Tract cannot be considered "nonarable land."

e. **"Photovoltaic solar power generation facility" includes, but is not limited to, an assembly of equipment that converts sunlight into electricity and then stores, transfers, or both, that electricity. This includes photovoltaic modules, mounting and solar tracking equipment, foundations, inverters, wiring, storage devices and other components. Photovoltaic solar power generation facilities also include electrical cable collection systems connecting the photovoltaic solar generation facility to a transmission line, all necessary grid integration equipment, new or expanded private roads constructed to serve the photovoltaic solar power generation facility, office, operation and maintenance buildings, staging areas and all other necessary appurtenances. For purposes of applying the acreage standards of this section, a photovoltaic solar power generation facility includes all existing and proposed facilities on a single tract, as well as any existing and proposed facilities determined to be under common ownership on lands with fewer than 1320 feet of separation from the tract on which the new facility is proposed to be sited. Projects connected to the same parent company or individuals shall be considered to be in common ownership, regardless of the operating business structure. A photovoltaic solar power generation facility does not include a net metering project established consistent with ORS 757.300 and OAR chapter 860, division 39 or a Feed-in-Tariff project established consistent with ORS 757.365 and OAR chapter 860, division 84.**

Finding: As further described in Section 2, the Applicant proposes to construct and operate a solar PV generation project sized up to 120 MW. Staff finds that the Project, as proposed, qualifies as a "photovoltaic solar power generation facility" under this rule. Further, staff finds that the review and approval of the Project is solely within the County's jurisdiction based on the fact that the Project will not permanently occupy more than 240 acres of high-value farmland or 2,560 acres of arable land.

f. **For high-value farmland described at ORS 195.300(10), a photovoltaic solar power generation facility shall not preclude more than 12 acres from use as a commercial agricultural enterprise unless an exception is taken pursuant to ORS 197.732 and OAR chapter 660, division 4 or the requirements of paragraph (7) are met. The governing body or its designate must find that:**

Finding: The project extent includes 152.9 acres of impacts to high-value farmland Applicant is pursuing a Goal 3 exception in conjunction with this CUP.

(1) The proposed photovoltaic solar power generation facility will not create unnecessary negative impacts on agricultural operations conducted on any portion of the subject property not occupied by project components. Negative impacts could include, but are not limited to, the unnecessary construction of roads dividing a field or multiple fields in such a way that creates small or isolated pieces of property that are more difficult to farm, and placing photovoltaic solar power generation facility project components on lands in a manner that could disrupt common and accepted farming practices;

Finding: For purposes of applying this standard, Applicant defines the "subject property" as the ±5,820-acre Project Tract. The agricultural operations and accepted farming practices on the majority of the Project Tract are defined as unirrigated agriculture, however, there are currently three and a half pivots being used for irrigated agriculture located outside of the Project Area Extent. Applicant maintains that the Project will not create unnecessary negative impacts on agricultural operations and farm access around the solar project will be maintained. As further described in the Landowner Support Letter (Attachment B), the Landowners will continue to utilize the adjacent land for agriculture. The Project layout (Attachment A) also shows that the Project will not result in small, irregular shaped or isolated pieces of property. Beyond the fenced project footprint, and the gen-tie line, no roads or other facilities will be constructed. The remainder of the Project Tract can continue to be farmed using current accepted farming practices.

Applicant has not submitted an agricultural mitigation plan to supplement the requested Goal 3 exception. Staff recommends a condition of approval requiring the applicant to evaluate the impacts to the agricultural and local community resulting from the removal of ±753 acres of farmland from agricultural production.

(2) The presence of a photovoltaic solar power generation facility will not result in unnecessary soil erosion or loss that could limit agricultural productivity on the subject property. This provision may be satisfied by the submittal and county approval of a soil and erosion control plan prepared by an adequately qualified individual, showing how unnecessary soil erosion will be avoided or remedied and how topsoil will be stripped, stockpiled and clearly marked. The approved plan shall be attached to the decision as a condition of approval;

Finding: The Project will not result in unnecessary soil erosion or soil loss that would limit agricultural productivity on the remainder of the Project Tract. During construction limited grading would occur across the Project Area. Grading typically generates fugitive dust emissions, which shall be mitigated through the implementation of best management practices such as watering or other fugitive dust-abatement measures, traffic speeds shall be limited to 25 miles per hour, and erosion-control measures shall be implemented to limit deposition of silt to roadways. All civil work shall be conducted in compliance with the Project's Erosion and Sediment Control Plan, required as part of the Project's NPDES Construction

Stormwater Permit issued by the Department of Environmental Quality. The applicant shall work with Morrow County Public Works to ensure all grading results in minimal fugitive dust generation and meets standard code for stormwater and sediment erosion control. After construction, the areas under the panels shall be planted with a native grass seed mix in accordance with the Vegetation and Weed Management Plan, these grasses will help reduce soil erosion.

Applicant provided a general statement that any water required during construction for dust control or during operation for panel cleaning will be provided either from a properly licensed existing water supply from the property owner or purchased offsite and brought in with water trucks. During operations, the Applicant may be required to wash or clean the panels as needed, typically one time per year, based on weather events. Staff recommends a condition of approval requiring the applicant to identify the specific anticipated water usage and sources for the project's water needs.

With these mitigation measures included as recommended conditions of approval, staff finds that this criterion can be met.

(3) Construction or maintenance activities will not result in unnecessary soil compaction that reduces the productivity of soil for crop production. This provision may be satisfied by the submittal and county approval of a plan prepared by an adequately qualified individual, showing how unnecessary soil compaction will be avoided or remedied in a timely manner through deep soil decompaction or other appropriate practices. The approved plan shall be attached to the decision as a condition of approval;

Finding: Construction and maintenance of the Project is not anticipated to result in unnecessary soil compaction that reduces the productivity of the remaining Project Tract that will continue to be farmed. Construction and maintenance will be confined to the Project Area within the Project Area Extent. Additionally, the Applicant shall develop an Erosion and Sediment Control Plan once the Site Plan is finalized, outlining further actions and best management practices to prevent unnecessary soil compaction and erosion during construction. Staff finds that this criterion can be met.

(4) Construction or maintenance activities will not result in the unabated introduction or spread of noxious weeds and other undesirable weed species. This provision may be satisfied by the submittal and county approval of a weed control plan prepared by an adequately qualified individual that includes a long-term maintenance agreement. The approved plan shall be attached to the decision as a condition of approval;

Finding: Applicant has submitted a preliminary Vegetation and Weed Management Plan (Attachment L) identifying the measures proposed to prevent and reduce the introduction or spread of noxious weeds on the Project Site. Staff recommends a

condition of approval requiring final approval of the document by the County Weed Supervisor. Staff finds that this criterion is met.

OAR 660-033-0130(38)(h)(E) Except for electrical cable collection systems connecting the photovoltaic solar generation facility to a transmission line, the project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(a);

Finding: OAR 660-033-0020(8)(a) refers to "Irrigated and classified prime, unique, Class I or Class II" or "Not irrigated and classified prime, unique, Class I or Class II". Additionally, if outside the Willamette Valley, this definition includes tracts growing specified perennials identified in the OAR. As identified in the Soils Analysis (Attachment C), the Project Area Extent does not include any soils that fit this definition.

(5) The project is not located on high-value farmland soils unless it can be demonstrated that:
- **(a) Non high-value farmland soils are not available on the subject tract;**
- **(b) Siting the project on non high-value farmland soils present on the subject tract would significantly reduce the project's ability to operate successfully; or**
- **(c) The proposed site is better suited to allow continuation of an existing commercial farm or ranching operation on the subject tract than other possible sites also located on the subject tract, including those comprised of non high-value farmland soils; and**

Finding: As identified in the soils map provided in Attachment C, HVF soils are located throughout the Project Area Extent. A total of 159.2 acres of HVF soils will be impacted. Avoiding HVF soils altogether would require an irregularly shaped layout, which would result in greater impacts and less project efficiency. Additionally, the proposed layout would create small irregularly shaped patches of HVF, which would not be accessible to the Landowners for farming due to their small size and lack of access. Staff finds that these criteria are met.

(6) A study area consisting of lands zoned for exclusive farm use located within one mile measured from the center of the proposed project shall be established and:
- **(a) If fewer than 48 acres of photovoltaic solar power generation facilities have been constructed or received land use approvals and obtained building permits within the study area, no further action is necessary.**
- **(b) When at least 48 acres of photovoltaic solar power generation have been constructed or received land use approvals and obtained building permits, either as a single project or as multiple facilities within the study area, the local government or its designate must find that the photovoltaic solar energy generation facility will not materially alter the stability of the overall land use pattern of the area. The stability of the land use pattern will be materially altered if the overall effect of**

existing and potential photovoltaic solar energy generation facilities will make it more difficult for the existing farms and ranches in the area to continue operation due to diminished opportunities to expand, purchase or lease farmland or acquire water rights, or will reduce the number of tracts or acreage in farm use in a manner that will destabilize the overall character of the study area.

Finding: As identified on the Morrow County Energy Explorer, Staff has determined that there are no other solar projects constructed or permitted within a one-mile study area from the Project Area Extent. Therefore, no further action is necessary.

(7) A photovoltaic solar generation facility may be sited on more than 12 acres of high-value farmland described in ORS 195.300(10)(f)(C) without taking an exception pursuant to ORS 197.732 and OAR chapter 660, division 4, provided the land
(a) Is not located within the boundaries of an irrigation district.
(b) Is not at the time of the facility's establishment, and was not at any time during the 20 years immediately preceding the facility's establishment, the place of use of a water right permit, certificate, decree, transfer order or ground water registration authorizing the use of water for the purpose of irrigation.
(c) Is located within the service area of an electric utility described in ORS 469A.052(2);
(d) Does not exceed the acreage the electric utility reasonably anticipates to be necessary to achieve the applicable renewable portfolio standard described in ORS 469A.052(3); and
(e) Does not qualify as high-value farmland under any other provision of law.

Finding: This provision does not apply to the subject application- a Goal 3 exception is required and has been requested concurrently with this Conditional Use Permit application.

g. For arable lands, a photovoltaic solar power generation facility shall not preclude more than 20 acres from use as a commercial agricultural enterprise unless an exception is taken pursuant to ORS 197.732 and OAR chapter 660, division 4. The governing body or its designate must find that:
(1) The project is not located on high-value farmland soils or arable soils unless it can be demonstrated that:
(a) Nonarable soils are not available on the subject tract;
(b) Siting the project on nonarable soils present on the subject tract would significantly reduce the project's ability to operate successfully; or
(c) The proposed site is better suited to allow continuation of an existing commercial farm or ranching operation on the subject tract than other

possible sites also located on the subject tract, including those comprised of nonarable soils;

Finding: The Project Tract is composed predominately of arable soils, with nonarable soils limited primarily to ridges and in gullies associated with the topographical features located to the north and west of the Project Area Extent. These areas are unsuitable for the Project because of the steeper terrain and because they are non-contiguous with limited area to fit the Project.

(2) No more than 12 acres of the project will be sited on high-value farmland soils described at ORS 195.300(10) unless an exception is taken pursuant to 197.732 and OAR chapter 660, division 4;

Finding: The Applicant is pursuing a Goal 3 exception pursuant to ORS 197.732 and OAR chapter 660, division 4 to exceed 12 acres of high value farmland therefore, this standard does not apply.

(3) A study area consisting of lands zoned for exclusive farm use located within one mile measured from the center of the proposed project shall be established and:

(a) If fewer than 80 acres of photovoltaic solar power generation facilities have been constructed or received land use approvals and obtained building permits within the study area no further action is necessary.

(b) When at least 80 acres of photovoltaic solar power generation have been constructed or received land use approvals and obtained building permits, either as a single project or as multiple facilities, within the study area the local government or its designate must find that the photovoltaic solar energy generation facility will not materially alter the stability of the overall land use pattern of the area. The stability of the land use pattern will be materially altered if the overall effect of existing and potential photovoltaic solar energy generation facilities will make it more difficult for the existing farms and ranches in the area to continue operation due to diminished opportunities to expand, purchase or lease farmland, acquire water rights or diminish the number of tracts or acreage in farm use in a manner that will destabilize the overall character of the study area; and

Finding: The Applicant referenced the Morrow County Energy Explorer, which was shared by the Morrow County Planning Department via email on January 30, 2023, and determined that there are no other solar projects constructed or permitted within a one-mile study area from the Project Area Extent. Therefore, no further action is necessary.

(4) The requirements of Subsections K.3.f(1), (2), (3), and (4) are satisfied.

Finding: These portions of the MCZO, mirrored off OAR 660-033-0130 (38)(h)(A-C) are addressed in this staff report, above and the applicant's narrative. Staff finds this criterion to be met.

i. The project owner shall sign and record in the deed records for the county a document binding the project owner and the project owner's successors in interest, prohibiting them from pursuing a claim for relief or cause of action alleging injury from farming or forest practices as defined in ORS 30.930(2) and (4).

Finding: It is recommended and listed as a Condition of Approval that the project owner shall sign and record with the Morrow County Clerk's Office, a Right to Farm Disclaimer within 30 days after the initiation of construction. Applicant shall provide a copy to the Morrow County Planning Department within those 30 days.

j. Nothing in this Section shall prevent the county from requiring a bond or other security from a developer or otherwise imposing on a developer the responsibility for retiring the photovoltaic solar power generation facility.

Finding: As further described in the Applicant's Decommissioning Plan (***Attachment N***), the Applicant proposes to provide financial assurance for 100% of the estimated costs of the decommissioning efforts at the later of i) ten years after the Project's Commercial Operation Date or ii) at the expiry of the Project's Power Purchase Agreement, which is not yet executed.

The financial assurance shall be in the form of a bond from an individual or entity engaged in the construction business, a surety bond, a corporate guarantee, a letter of credit issued by a financial institution, or a cash deposit. The amount of the financial assurance shall be based on a written estimate from a company with experience with such matters which sets forth such company's estimate of the cost of removing the solar facilities, net of their estimated salvage value. These provisions are recommended as a condition of approval.

OAR 660-033-0130(38)(k) An exception to the acreage and soil thresholds in subsections (g), (h), (i), and (j) of this section may be taken pursuant to ORS 197.732 and OAR chapter 660, division 4.23

Finding: The Applicant is pursuing a Goal 3 exception in conjunction with this CUP in order to comply with this subsection. Upon approval of the Goal 3, the Project will then have an exception to the acreage and soil thresholds in the noted subsections.

MCZO 3.010(M) Yards.

In an EFU Zone, the minimum yard setback requirements shall be as follows:

1. **The front yard setback from the property line shall be 20 feet for property fronting on a local minor collector or marginal access street ROW, 30 feet from a property**

line fronting on a major collector ROW, and 80 feet from an arterial ROW unless other provisions for combining accesses are provided and approved by the County.

2. **Each side yard shall be a minimum of 20 feet except that on corner lots or parcels the side yard on the street side shall be a minimum of 30 feet.**
3. **Rear yards shall be a minimum of 25 feet.**

Finding: As demonstrated in the Preliminary Site Plan (Attachment A), the Applicant proposes setbacks that meet or exceed these requirements. There are no public roads around the Project Tract. The Project will maintain a minimum setback of 25 feet around the perimeter of the Project Area that borders parcel boundaries of neighboring landowners. Staff finds these criteria are met.

4. **Stream Setback. All sewage disposal installations such as outhouses, septic tank and drain field systems shall be set back from the high-water line or mark along all streams and lakes a minimum of 100 feet, measured at right angles to the high-water line or mark. All structures, buildings, or similar permanent fixtures shall be set back from the high-water line or mark along all streams or lakes a minimum of 100 feet measured at right angles to the high-water line or mark.**

Finding: The Project does not require any sewage disposal installations. As demonstrated in the Applicant's Wetland Delineation Report, there are no streams within 100 feet of the Project Area Extent. This criterion is not applicable.

MCZO 3.010(N) Transportation Impacts.

1. **Traffic Impact Analysis (TIA). In addition to the other standards and conditions set forth in this section, a TIA will be required for all projects generating more than 400 passenger car equivalent trips per day. Heavy vehicles – trucks, recreational vehicles and buses – will be defined as 2.2 passenger car equivalents. A TIA will include: trips generated by the project, trip distribution for the project, identification of intersections for which the project adds 30 or more peak hour passenger car equivalent trips, and level of service assessment, impacts of the project, and, mitigation of the impacts. If the corridor is a State Highway, use ODOT standards. (MC-C-8-98)**

Finding: The applicant's planned transportation alternatives provide access to the site only via State Highways and/or Umatilla County Roads. Based on the prospective routes, there are no anticipated impacts to Morrow County roads resulting from the project's construction or operation. A Road Use Agreement (RUA) will be required as a condition of approval to mitigate any impacts to Morrow and/or Umatilla County roads, if applicable. The roadmasters of each county shall determine whether the RUA is required and shall provide final approval of the RUA if required.

During construction, major material and equipment will be delivered by tractor-trailers utilizing one of the existing private roads outlined in the Applicant's Transportation Plan (Attachment M). Throughout the 9 to18 month construction period, it is estimated that up to 40-50 deliveries per day would be required, largely occurring in the early stages of construction. Truck trips will include construction equipment and material deliveries. Daily construction traffic for

personnel is estimated to be up to 150 vehicles per day, and will include cars, light-duty trucks, and other personnel vehicles. In total, up to 200 roundtrips (50 delivery trips and 150 personnel trips) per day will be added to the background traffic patterns along the primary transportation route during construction.

Once operational, there will be limited traffic to and from the Project. Traffic will mostly be limited to maintenance crews for mowing and vegetation maintenance. Quarterly to yearly maintenance on the solar array components will most likely occur, along with site visits for any operational issues that arise during normal operation.

Based on these estimates, the project will not require a Traffic Impact Analysis (TIA).

MCZO Article 3.200 Significant Resource Overlay Zone, SRO

MCZO 3.200(C) Categories.

1. **Aggregate and Mineral Sites. The Zoning Map will be amended to apply the Overlay Zone to an approved mining site including an impact area. Mineral and aggregate sites approved in Morrow County may have an impact area of up to 1500 feet when permitted under certain Comprehensive Plan approval processes. Based on the Comprehensive Plan analysis development in an Overlay Zone impact area is subject to the following standards:**
    - ***b.*** **Uses Allowed Conditionally. Uses permitted conditionally in the underlying zone and conflicting uses shall be reviewed as conditional uses subject to the standards and criteria of the underlying zone and the criteria listed in paragraph 4 below.**
    - **d. Approval Criteria for proposed uses allowed conditionally in the impact area. The applicant must demonstrate compliance with the following criteria:**
        - **i. The proposed use will not interfere with or cause an adverse impact on lawfully established and lawfully operating mining operations;**
        - **ii. The proposed use will not cause or threaten to cause the mining operation to violate any applicable standards of this Section or County approval in the Comprehensive Plan;**
        - **iii. An application for a new noise or dust sensitive use shall demonstrate that the mining operation in the adjacent extraction area will maintain compliance with DEQ noise control standards and ambient air quality and emission standards as measured at the new noise or dust sensitive use. If deemed necessary by the Planning Director, the applicant for a new noise sensitive use shall submit an analysis prepared by an acoustical engineer, demonstrating that the applicable DEQ noise control standards are met or can be met by a specified date. If noise mitigation measures are necessary to ensure continued compliance on the part of the mining operation such measures shall be a condition of approval. If noise mitigation measures are inadequate to**

ensure compliance with DEQ noise control standards, the noise sensitive use shall not be approved within the impact area. (MC OR-1- 2013)

Finding: The Project Area Extent is within a large area with "widely scattered deposits of pumice or pumicite" (not identified as a Goal 5 resource), which encompasses the northern third of the County as shown in the Morrow County Comprehensive Plan Map of Aggregate and Mineral Resources effective October 1, 2013. However, there are no lawfully established and lawfully operating mining operations within a mile of the Project Area Extent. The closest Goal 5 Significant Site shown on the Aggregate and Mineral Resources Map is identified as 25-018, which is located to the north and is more than five miles from the Project Area Extent. Therefore, the Project will not impact any existing mining operations. It follows that the Project will not cause any mining operation to violate any regulations and therefore, the Applicant has demonstrated compliance with these criteria.

2. **Sensitive Bird Nesting Sites.**
   a. **Bald and golden eagle nest sites and communal roost sites shall be protected in accordance with U.S. Fish and Wildlife Service "Oregon-Washington Bald Eagle Management Guidelines."**
   b. **No development shall be allowed within a 300' radius of a sensitive bird nesting site. Exceptions to this standard shall be based on written recommendations from ODFW.**

Finding: As further described in the Wildlife and Habitat Survey Report (Attachment E), there are no sensitive bird nesting sites within half a mile of the Project (the radius of the survey area). The Wildlife and Habitat Survey Report included surveys for wildlife species listed by federal and state agencies as threatened, endangered and sensitive species, and raptor nests. During the surveys biologists observed one nest within the Project Area Extent, which was occupied by common ravens. Suitable nesting habitat for threatened, endangered and sensitive species as well as state sensitive species was limited within the Project Area to utility poles and towers, due to the highly limited presence of native vegetation to support nesting.

3. **Riparian Vegetation/Wetlands.**
   a. **Road construction within riparian zones shall be reviewed in cooperation with the responsible agency listed in Section 3.200.F. Road construction shall seek alternative methods whenever possible, to avoid disturbing wildlife; reducing the size of the riparian zone; and impacting water quality in the aquatic zone. New roads built along streams shall be avoided whenever possible unless no other alternative route is available. The safety and welfare of all road users shall be considered in determining the appropriate management strategy.**
   b. **All dwellings and other non-water dependent structures shall be set back a minimum of 100 feet from the high-water level of the stream or the water body reaches during normal seasonal run-off.**

c. Permanent vegetation removal within the area defined as the riparian zone shall retain 75% of all layers or stratas of vegetation (e.g., deciduous trees, shrubs, sedges, rushes and emergents).

Finding: No wetlands were delineated in the Project Area Extent (see Wetland Delineation Report, Attachment D).

4. Big Game Range Restrictions.

Finding: The Project Tract is not within an area identified as Big Game Range and this criterion is therefore not applicable.

5. Wildlife Habitat Zone.

a. Land areas incorporated in wildlife preserves, refuges or private or governmental game management areas or hunting preserves, or areas identified by the Wildlife Commission, State of Oregon or Agricultural /Wildlife Management Areas, both public or private owned and operated, and land areas providing habitat for wild, rare or endangered species listed by the Wildlife Commission, State of Oregon or by the Bureau of Sport Fisheries and Wildlife, United State Department of the Interior, upon state and federally owned land.

Finding: A site review for any potential impact to Federally endangered species was completed via the US Fish and Wildlife Service's ("USFWS") Information for Planning and Conservation (IPaC) Trust Resource Report and no critical habitats were found within the Project Area Extent (see USFWS IPaC Report, Attachment I). The Project Tract is not within any of the listed wildlife habitat zones and this criterion is therefore not applicable.

MCZO Article 4 Supplementary Provisions

MCZO 4.010 Access.

B. Access Permit Requirement.

Where access to or construction on a county road is needed, an access permit or right-of-way permit from Morrow County Public Works department is required subject to the requirements in this Ordinance. Where access to a state highway is needed, an access permit from ODOT is required as part of the land use application. Where access is needed to a road managed by the Forest Service or other entity, an access permit or other authorization from the appropriate entity shall be required as part of the land use application.

Finding: Access to the Project Area will be via a private road. The Applicant is currently working with nearby landowners to acquire access easements for one of the alternative accesses mentioned below and identified in the Transportation Plan (Attachment M). Access to the site shall be acquired prior to construction. This provision is included as a recommended Condition of Approval.

Alternative Access #1: The Project would be accessed via Madison Road. The private road heads west from Umatilla County Road 1356, which intersects with State Road 207 in Umatilla County.

Alternative Access #2: The Project would be accessed via a private road located in Morrow County with access from the south of the Project Tract. The private road intersects with State Road 207 at approximately 45°37'03.57" N 119°27'19.46" W.

The Applicant has been working directly with both Umatilla and Morrow County Roads Departments to identify any road use agreements or permit requirements. In addition, ODOT has been contacted by the Applicant to identify any additional road impacts and permits required by the access route. Once the Applicant acquires an access agreement, each respective jurisdiction will be notified. The Applicant shall comply with all applicable transportation standards, as noted in the recommended conditions of approval.

C. Emergency Vehicle Access.
It is the responsibility of the landowner to provide appropriate access for emergency vehicles at the time of development. A dead-end private street exceeding one hundred-fifty (150) feet in length shall have an adequate turn around facility approved by the appropriate Fire Marshal or, if the Fire Marshal fails to review the private street, approval by the Building Official or his designee.

Finding: The Applicant has consulted with the Boardman Fire Rescue District for the Project and will continue to coordinate pending a final site plan. Project roads will be sufficiently sized for emergency vehicle access in accordance with 2019 Oregon Fire Code Section 1204 and Appendix D, unless an exception is granted by the local Fire Marshall. Specifically, roads will be all-weather gravel, compacted and 20 feet wide, with an internal turning radius of 28 feet and less than 10 percent grade. Dead-end roads will be provided with turnaround provisions as detailed in the 2019 Oregon Fire Code, Appendix D. Access to the Project will be gated and locked with gates 20 feet in width with accessible hardware per fire department requirements.

Subsection 1204.4 of the 2019 Oregon Fire Code requires a non-combustible base be installed and maintained under and around the installation. In consultation with the Boardman Fire Rescue District, the Applicant has received approval for a variance from the requirements of subsection 1204.4 and will instead provide a 26-foot non-vegetative buffer around the perimeter of the Project as a firebreak (see Fire Code Variance Letter, Attachment O).

The Project will be equipped with fire protection equipment in accordance with the 2019 Oregon Fire Code. The equipment will meet National Electric Code and Institute of Electrical and Electronics Engineers standards and will not pose a significant fire risk.

The Project will be designed in accordance with the 2019 Oregon Fire Code. Accordingly, the Project will incorporate the minimum requirements that will

provide a reasonable degree of fire prevention and control to safeguard life, property, or public welfare from: (1) The hazards of fire and explosion arising from the storage, handling, or use of substances, materials, or devices; and (2) Conditions hazardous to life, property, or public welfare in the use or occupancy of buildings, structures, sheds, tents, lots, or premises.

During construction, there could be some risk of an accidental grass fire on the site. The following measures will be taken to prevent fires during construction:

- Equip construction vehicles with fire extinguishers, spark arrestors and heat shields, as appropriate.
- Establish roads before accessing the site to minimize vehicle contact with grass.
- Use diesel construction vehicles instead of gasoline vehicles, where feasible, to prevent potential ignition by catalytic converters.
- Prohibit vehicles from idling in grassy areas.
- Restrict the use of high temperature equipment in grassy areas.
- Install lightning protection measures to protect generators and other equipment.
- Install fire protection equipment in accordance with Oregon state fire code. Notify the local fire district of construction plans and access to Facility equipment.
- Provide mutual assistance in the case of fire in or around the Facility during construction.
- Monitor wildfire activity during Facility construction and operations and, if necessary, modify Facility activities, change the schedule, cease construction operations, or remove equipment.
- Prevent and control potential fires inside the Facility Area with trained staff who have 24-hour access to the site.

During both construction and operations, the Applicant will minimize the risk of accidental fire ignition at the project site by developing, implementing, and maintaining strict standard practices as an integral part of daily activities in compliance with National Fire Protection Association (NFPA) NFPA 1, NFPA 30, NFPA 70E, 29 CFR 1926, 29 CFR 1926 Subpart F and 29 CFR 1910 Subpart E. The Applicant will notify the Boardman Fire Rescue District of construction plans, provide the location of and access to the project structures, and provide assistance in the rare event of fire within or around the site boundary.

If selected, the Facility may use lithium-ion BESS technology. The BESS will store power in a series of modular, self-contained containers (typically steel) and would be designed in accordance with industry standard safety systems. The lithium-ion BESS will be composed of individual hermetically sealed cells and will not be opened on-site for any installation or maintenance purposes and will not have any wastewater discharges. Lithium-ion batteries do contain flammable liquids that can become heated during operation. Each lithium-ion BESS would contain a fire suppression system in accordance with Fire Code and NFPA standards, specifically NFPA 855 – “Standard for the Installation of Stationary Energy Storage Systems.” The BESS will include monitoring equipment and alarm systems with remote shut-off capabilities. Installation, maintenance, and

decommissioning of BESS components will be done in compliance with 49 CFR §173.185, which regulates the transportation of lithium-ion batteries. The Facility will use thoroughly proven, financeable batteries, inverters, and related equipment, including battery products that are listed or certified by UL, the industry's foremost safety and sustainability third-party standard.

D. Easements and Legal Access.
All lots must have access onto a public right of way. This may be provided via direct frontage onto an existing public road, a private roadway, or an easement. Minimum easement requirements to provide legal access shall be as follows:

1. **1000' or less, a minimum easement width of 20'**
2. **More than 1000', a minimum easement width of 40'**
3. **Parcels where 3 or more lots share an access (current or potential), a minimum easement of 60'.**

Finding: Access to the site is addressed under MCZO 4.010 (B), above. Legal access to the site shall be procured via access easements prior to construction. This provision is included as a recommended Condition of Approval. If easements can't be acquired in accordance with the proposed transportation routes, an alternative route may be approved in consultation with Umatilla and Morrow County Public Works.

H. Access Spacing Requirements for Development Accessing County Facilities. All developments shall have legal access to a County or public road. Except for interim access as provided in Section 4.010 H [Interim Access], access onto any County road in the unincorporated or incorporated urban area shall be permitted only upon issuance of an access permit upon demonstration of compliance with the provisions of the County road standards and the standards of Section 4.010. For County roadways designated as major collector or arterial in the Transportation System Plan, the standards in Table 4.010-2 apply for intersections created by a new public roadway, new private roadway or new private driveway. For County roadways designated as minor collectors or local access roads, intersections created by a new public roadway, new private roadway or new private driveway shall meet minimum County traffic safety and operational requirements, including sight distance, as determined by the County Engineer.

Finding: There are no new access points requested off County or public roads. Public access shall be established in accordance with MCZO 4.010 (D) prior to construction. All necessary access permits shall be granted by Morrow County, Umatilla County, and/or ODOT if necessary to provide legal access to the site.

MCZO 4.040 Off-Street Vehicle Parking Requirements.

Because vehicle parking facilities can occupy large amounts of land, they must be planned and designed carefully to use the land efficiently while maintaining the visual character of the community. At the time of construction, reconstruction, or enlargement of a structure, or at the time a use is changed in any zone, off-street parking space shall be provided as follows unless greater requirements are otherwise established. When the requirements are based on the number of employees, the number counted shall be those

working on the premises during the largest shift at peak season. Fractional space requirements shall be counted as a whole space. Off-street parking spaces may include spaces in garages, carports, parking lots, and/or driveways if vehicles are not parked in a vehicle travel lane (including emergency or fire access lanes), public right-of-way, pathway or landscape area. The County may allow credit for "on-street parking", as provided in Section 4.050. For uses not specified in Table 4.040-1, parking requirements shall be determined by the use in Table 4.040-1 found to be most similar in terms of parking needs.

Finding: During construction, sufficient space for storage of vehicles and materials and for personnel passenger vehicle parking will be provided. During operations, adequate space for parking up to four vehicles will be provided next to the Project substation.

MCZO Article 6 Conditional Uses

MCZO 6.020. General Criteria In judging whether or not a conditional use proposal shall be approved or denied, the Commission shall weigh the proposal's appropriateness and desirability, or the public convenience or necessity to be served against any adverse conditions that would result from authorizing the particular development at the location proposed and, to approve such use, shall find that the following criteria are either met or can be met by observance of conditions.

A. The proposal will be consistent with the Comprehensive Plan and the objectives of the Zoning Ordinance and other applicable policies and regulations of the County.

Finding: The County's adopted MCZO implements the County's adopted Comprehensive Plan goals and policies. The MCZO requires that an applicant for a commercial power generation facility on agricultural land evaluate potential adverse impacts on accepted farming practices, natural environments, and built environments and avoid, minimize, and mitigate impacts to the extent necessary. The Applicant demonstrates that the proposed Project will comply with all applicable MCZO criteria and standards and, in doing so, ensures that the Project is also consistent with the Comprehensive Plan goals and policies related. For example, the Project furthers the County's Goal 9, Goal 11, and Goal 13 policies, which provide:

- Economic Element (Goal 9)
    - General findings: "Comprehensive Plan Goals and Policies…need to outline the benefits of the energy sector and provide mechanisms to maintain and improve energy generation and movement in and through Morrow County."
    - Goal 3: "Diversify local businesses, industries and commercial activities and promote the economic growth and stability of the County."
    - Policy 3A: "To encourage local producers to new markets for local products and to seek out new products that are in demand in the marketplace and that can be produced locally."
- Public Facilities and Services Element (Goal 11)

- General Policies: “Programs should be continued to develop additional sources of electric and other power sources to assure adequate service to the County area and its projected growth.”

- Energy Conservation Element (Goal 13)
  - Findings: “Morrow County receives about 300 days of sunshine per year. Solar energy may be a very feasible source of energy.”
  - Policy 1: “To encourage renewable and/or efficient energy systems design, siting and construction materials in all new development and improvements in the County.”
  - Policy 2: “To conserve energy and develop and use renewable energy sources.”
  - Policy 3: “Encourage development of solar and wind resources.”
  - Policy 9: “The County will encourage development of alternative energy sources in County industries and businesses.”
  - Policy 15: “All plans should be directed toward energy conservation and should consider as a major determinant the existing and potential capacity of the renewable energy sources to yield useful energy output.
  - Renewable energy sources include water, sunshine, wind, geothermal heat and municipal, forest and farm waste.”

The County adopted specific standards in the MCZO to implement these applicable policies for commercial wind and solar PV energy systems. Further, the MCZO requires that an applicant evaluate potential adverse impacts on accepted farming practices, natural environments, and built environments and to avoid, minimize, and mitigate impacts to the extent necessary. The Applicant demonstrates that the proposed Project will comply with all applicable criteria and standards and, in doing so, further promote the development of renewable energy in the County. As such, Staff finds that the Project is consistent with the applicable Comprehensive Plan goals and policies.

C. **The proposal will not exceed carrying capacities of natural resources or public facilities.**

Finding: The Project will result in no air emissions and any wastewater will be discharged in accordance with County standards. The Project will not exceed resource or public facility carrying capacity given the Project’s limited impact on air, water, and land resources and the Project’s limited dependence on public facilities. Furthermore, the Applicant will comply with all applicable air, water, land, solid waste, and noise pollution standards, including obtaining an NPDES 1200 C permit, and proposes that such compliance be included as a condition of approval.

MCZO 6.025. Resource Zone Standards for Approval

A. In the Exclusive Farm Use zone a conditional use may be approved only when the County finds that the use will not:

1. **Force a significant change in accepted farm or forest use practices on surrounding lands devoted to farm or forest use; or**
2. **Significantly increase the cost of accepted farm or forest use practices on surrounding lands devoted to farm or forest use.**

Finding: The Project will be located on private property and will occupy a maximum of 753 acres of the Landowners' approximately 13,000 acres in Morrow and Umatilla County. The Landowners will continue to utilize land in all surrounding directions for their current farm uses. One of the Landowners has provided a letter of support (Attachment B).

For purposes of this analysis, Applicant considers a ¼ mile from the Project Area Extent as "surrounding lands." Within the defined surrounding lands, there are no accepted forest use practices. The accepted farm use practices include irrigated and dryland agriculture. Potential impacts from the Project on these ongoing operations is likely minimal, limited to potentially dust, weeds, and traffic during construction. During operation, the potential impact would likely be even more limited given the passive nature of the solar operation, with weed management being the likely potential impact. None of these potential impacts, however, would rise to the level of significant within the meaning of MCZO 6.025(A). Applicant has submitted a Vegetation and Weed Management Plan which shall receive final approval from the County Weed Supervisor prior to development. This is included as a recommended Condition of Approval.

Tilling, planting, and harvesting patterns will continue unchanged in the areas surrounding the Project. Given the nature and intensity of the existing farm uses and the isolated nature and minimal impacts associated with the Project's construction and operation, the County may conclude that the Project would not force a significant change in accepted farm practices on surrounding lands and, in turn, would also not significantly increase the cost of such practices.

The Applicant has agreed to reroute any private roads that would be affected by the Project in order to retain access to the Landowners' remaining land. The Project will not result in small, irregular shaped or isolated pieces of property. Beyond the fenced project footprint, and gen-tie line, no roads or other facilities will be constructed. The adjacent property will continue to be farmed using common farming practices. For these reasons, the Project will not force any change in accepted farm use practices on surrounding lands or increase the cost of those practices.

MCZO 6.030. General Conditions.
In addition to the standards and conditions set forth in a specific zone, this article, and other applicable regulations; in permitting a new conditional use or the alteration of an existing conditional use, the Commission may impose conditions which it finds necessary to avoid a detrimental impact and to otherwise protect the best interests of the surrounding area or the County as a whole. These conditions may include the following:

A. Limiting the manner in which the use is conducted including restricting the time an activity may take place and restraints to minimize such environmental effects as noise, vibration, air pollution, glare and odor.

Finding: During construction, the Applicant shall implement dust control measures using standard industry practices. Any noise associated with construction would be limited in duration and would typically only occur during daylight hours. There are few residences near the project, with none closer than 1 mile. The project is

situated atop a relative high point, with little impact on the nearby viewshed. A GIS viewshed analysis reveals that neither residences nor public roads fall into the 3-mile viewshed of the project. Therefore, any incidental glare or reflection would not affect these residences or travel corridors. A Forge Solar Glare Analysis has been completed to assess the impact of glare on airspace operations (Attachment K).

The Applicant conducted outreach to the Federal Aviation Administration ("FAA") and the U.S. Navy during due diligence. The Project was determined to not exceed notice criteria by the FAA Notice Criteria Tool, indicating that no hazard or obstruction was noted (see FAA Notice Criteria Tool Result, Attachment P). The Navy, through the Community Planning and Liaison Officer at the Northwest Training Range Complex, also confirmed that the Project will have only minor, mitigable impacts to the Navy's operations (see Navy Correspondence Letter, Attachment Q).

B. Establishing a special yard or other open space or lot area or dimension.

Finding: No special setback is recommended.

C. Limiting the height, size or location of a building or other structure.

Finding: If built, the O&M building would be limited to one story in height. The PV panels themselves would not exceed a total height of 14 feet in the tallest possible panel configuration. No height, size, or location limitations are recommended.

D. Designating the size, number, location and nature of vehicle access points.

1. **Where access to a county road is needed, a permit from Morrow County Public Works department is required. Where access to a state highway is needed, a permit from ODOT is required.**
2. **In addition to the other standards and conditions set forth in this section, a Traffic Impact Analysis (TIA) will be required for all projects generating more than 400 passenger car equivalent trips per day. A TIA will include: trips generated by the project, trip distribution for the project, identification of intersections for which the project adds 30 or more peak hour passenger car equivalent trips, and level of service assessment, impacts of the project, and mitigation of the impacts. If the corridor is a State Highway, use ODOT standards. (MC-C-8-98)**

Finding: The application does not include the approval of any new access points to County or public roads. The Applicant is working with nearby landowners for access to the Project Tract. The existing access roads include two alternative access routes. All access route options currently being reviewed by the Applicant are located on private roads. The Applicant shall obtain the necessary access or crossing easements, agreements or permits prior to construction as a condition of this permit. The first access option will be via the private Madison Road and County Road 1356 (Umatilla County). The second access option will be via an unnamed private road to the south of the Project Area, which intersects with State Highway 207 at approximately 45°37'03.67" N, 119°27'19.44" W. The

Alternative Access Roads are depicted in the Transportation Plan (Attachment M).

As discussed above in the response to MCZO 3.010(N), a TIA is not required for the Project, since operational traffic will be minimal. Access to a state road, if needed, will be coordinated with ODOT to ensure all necessary permits and approvals are met prior to construction. Applicant shall coordinate with Umatilla and Morrow County Public Works to determine whether a Road Use Agreement is necessary for potential impacts to county roads.

E. Increasing the amount of street dedication, roadway width or improvements within the street right-of-way.

1. It is the responsibility of the land owner to provide appropriate access for emergency vehicles at the time of development. (MC-C-8-98)

Finding: No new dedication is needed in public road rights-of-way to accommodate the Project. Emergency access will be coordinated with the local fire marshal and may utilize one of the access routes identified within the Transportation Plan (Attachment M). The Applicant shall work with emergency responders to ensure all access and emergency preparedness plans are coordinated to meet local and state code.

F. Designating the size, location, screening, drainage, surfacing or other improvement of a parking area or loading area.

Finding: A total of 15.6 acres are reserved for use as a laydown area within the Project Area, which will be utilized for construction personnel parking. During operations, a small gravel parking area next to the Project substation and optional O&M building will be developed to accommodate staff and visitors. See Preliminary Site Plan (Attachment A). Applicant shall ensure that areas used for parking for more than two vehicles have durable and dustless surfaces adequately maintained in accordance with MCZO 4.060.

G. Limiting or otherwise designating the number, size, location, height, and lighting of signs.

Finding: A small sign may be placed at the entrance to the Project site from State Road 207 and shall meet local and state code requirements.

H. Limiting the location and intensity of outdoor lighting and requiring its shielding.

Finding: The Project shall limit the number of lighting fixtures and would use motion-activated or timed lighting and down-shielded fixtures. Lighting is needed for security and occasional after-hours work. All lighting installed within the Project Area shall meet local and state regulations.

I. Requiring diking, screening, landscaping or another facility to protect adjacent or nearby property and designating standards for its installation and maintenance.

Finding: Staff does not recommend screening or landscaping be required for the project.

J. Designating the size, height, location and materials for a fence.

Finding: The Project approval includes a security fence up to eight (8) feet in height.

K. Protecting and preserving existing trees, vegetation, water resources, wildlife habitat or other significant natural resources.

Finding: The Applicant shall minimize impacts on surrounding habitat and ecosystem functions (e.g., water conveyances, wildlife movement corridors) to the extent practical. Areas with temporary Project impacts shall be restored and revegetated using industry-accepted best management practices (e.g., use of native seed mixes, control of noxious weeds). All such measures are described in the Vegetation and Weed Management Plan (Attachment L) and were developed in coordination with ODFW and Morrow County. County Weed Supervisor shall approve applicant's final Weed Plan prior to construction.

L. Other conditions necessary to permit the development of the County in conformity with the intent and purpose of this Ordinance and the policies of the Comprehensive Plan.

Finding: Recommended Conditions of Approval are provided in section VII of this report. Additional Conditions may be imposed at the discretion of the Planning Commission to mitigate potential impacts to the extent such conditions are clear and objective and relevant to the applicable review criteria.

MCZO 6.040. General Conditions.
The Commission may require an applicant to furnish the County with a performance bond or such other form of assurance that the Commission deems necessary to guarantee development in accordance with the standards established and the conditions attached in granting a conditional use permit.

Finding: Applicant will construct and operate the Project consistent with the conditions of approval contained in the final conditional use permit. Other than the decommissioning bond described in OAR 660-033-0130(38)(m) and MCZO 3.010(K)(3)(j), above, the Applicant maintains, and staff concur, that no performance bond or other form of financial assurance is necessary to ensure compliance with the County's approval for the Project's construction and operation.

MCZO 6.050. Standards Governing Conditional Uses.
A conditional use shall comply with the standards of the zone in which it is located and with the standards set forth in this subsection.

O. Radio, television tower, utility station or substation:

1. In a residential zone, all equipment storage on the site may be required to be within an enclosed building.

Finding: The Project is not located in a residential zone; therefore, this criterion is not applicable.

2. The use may be required to be fenced and provided with landscaping.

Finding: The Project will include a security fence up to eight (8) feet in height. No landscaping is proposed or recommended as a requirement for the development.

3. **The minimum lot size for a public utility facility may be waived on finding that the waiver will not result in noise or other detrimental effects to adjacent property.**

Finding: The Project is located on leased property and will not require the creation of a new lot. Therefore, this criterion does not apply.

4. **Transmission towers, hoses, overhead wires, plumbing stations, and similar gear shall be so located, designed and installed as to minimize their conflict with scenic values.**

Finding: The Project requires a gen-tie line to connect the Project substation to the UEC-owned Oregon Trail substation. The gen-tie line is estimated at 3.5 miles and will require new poles. The design is subject to change following final interconnection design by UEC and BPA. The gen-tie line will run north and west from the project to the substation. The gen-tie line will be permitted separately as a Type II Land Use Decision submitted under separate cover. In its Comprehensive Plan, Morrow County has not designated any nearby sites or areas as being particularly high in scenic resource value.

SECTION 3B. ORS 215.446

The 2019 Oregon Legislature adopted House Bill (HB) 2329 imposing additional siting standards on "mid-tier" sized solar projects. HB 2329 is implemented through ORS 215.446, which has not yet been adopted into the MCZO. Accordingly, the Applicant responds to the applicable standards in ORS 215.446 directly.

215.446 Renewable energy facility; application; standards; notices.

(3) In order to issue a permit, the county shall require that the applicant:

(A) Consult with the State Department of Fish and Wildlife, prior to submitting a final application to the county, regarding fish and wildlife habitat impacts and any mitigation plan that is necessary;

Finding: The Applicant began consultation for the Project with ODFW on April 10, 2023, which led to ODFW issuing a letter dated April 12, 2023 outlining their recommendations for wildlife and habitat surveys (included in Attachment E). The recommended surveys included habitat mapping, raptor nest surveys, avian use data, and surveys for State Sensitive Species. Staff have incorporated ODFW comments into the recommended Conditions of Approval.

(B) Conduct a habitat assessment of the proposed development site;

Finding: The Applicant contracted with Tetra Tech, Inc. (Tetra Tech) to complete a Threatened Endangered and Sensitive Species (TESS) survey, raptor nest survey and habitat mapping for the Project Area Extent in June 2023. The wildlife and habitat surveys followed recommendations and protocols as shared by

ODFW on April 12, 2023. The full results of these surveys are found in the Wildlife and Habitat Survey Report (Attachment E).

The Project Area Extent includes Category 4 and 6 habitat, as defined under OAR 635-415-0025. The report shows that the Project Area Extent is composed almost entirely of Category 6 habitat with a minimal amount (4.5 acres) of Category 4 habitat. Category 6 is made up of unirrigated wheat fields. Category 4 habitat is made up of Eastside Grassland. The Project will be designed to avoid all Category 4 habitat. Table 2 below details the results of the habitat assessment within the Project Area Extent. The Wildlife and Habitat Surveys identified one nest within or near the survey area, which was occupied by common ravens. Available nest substrate in the Raptor Nest Survey Area is limited to power poles and utility towers.

ODFW Habitat Categories within the Project Area Extent

Habitat Type	ODFW Habitat Category	Acres
Eastside Grassland	4	4.5
Agriculture, Pasture, and Mixed Environs	6	744.8
Urban and Mixed Environs	6	3.4
Total		752.7

(C) Develop a mitigation plan to address significant fish and wildlife habitat impacts consistent with the administrative rules adopted by the State Fish and Wildlife Commission for the purposes of implementing ORS 496.012; and

Finding: Pursuant to ongoing consultation with ODFW, the Applicant has been advised that a Habitat Mitigation Plan is not required for this project, since only Category 6 Habitat will be impacted. See Attachment E for response from ODFW.

(D) Follow administrative rules adopted by the State Fish and Wildlife Commission and rules adopted by the Land Conservation and Development Commission to implement the Oregon Sage-Grouse Action Plan and Executive Order 15-18.

Finding: There is no Oregon Sage-Grouse habitat within the Project Area Extent or vicinity.

(b) Demonstrate that the construction and operation of the renewable energy facility, taking into account mitigation, will not result in significant adverse impacts to historic, cultural and archaeological resources that are:

(A) Listed on the National Register of Historic Places under the National Historic Preservation Act (P.L. 89-665, 54 U.S.C. 300101 et seq.);

(B) Inventoried in a local comprehensive plan; or

(C) Evaluated as a significant or important archaeological object or archaeological site, as those terms are defined in ORS 358.905.

Finding: The Applicant has consulted with the Oregon State Historic Preservation Office (SHPO), the Confederated Tribes of the Umatilla Indian Reservation (CTUIR), the Burns Paiute Tribe and the Confederated Tribes of Warm Springs for the Project. CTUIR and SHPO both responded to requests for reviews and based on feedback from these groups, the Applicant hired Tetra Tech to complete a cultural resources survey with support from CTUIR personnel. The findings of the Cultural Resources Survey Report are included under the confidential Attachment F. The report was submitted to SHPO, and confirmation of receipt was sent from SHPO on February 5, 2024. Additionally, the Applicant submitted the Cultural Resources Survey Report to the interested tribes on January 25th, 2024. The assigned SHPO Case Number is 23-1030 (see Attachment H).

The report is currently under review by CTUIR, the Burns Paiute Tribe, and the Confederated Tribes of Warm Springs. The cultural resources survey identified ruts associated with the Oregon National Historic Trail within the Project Area Extent and is recommended that this resource be eligible for NRHP listing. Based off these findings, the Applicant has placed a 30-meter setback from this resource. The Applicant is awaiting final review of the Cultural Resources Report by SHPO and interested tribes. The Applicant will work with SHPO and the affected tribes to incorporate any recommended setbacks or mitigation required by SHPO or the interested tribes. The areas identified during the cultural resources survey are depicted in the Confidential Preliminary Layout (Confidential Attachment G). Any mitigation caused by impacts to this cultural resource will be provided under a Confidential Mitigation Agreement and shared with the County prior to construction as a condition of the Conditional Use Permit. Additionally, the cultural resources survey identified a historic property of religious and cultural significance (HPRCSIT) to the CTUIR. Impacts to the HPRCSIT are being identified with CTUIR and mitigation will be completed prior to permit approval. Mitigation will be coordinated with CTUIR under a Confidential Mitigation Agreement that will be provided to the County prior to construction as a condition of the Conditional Use Permit.

(c) Demonstrate that the site for a renewable energy facility, taking into account mitigation, can be restored adequately to a useful, nonhazardous condition following permanent cessation of construction or operation of the facility and that the applicant has a reasonable likelihood of obtaining financial assurances in a form and amount satisfactory to the county to secure restoration of the site to a useful, nonhazardous condition.

Finding: As further described in the Decommissioning Plan (Attachment N), the Applicant proposes to provide financial assurance for 100% of the estimated costs of the decommissioning efforts at the earlier of i) ten years after the Project's Commercial Operation Date or ii) at the expiry of the Project's Power Purchase Agreement, which is not yet executed.

The financial assurance shall be in the form of a bond from an individual or entity engaged in the construction business, a surety bond, a corporate guarantee, a

letter of credit issued by a financial institution, or a cash deposit. The amount of the financial assurance shall be based on a written estimate from a company with experience with such matters which sets forth such company's estimate of the cost of removing the solar facilities, net of their estimated salvage value. This provision is included as a recommended Condition of Approval.

(d) Meet the general and specific standards for a renewable energy facility adopted by the Energy Facility Siting Council under ORS 469.470 (2) and 469.501 that the county determines are applicable.

Finding: None of these standards apply as Morrow County, at the time of application receipt, has not incorporated any of these standards into the MCZO.

(e) Provide the financial assurances described in paragraph (c) of this subsection in the form and at the time specified by the county.

Finding: See the response to ORS 215.446(3)(c) above.

(4) Upon receipt of a reasonable cost estimate from the state agency or tribe, the applicant and county may jointly enter into a cost reimbursement agreement administered by the county with:
- **(a) The State Department of Fish and Wildlife to receive comments under subsection (3)(a) of this section.**
- **(b) The State Historic Preservation Officer or any affected federally recognized Indian tribe to receive comments under subsection (3)(b) of this section.**
- **(c) The State Department of Energy to receive comments under subsection (3)(c) and (d) of this section as well as comments regarding other matters as the county may require.**

Finding: Given the size and scale of the Project, staff does not recommend requiring the Applicant to enter into a cost reimbursement under ORS 215.446(4).

(5) A county that receives an application for a permit under this section shall, upon receipt of the application, provide notice to persons listed in subsection (6) of this section. The notice must include, at a minimum:
- **(a) A description of the proposed renewable energy facility;**
- **(b) A description of the lots or parcels subject to the permit application;**
- **(c) The dates, times and locations where public comments or public testimony on the permit application can be submitted; and**
- **(d) The contact information for the governing body of the county and the applicant.**

(6) The notice required under subsection (5) of this section must be delivered to:
- **(a) The State Department of Fish and Wildlife;**
- **(b) The State Department of Energy;**
- **(c) The State Historic Preservation Officer;**
- **(d) The Oregon Department of Aviation;**
- **(e) The United States Department of Defense; and**

(f) Federally recognized Indian tribes that may be affected by the application.

Finding: Applicant will coordinate with Morrow County to confirm that the notices are issued as required by ORS 215.446(5) and (6).

III. LEGAL NOTICE: Heppner Gazette-Times: March 6th, 2024

East-Oregonian: March 5th, 2024

IV. AGENCIES NOTIFIED: Jim Johnson, Oregon Department of Agriculture; Dawn Hert, Jon Jinnings, and Hilary Foote, Department of Land Conservation and Development; Daniel Somers, Oregon Department of Fish and Wildlife; Greg Silbernagel, Oregon Water Resources Department; Sean Rochette, Oregon Department of Environmental Quality; Mike Haugen and Eric Imes, Morrow County Public Works; Corey Sweeney, County Weed Coordinator; Dan Kearns, County Land Use Counsel; Mike Gorman and Sandi Patton, Morrow County Assessor; Matt Kenny, Morrow County Surveyor; Brian Snyder, Sherif's Office; Bob Waldher, Umatilla County Community Development; Teresa Penninger and Cheryl Jarvis-Smith, Oregon Department of Transportation; Kevin Payne, Morrow County Soil and Water Conservation; Sarah Esterson, Oregon Department of Energy; Lisa Mittelsdorf, Port of Morrow; Virgil Mike Hughes and Marty Broadbent, Boardman Fire Protection District; Tod Farmer, Oregon Military Department; Kim Peacher, United States Navy; Teara Farrow, Confederated Tribes of the Umatilla Indian Reservation; Chris Grant, Umatilla Fire; Brandon Hammond and Glenn McIntire, City of Boardman;

V. PROPERTY OWNERS NOTIFIED: March 1st, 2024

VI. HEARING DATE: March 26th, 2024
Morrow County Government Center
Irrigon, Oregon

VII. DECISION OF PLANNING COMMISSION: Recommendation of staff is to approve the application subject to the approval of AC-153-24 and the following CONDITIONS OF APPROVAL:

1. Provide the County with a Final Site Development Plan, Project Layout Plan and Construction Schedule prior to the start of construction.

2. Submit final Habitat Mitigation Plan (HMP) and approval of HMP by ODFW.

3. Applicant shall submit an Agricultural Mitigation Plan for County approval prior to construction. The Plan shall include an economic impact analysis that evaluates the impacts of the facility to the agricultural and local community resulting from the removal of ±753 acres of farmland from agricultural production.

4. Submit a specific water usage plan identifying the planned water sources for dust control and panel cleaning.

5. The project owner shall sign and record with the Morrow County Clerk's Office, a Right to Farm Disclaimer within 30 days after the initiation of construction and provide a copy to Morrow County Planning Department.

6. The ±3.5-mile transmission line necessary to connect the facility to the Oregon Trail substation shall be permitted via a separate Land Use Decision. This shall be required prior to issuance of a Zoning Permit.

7. Applicant shall provide financial assurance for 100% of the estimated costs of decommissioning efforts in accordance with approved Decommissioning Plan and provide Morrow County Planning Department proof of financial assurance prior to construction.

8. Obtain the necessary Zoning and Building Permits for all buildings associated with the solar photovoltaic electricity generating facility as well as any fencing greater than 6-feet in height prior to construction.

9. Signs shall comply with the limitations and regulations of MCZO Section 4.070.

10. In accordance with the Fire Variance granted by Boardman Fire and Rescue District, applicant shall provide a 26-foot non-vegetative buffer around the perimeter of the Project as a firebreak, rather than a non-combustible base where required by Subsection 605.12 of the 2014 Oregon Fire Code. The applicant shall comply with all other standards of the Oregon Fire Code.

11. Applicant shall comply with all recommendations and mitigation measures identified by SHPO and/or the identified interested tribes via a Confidential Mitigation Agreement. The agreement shall be shared with the County prior to construction.

12. Applicant's Vegetation and Weed Management Plan shall receive final approval from the County Weed Supervisor. Areas with temporary project impacts shall be restored and revegetated in accordance with such plan.

13. Areas used for parking for more than two vehicles shall have durable and dustless surfaces adequately maintained.

14. Fences shall be designed and maintained in accordance with ODFW recommendations identified in the November 28, 2023, letter.

15. Erosion Control
    a. All civil work shall be conducted in compliance with an approved Erosion and Sediment Control Plan, required as part of the Project's NPDES Construction Stormwater Permit issued by the Department of Environmental Quality.
    b. Applicant shall provide an Erosion and Sediment Control plan identifying how unnecessary soil compaction and erosion during construction will be avoided and/or mitigated.
    c. Applicant shall implement best management practices to ensure all grading results in minimal fugitive dust emissions during site grading activities, as determined by Morrow County Public Works.

d. Traffic speeds along unpaved site access roads shall be limited to 25 miles per hour.

16. Access and Transportation
    a. Applicant shall comply with all Umatilla County and ODOT access and transportation requirements and receive all applicable access and approach permits required by the affected entities.
    b. Applicant shall enter into a Road Use Agreement (RUA) if deemed necessary by Umatilla and/or Morrow County Public Works. The roadmasters of each affected county shall provide final approval of the RUA if applicable, or a statement confirming that no impacts are anticipated.
    c. Applicant shall coordinate with ODOT to resolve concerns identified in 3/12/24 letter related to glare and transportation system impacts.
    d. Applicant shall obtain all necessary access or crossing easements, agreements or permits to establish Legal Access to the project site in accordance with the easement widths and access standards designated in the Morrow County Transportation System Plan, outlined in MCZO 4.010, prior to the commencement of development.

17. Approval of the associated Goal 3 Exception, AC-153-24 shall be finalized prior to proceeding with construction.

_____

Stacie Ekstrom, Chair Date

ATTACHMENTS:

1. **VICINITY MAP**
2. **PUBLIC COMMENTS RECEIVED**
   A. Oregon Department of Transportation (March 12, 2024)
3. **APPLICATION EXHIBITS**
   A. Preliminary Site Plan
   B. Landowner Support Letter
   C. Soils Analysis
   D. Wetlands and Waters Report
   E. Wildlife and Habitat Survey Report
   F. CONFIDENTIAL – Cultural Resources Survey Report
   G. CONFIDENTIAL – Preliminary Site Plan with Cultural Sites
   H. SHPO Submission
   I. USFWS IPaC Report
   J. FEMA FIRM Map
   K. Forge Solar Glare Analysis
   L. Vegetation and Weed Management Plan
   M. Transportation Plan
   N. Decommissioning Plan
   O. Fire Code Variance Letter- Boardman Fire Rescue District
   P. FAA Notice Criteria Tool Results
   Q. Department of Defense/Navy Review Letter
   R. Alternatives Analysis

*Attached to Final Findings **in bold print**.

Oregon
Tina Kotek, Governor

Department of Transportation
Region 5, District 12
1327 SE 3rd Street
Pendleton, OR 97801

March 12, 2024

Daisy Goebel, Principal Planner VIA EMAIL: dgoebel@co.morrow.or.us
Morrow County
P O Box 40
215 NE Main Avenue
Irrigon, OR 97884

Subject: *Proposed Comprehensive Plan Amendment, Goal Exception AC-153-24 and Conditional Use Permit CUP-N-364-24 for Passage Solar- OneEnergy 738.6 acres within Exclusive Farm Use (EFU) zone located 17-miles SE of Hermiston and 22-miles SE of Boardman*

The Oregon Department of Transportation (ODOT) has received notice of the proposed construction and operation of a 120-MW solar photovoltaic energy generation facility in the vicinity of Highway 207. ODOT has jurisdiction of Highway 207, including responsibility for preserving the safety of the highway and managing access within the corridor. In particular, the solar operation may have a glare concern to the highway and should be reviewed further.

There is also concern that construction workers and material deliveries could have a temporary impact on the transportation system during the construction period. Likewise, daily operations may also have an effect to the local and state system depending on the onsite staff and maintenance staff needs.

To meet County standards and minimize public facility impacts, ODOT recommends the County require the applicant to provide a glare mitigation plan, a Trip Generation Report (TGR) (for Construct period and Maintenance period, obtain an approach permit or upgrade an existing approach permit, and share responsibility and cost of implementing necessary improvements. Ensuring the transportation system is managed effectively in accordance with the County's Transportation System Plan and safety of the traveling public are necessary conditions of approval.

ODOT welcomes the opportunity to meet with the County and applicant regarding development plans, including the glare mitigation plan, possible need and timing of a TGR and implementation of transportation infrastructure improvements. Thank you for the opportunity to comment.

Rich Lani, District 12 Manager

CJS

cc: Ken Patterson, ODOT Region 5 Manager
David Boyd, Regional Access Management Engineer
Paul Howland, District 12

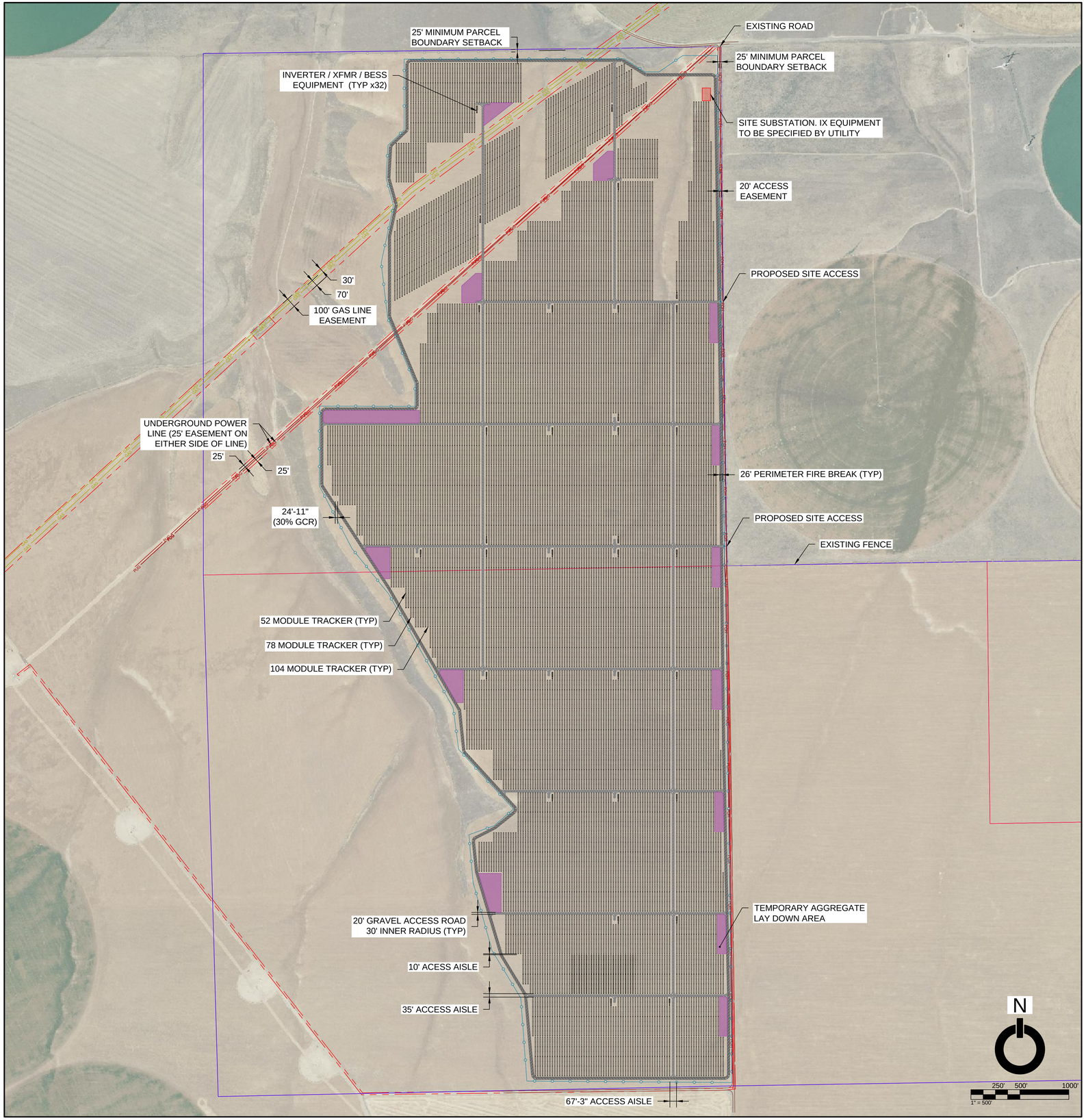
Attachment A

PRELIMINARY LAYOUT

Passage Solar
February 2024

OneEnergy Renewables
2003 Western Ave, Suite 225
Seattle, Washington 98121

oneenergy
renewables
.com



PASSAGE SOLAR

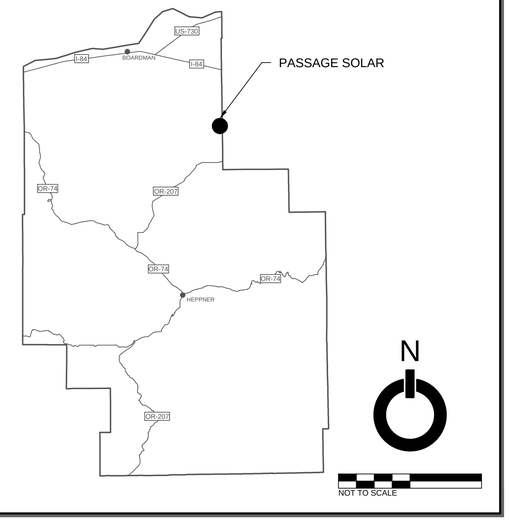
MORROW COUNTY, OREGON

SOLAR PV PROJECT
147.948 MWDC / 120.000 MWAC

LEGEND

- PARCEL BOUNDARY
- COMMON OWNERSHIP BOUNDARY
- ZONING SETBACK
- EASEMENT
- NEIGHBORING PARCEL
- PERIMETER FENCE (P)
- GRAVEL ROAD (E)
- GRAVEL ACCESS ROAD
- FIRE BREAK PATH
- SITE SUBSTATION
- STAGING AREA
- POH — OH ELECTRICAL (E)
- PUG — UG ELECTRICAL (E)
- GAS — UG GAS LINE (E)

MORROW COUNTY MAP



PROJECT DETAILS

THIS PROJECT CONSISTS OF THE DESIGN AND INSTALLATION OF 120.000 MWAC SOLAR PHOTOVOLTAIC SYSTEM. MODULES ARE TO BE MOUNTED IN A SINGLE AXIS TRACKERS, WHICH FOLLOW THE SUN FROM EAST TO WEST THROUGHOUT THE DAY.

SITE DETAILS:

PARCEL ID	2N27E000000100 & 3N27E000001200
OWNER:	TIMOTHY & SHANNON RUST
ACREAGE:	5800.30
EXISTING ZONE:	EXCLUSIVE FARM USE

LAND USE SUMMARY:

TOTAL PARCEL AREA (ACRES):	5800.30
TOTAL LEASED AREA (ACRES):	753.00
TOTAL FENCED AREA (ACRES):	738.56
GRAVEL ACCESS ROAD (ACRES):	18.68
STAGING AREA (ACRES):	15.57

DESIGN SUMMARY:

MODULE POWER:	570 W
MODULE COUNT:	259,558
ARRAY DC VOLTAGE:	1,500 V
INVERTER SIZE:	3.750 MW / 4.105 MVA
INVERTER COUNT:	32
DC SIZE:	147.948 MWDC
AC SIZE:	120.000 MWAC
DC/AC RATIO:	1.233
GROUND COVERAGE RATIO:	30.0%
ASCE 7-16 GSL:	15 PSF
ASCE 7-16 WIND SPEED:	100 MPH

ADDITIONAL NOTES:

- BASEMAP DEVELOPED FROM GIS DATA
- PARCEL DATA TAKEN FROM GIS DATA
- NWI & FEMA FLOOD HAZARD ZONE FROM GIS DATA

OneEnergy RENEWABLES
2003 Western Ave, Suite 225
Seattle, WA 98121
oneenergyrenewables.com
206 922 7072

PRELIMINARY

NOT FOR CONSTRUCTION

REVISION LOG

REV	DESCRIPTION	DATE	BY	CK'D	SME
A	5% PERMIT LAYOUT	01.30.2024	AL	IR	IR

PASSAGE SOLAR
ONEENERGY RENEWABLES
45.69003°, -119.432425°
MORROW COUNTY, OREGON

SHEET TITLE: PERMIT LAYOUT

SHEET NO: D-100

PUBLISHED ON: 01.30.2024 1:11 PM

Attachment B

LANDOWNER SUPPORT LETTER

Passage Solar
February 2024

OneEnergy Renewables
2003 Western Ave, Suite 225
Seattle, Washington 98121

Timothy and Shannon Rust
77252 Mader Rust Lane
Echo, OR 97826

January 19, 2024

Morrow County Planning
215 NE Main Ave.,
Irrigon, OR 97844

RE: Passage Solar Project

Dear Morrow County,

The Passage Solar project is a proposed photovoltaic solar power generation facility with optional battery storage in Morrow County on land owned by Timothy M. Rust and Shannon L. Rust, Trustees of the Timothy and Shannon Rust Living Trust dated August 18, 2015, The Shannon Rust Share of the Frank & LaVonne Mader Living Trust and Clarkston Development Company. The Project is located on tax parcels 03N27E000001200 and 02N27E000000100 on portions of Township 3 North, Range 27 East Section 32 and 33 and Township 2 North, Range 27 East Section 04. As the landowners, we support the project and provide the following information in support of Passage Solar OR, LLC's application for a Conditional Use Permit, Land Use Permit and Goal 3 Exception.

This property has been owned for 45 years by our family. My folks who made the purchase of this property in 1979 are no longer living. Tim & I are the 2nd generation to live on & operate this farm. The 3rd generation (our daughter & her husband) are now running the operation...producing crops & making improvements to make it sustainable for the 4th generation who are now growing up on the property.

We have chosen to lease our land to construct the Passage Solar project at the proposed site, which will be a higher and better use of this portion of our land while we continue to cultivate our more productive farmland. The annual lease payments from the project will provide long-term, predictable revenue while diversifying the income generated by our landholdings. Moreover, the project will not adversely impact or increase the cost of farming practices near the project. We do not anticipate any changes to our ongoing operations nor those of our neighbors resulting from the construction or operation of the proposed project.

Sincerely,

Timothy and Shannon Rust and Clarkston Development Company

The legal landowners of the proposed Project, hereby give authorization to Passage Solar OR, LLC to submit for a Conditional Use Permit, Land Use Permit and Goal 3 Exception for Passage Solar.

Timothy and Shannon Rust Living Trust dated August 18, 2015

By: Timothy M Rust Trustee

Name/Title: Timothy M. Rust, Trustee

Date: 1-26-2024

By: Shannon L. Rust, Trustee

Name/Title: Shannon L. Rust, Trustee

Date: Jan 26.202

Shannon Rust Share of Frank and LaVonne Mader Living Trust

By: Shannon Rust, Trustee

Name/Title: Shannon L. Rust, Trustee

Date: Jan 26 202

Clarkston Development Company

By: Robert H Houlihan

Name/Title: PRESIDENT

Date: 29 JANUARY 2024

Attachment C

SOILS ANALYSIS

Passage Solar
February 2024

OneEnergy Renewables
2003 Western Ave, Suite 225
Seattle, Washington 98121

oneenergy
renewables
.com

The soils analysis characterizes the soil types for the Passage Solar Project.

I. DEFINITIONS

Project: Passage Solar Project is a proposed photovoltaic (PV) solar generation facility sized up to 120 megawatt (MW) alternating current (AC) with optional battery energy storage systems (BESS) and is located approximately is approximately 17 miles southwest of the town of Hermiston within Morrow County, Oregon, and 22 miles southeast of Boardman, Oregon in Morrow County, Oregon (the "Project").

Project Area: The Project's maximum footprint, including all Project components, shall not exceed 738.6 acres ("Project Area").

Project Area Extent: The Project Area will be located wholly within a broader micrositing boundary encompassing approximately 753 acres ("Project Area Extent").

Project Tract: The Project will be located within a 5,800-acre tract of land jointly owned by the Timothy and Shannon Rust Living Trust, the Shannon Rust Share of the Frank and LaVonne Mader Living Trust, and the Clarkston Development Company. The tract is composed of the two parcels listed in Table 1.

Tax Lot	Acres
03N27000001200	1,939
02N27000000100	3,861
TOTAL	5,800

Table 1: Tax Lots within Project Tract

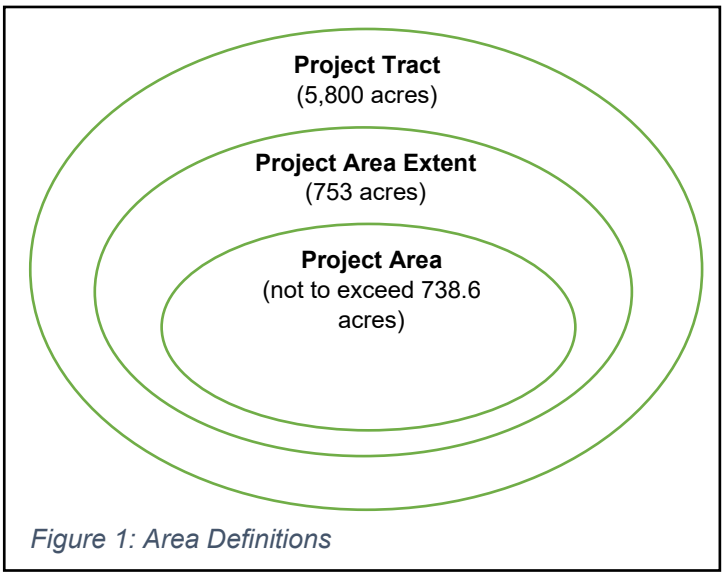


Figure 1: Area Definitions

II. SOIL TYPES

Passage Solar OR, LLC (Applicant) evaluated the soil types within the Project Area Extent and the Project Tract. The Applicant then classified the soils within the Project Area Extent and the Project Tract under the Natural Resource Conservation Service ("NRCS") land capability classification system.

Project Area Extent

The soil types and NRCS soil classifications within the Project Area Extent are shown in Table 2 below and in the NRCS Soils Map, ***Appendix 1***. The Applicant took into account whether the soil was currently irrigated or non-irrigated when defining the soil types and classes.

Soil Map Unit Name (Map Unit Symbol)	NRCS Land Capability Class	Irrigated/Non-irrigated (Current Irrigation Status)	Acres	% of Project Area Extent	Prime Farmland (with current irrigation)[1]
Gravden very gravelly loam, 20 to 40 % slopes	7e	Non irrigated	3.4	0.5	No
Ritzville very fine sandy loam, 2 to 7 % slopes	3e	Non irrigated	639.9	84.6	No
Ritzville very fine sandy loam, 7 to 12 % slopes	3e	Non irrigated	69.5	9.2	No
Ritzville silt loam, 0 to 2 % slopes	3c	Non irrigated	0.3	0.0004	No
Ritzville silt loam, 2 to 7 % slopes	3e	Non irrigated	7.9	1.0	No
Willis silt loam, 5 to 12 % slopes	3e	Non irrigated	34.7	4.6	No
TOTAL			**752.7**		

Table 2: Soil Types within Project Area Extent

Project Tract

Some of the following analysis depends on an assessment of the tract of land on which the Project is located, rather than just the Project Area Extent. A tract is defined at OAR 660-033-0020 as "one or more contiguous lots or parcels under the same ownership. The soil types within the Project Tract are shown below in Table 3.

Soil Map Unit Name (Map Unit Symbol)	Land Capability Class	Current Irrigation Status	Acres	% of Total Acres	Prime Farmland (with current irrigation)[1]
Gravden very gravelly loam, 5-20% slopes	7e	Non-irrigated	46.3	0.8%	No
Gravden very gravelly loam, 20-40% slopes	7e	Non-irrigated	121.1	2.1%	No
Kimberly fine sandy loam	3e	Non-irrigated	0.0	0.0%	No
Pedigo silt loam	3w	Non-irrigated	76.4	1.3%	No
Pedigo silt loam	2w	Irrigated	84.6	1.5%	Yes
Ritzville very fine sandy loam, 2-7% slopes	3e	Non-irrigated	1,321.6	22.8%	No
Ritzville very fine sandy loam, 2-7% slopes	2e	Irrigated	160.5	2.8%	Yes
Ritzville very fine sandy loam, 7-12% slopes	3e	Non-irrigated	337.6	5.8%	No
Ritzville very fine sandy loam, 7-12% slopes	3e	Irrigated	4.9	0.08%	No
Ritzville silt loam 0-2%, slopes	3c	Non-irrigated	1,404.5	24.2%	No
Ritzville silt loam 0-2%, slopes	1	Irrigated	312.2	5.4%	Yes
Ritzville silt loam 2-7%, slopes	3e	Non-irrigated	415.4	7.2%	No
Ritzville silt loam 7-12%, slopes	3e	Non-irrigated	368.5	6.4%	No
Ritzville silt loam 12-20%, slopes	4e	Non-irrigated	26.2	0.5%	No
Ritzville silt loam 20-40%, slopes	6e	Non-irrigated	112.4	1.9%	No
Royal fine loamy sand, 12-20% slopes	6e	Non-irrigated	54.7	0.9%	No
Sagehill fine sandy loam, 2-5% slopes	4e	Non-irrigated	328.6	5.7%	No
Sagehill fine sandy loam, 5-12% slopes	4e	Non-irrigated	84.0	1.4%	No
Sagehill fine sandy loam, 12-20% slopes	4e	Non-irrigated	67.8	1.2%	No
Sagehill fine sandy loam, hummocky, 2-5% slopes	4e	Non-irrigated	16.6	0.3%	No
Taunton fine sandy loam, 0-2% slopes	6e	Non-irrigated	252.3	4.4%	No
Willis silt loam, 2-5% slopes	3e	Non-irrigated	39.1	0.7%	No
Willis silt loam, 5-12% slopes	3e	Non-irrigated	112.5	1.9%	No
Willis silt loam, 12-20% slopes	4e	Non-irrigated	26.2	0.5%	No
Burke silt loam, 7-12% slopes	4e	Non-irrigated	22.8	0.4%	No
Burke silt loam, 7-12% slopes	4e	Irrigated	2.4	0.04%	No
TOTAL			**5,800**		

Table 3: Soil Types within Project Tract

[1] The Prime Farmland column indicates a portion of land that i) has a soil type with a "Prime farmland if Irrigated" designation (as defined in the Prime Farmland List for Oregon) and ii) is currently irrigated.

III. HIGH-VALUE FARMLAND

Using the information above regarding soil types and soil class, the Applicant can then categorize the soils within the Project Area Extent under Oregon Administrative Rule ("OAR") 660-033-0130(38) (hereafter known as the "DLCD siting standards"). The DLCD siting standards provide different rules for siting photovoltaic solar power generation facilities depending on the type of land found at the project site. The standards delineate between high-value farmland, arable land, and non-arable land. OAR 660-033-0130 (38) is attached as ***Appendix 2*** and refers to all the definitions within the soils analysis.

As further detailed in the analysis below and shown in Figure 2, there are 152.9 acres of high-value farmland as defined by ORS 195.300(10)(f) within the Project Area Extent.

Legal Analysis

OAR 660-033-0130(38) relies on the definition of high-value farmland described at ORS 195.300(10). The Applicant analyzes those provisions below.[2]

ORS 195.300(10) *"High-value farmland" means:*

ORS 195.300(10)(a) *High-value farmland as described in ORS 215.710 (High-value farmland description for ORS 215.705) that is land in an exclusive farm use zone or a mixed farm and forest zone, except that the dates specified in ORS 215.710 (High-value farmland description for ORS 215.705) (2), (4) and (6) are December 6, 2007.*

> ***ORS 215.710(1)*** *For purposes of ORS 215.705 (Dwellings in farm or forest zone), high-value farmland is land in a tract composed predominantly of soils that, at the time the siting of a dwelling is approved for the tract, are:*
>
> *(a)Irrigated and classified prime, unique, Class I or Class II; or*
>
> *(b)Not irrigated and classified prime, unique, Class I or Class II.*

Response: ORS 195.300(10)(a) incorporates by reference the definition of high-value farmland from ORS 215.710. As demonstrated in Table 3 above, the Project Tract contains 557.3 acres that are irrigated and prime, unique, Class I or Class II soils. Project Tract contains no soils that are not irrigated and classified as prime, unique, Class I or Class II soils. Therefore, the 5,800-acre Project Tract is *not* composed predominately of high-value farmland under ORS 215.710(1) and the Project Tract is not considered high-value farmland under ORS 195.300(10)(a).

> ***ORS 215.710(2)*** *In addition to that land described in subsection (1) of this section, for purposes of ORS 215.705 (Dwellings in farm or forest zone), high-value farmland, if outside the Willamette Valley, includes tracts growing specified perennials as demonstrated by the most recent aerial photography of the Agricultural Stabilization and Conservation Service of the United States Department of Agriculture taken prior to November 4, 1993. For purposes of this subsection, specified perennials means perennials grown for market or research purposes including, but not limited to, nursery stock, berries, fruits, nuts, Christmas trees or vineyards but not including seed crops, hay, pasture or alfalfa.*

Response: The Project Tract is not used for growing perennials and the land is therefore not considered high-value farmland under this definition.

ORS 195.300(10)(c) *Land that is in an exclusive farm use zone or a mixed farm and forest zone and that on June 28, 2007, is:*

[2] Some sections are not applicable and were not analyzed, including ORS 215.710(3)-(4) and ORS 195.300(10) (b), (d), and (e).

(A) Within the place of use for a permit, certificate or decree for the use of water for irrigation issued by the Water Resources Department;
(B) Within the boundaries of a district, as defined in ORS 540.505 (Definitions); or
(C) Within the boundaries of a diking district formed under ORS chapter 551.

Response: The Project Area Extent is not within the boundaries of a district as defined in ORS 540.505 or of a diking district formed under ORS Chapter 551, nor was it within the boundaries of such a district on the look-back date of June 28, 2007, which is included in the definition.[3] The Applicant has confirmed with the Columbia Irrigation District (CID), which serves portions of Morrow County, that the Project Area Extent is not within their district boundaries.

ORS 195.300(10)(f) *Land that is in an exclusive farm use zone and that is no more than 3,000 feet above mean sea level, with an aspect between 67.5 and 292.5 degrees and a slope between zero and 15 percent, and that is located within:*

(A) The portion of the Columbia Gorge viticultural area as described in 27 C.F.R. 9.178 that is within the State of Oregon;
(B) The Rogue Valley viticultural area as described in 27 C.F.R. 9.132*;*
(C) The portion of the Columbia Valley viticultural area as described in 27 C.F.R. 9.74 that is within the State of Oregon;
(D) The portion of the Walla Walla Valley viticultural area as described in 27 C.F.R. 9.91 that is within the State of Oregon; or
(E) The portion of the Snake River Valley viticultural area as described in 27 C.F.R. 9.208 that is within the State of Oregon.

Response: The Project Area Extent is located within the Exclusive Farm Use ("EFU") zone, is below 3,000 feet above mean sea level and is located within the Columbia Valley AVA. The critical factor for whether the Project Area Extent consist of high-value farmland under this criterion is the slope and aspect of the land[4]. To evaluate slope and aspect, the Applicant utilized a dataset created by the Oregon Ocean-Coastal Management Program - Department of Land Conservation and Development (titled sde.gis.pln_or_viticultural_areas_2007), which identifies land that meets these conditions. As shown in Figure 2, that dataset shows that some portions of the Project Area Extent are considered high-value farmland by this definition because the land has a slope between 0 and 15 percent and an aspect that is between 67.5 and 292.5 degrees. As depicted in Figure 2, 153 acres of the Project Area Extent are considered high-value farmland under ORS 195.300(10)(f)(C).

[3] It is important when reading the statute to note the use of the word "on" when establishing the June 28, 2007 date. The language does not say "since" or "on or following" it specifically says "on." The plain language of the statute makes clear that the legislature intended to impose a specific "look back date" for purposes of applying the new high-value farmland definitions adopted under the Measure 37/49 regime.
[4] Aspect refers to the compass direction that a slope is facing.

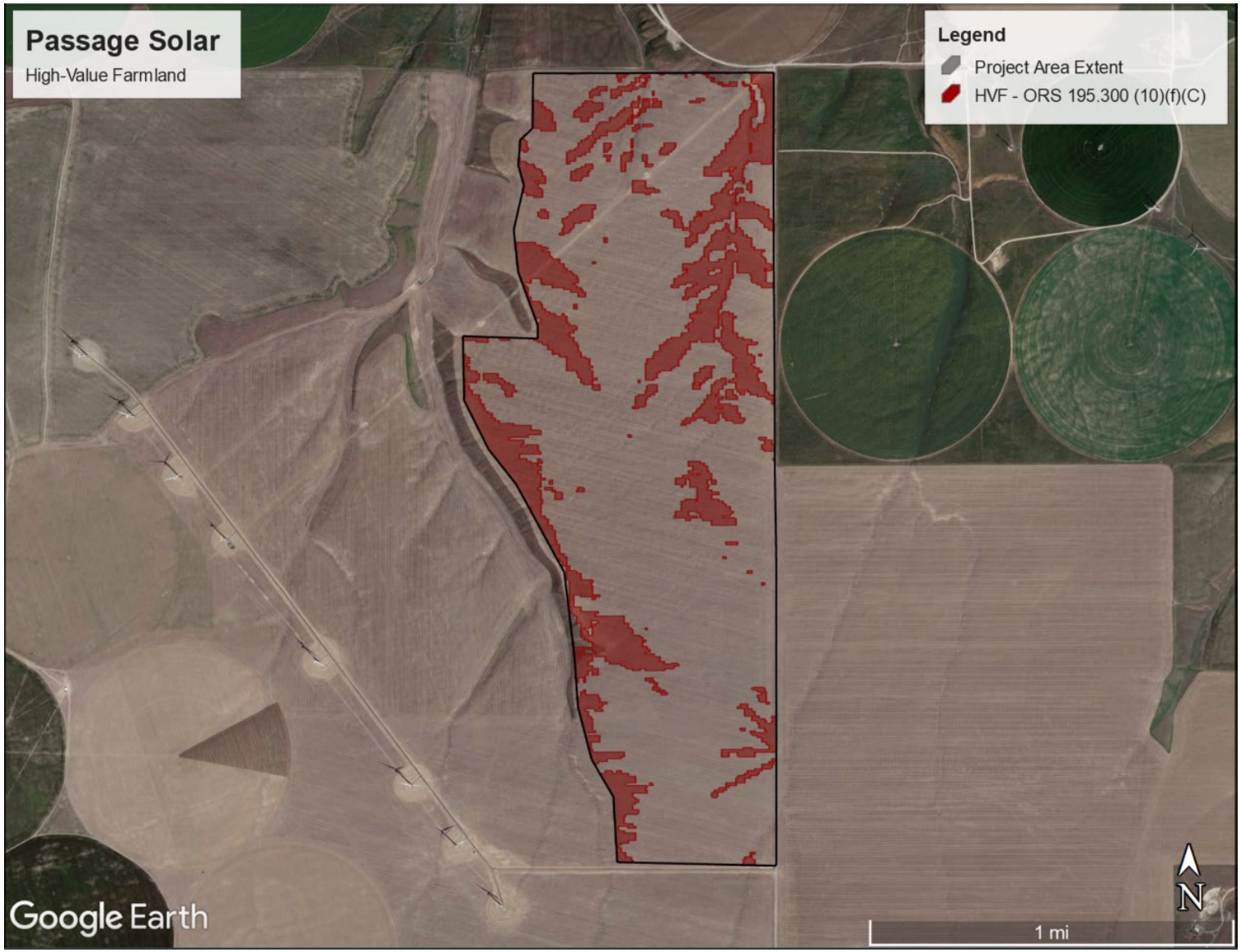


Figure 2: High-Value Farmland Soils Map within the Project Area Extent

IV. Arable and Non-Arable Land

OAR 660-033-0130(38) provides the following definitions for arable and non-arable land and soils.

OAR 660-033-0130(38)(a) *"Arable land" means land in a tract that is predominantly cultivated or, if not currently cultivated, predominantly comprised of arable soils.*

Response: The Project Tract is predominately cultivated and therefore the Project Area Extent is considered arable land.

OAR 660-033-0130(38)(b) *"Arable soils" means soils that are suitable for cultivation as determined by the governing body or its designate based on substantial evidence in the record of a local land use application but do not include high-value farmland soils described at ORS 195.300(10) unless otherwise stated.*

Response: Based on the definition of non-arable soils below (which states that non-arable soils are NRCS Class V-VIII), the Applicant is considering "arable soils" to mean soils with a NRCS Class I-IV. As demonstrated in Table 2, there are 749.3 acres of Class I-IV soils in the Project Area Extent. However, the definition states that arable soils "do not include high-value farmland soils." There are 152.5 acres of arable soils that overlap with high-value farmland soils within the Project Area Extent, therefore, the Project Area Extent has 596.8 acres of arable soils, not including those already designated as HVF (see Table 4 below).

OAR 660-033-0130(38)(d) *"Nonarable land" means land in a tract that is predominately not cultivated and predominately comprised of nonarable soils.*

OAR 660-033-0130(38)(e) *"Nonarable soils" means soils that are not suitable for cultivation. Soils with an NRCS agricultural capability class V-VIII and no history of irrigation shall be considered nonarable in all cases. The governing body or its designate may determine other soils, including soils with a past history of irrigation, to be nonarable based on substantial evidence in the record of a local land use application.*

Response: The Project Tract is predominately cultivated therefore the soils cannot be considered "nonarable land" and it is not predominately comprised of nonarable soils.

	High Value Farmland	Not High Value Farmland	Total
Arable Soils	152.5	596.8	749.3
Nonarable Soils	0.4	3.3	3.7
Total	152.9	600.1	**753**

Table 4: Soil Designations and HVF acreage within Project Area Extent

.

Appendix 1: NRCS Soils Report – Project Area Extent

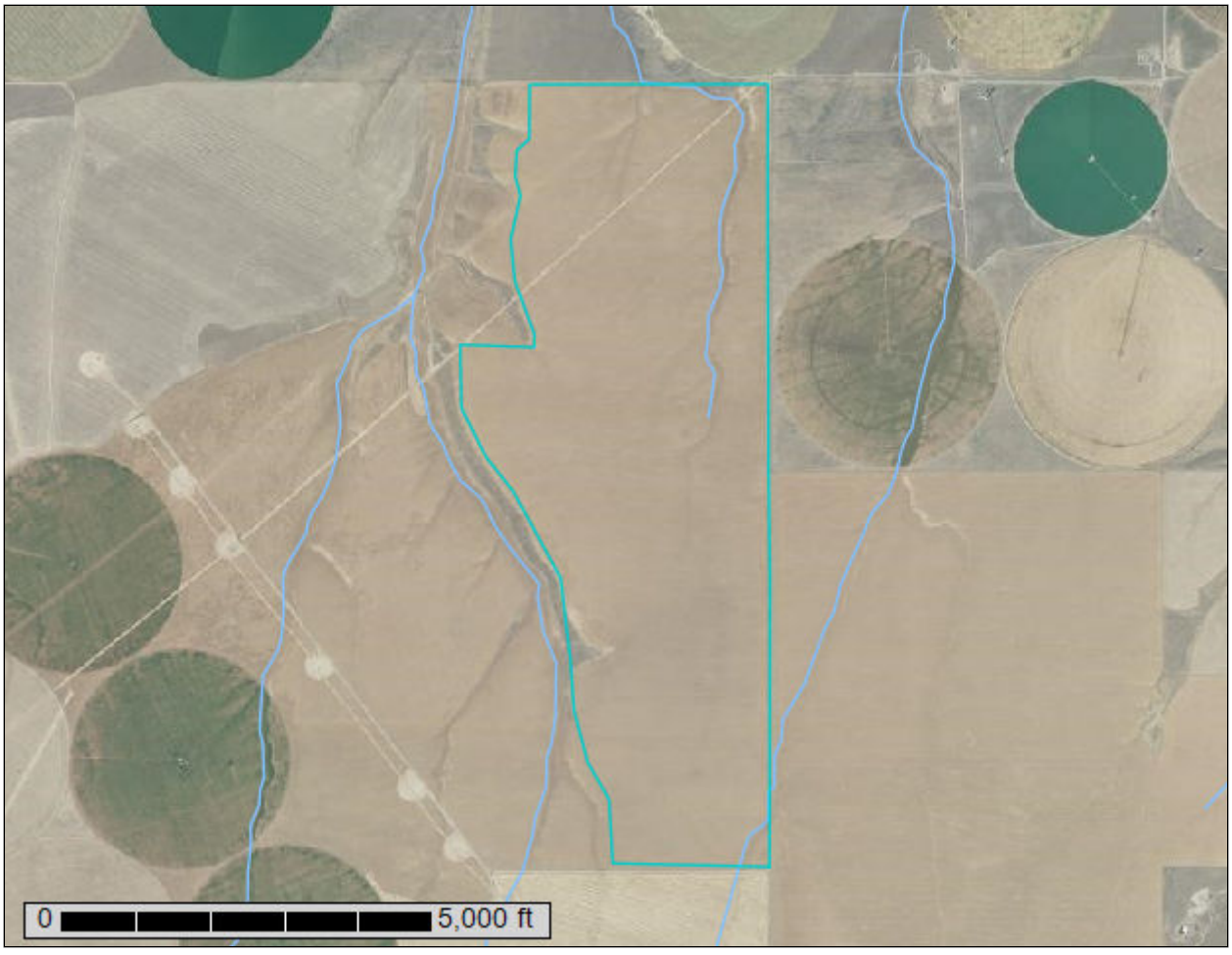
United States Department of Agriculture

NRCS

Natural Resources Conservation Service

A product of the National Cooperative Soil Survey, a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local participants

Custom Soil Resource Report for Morrow County Area, Oregon, and Umatilla County Area, Oregon



January 19, 2024

Preface

Soil surveys contain information that affects land use planning in survey areas. They highlight soil limitations that affect various land uses and provide information about the properties of the soils in the survey areas. Soil surveys are designed for many different users, including farmers, ranchers, foresters, agronomists, urban planners, community officials, engineers, developers, builders, and home buyers. Also, conservationists, teachers, students, and specialists in recreation, waste disposal, and pollution control can use the surveys to help them understand, protect, or enhance the environment.

Various land use regulations of Federal, State, and local governments may impose special restrictions on land use or land treatment. Soil surveys identify soil properties that are used in making various land use or land treatment decisions. The information is intended to help the land users identify and reduce the effects of soil limitations on various land uses. The landowner or user is responsible for identifying and complying with existing laws and regulations.

Although soil survey information can be used for general farm, local, and wider area planning, onsite investigation is needed to supplement this information in some cases. Examples include soil quality assessments (http://www.nrcs.usda.gov/wps/portal/nrcs/main/soils/health/) and certain conservation and engineering applications. For more detailed information, contact your local USDA Service Center (https://offices.sc.egov.usda.gov/locator/app?agency=nrcs) or your NRCS State Soil Scientist (http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/contactus/?cid=nrcs142p2_053951).

Great differences in soil properties can occur within short distances. Some soils are seasonally wet or subject to flooding. Some are too unstable to be used as a foundation for buildings or roads. Clayey or wet soils are poorly suited to use as septic tank absorption fields. A high water table makes a soil poorly suited to basements or underground installations.

The National Cooperative Soil Survey is a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local agencies. The Natural Resources Conservation Service (NRCS) has leadership for the Federal part of the National Cooperative Soil Survey.

Information about soils is updated periodically. Updated information is available through the NRCS Web Soil Survey, the site for official soil survey information.

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How Soil Surveys Are Made

Soil surveys are made to provide information about the soils and miscellaneous areas in a specific area. They include a description of the soils and miscellaneous areas and their location on the landscape and tables that show soil properties and limitations affecting various uses. Soil scientists observed the steepness, length, and shape of the slopes; the general pattern of drainage; the kinds of crops and native plants; and the kinds of bedrock. They observed and described many soil profiles. A soil profile is the sequence of natural layers, or horizons, in a soil. The profile extends from the surface down into the unconsolidated material in which the soil formed or from the surface down to bedrock. The unconsolidated material is devoid of roots and other living organisms and has not been changed by other biological activity.

Currently, soils are mapped according to the boundaries of major land resource areas (MLRAs). MLRAs are geographically associated land resource units that share common characteristics related to physiography, geology, climate, water resources, soils, biological resources, and land uses (USDA, 2006). Soil survey areas typically consist of parts of one or more MLRA.

The soils and miscellaneous areas in a survey area occur in an orderly pattern that is related to the geology, landforms, relief, climate, and natural vegetation of the area. Each kind of soil and miscellaneous area is associated with a particular kind of landform or with a segment of the landform. By observing the soils and miscellaneous areas in the survey area and relating their position to specific segments of the landform, a soil scientist develops a concept, or model, of how they were formed. Thus, during mapping, this model enables the soil scientist to predict with a considerable degree of accuracy the kind of soil or miscellaneous area at a specific location on the landscape.

Commonly, individual soils on the landscape merge into one another as their characteristics gradually change. To construct an accurate soil map, however, soil scientists must determine the boundaries between the soils. They can observe only a limited number of soil profiles. Nevertheless, these observations, supplemented by an understanding of the soil-vegetation-landscape relationship, are sufficient to verify predictions of the kinds of soil in an area and to determine the boundaries.

Soil scientists recorded the characteristics of the soil profiles that they studied. They noted soil color, texture, size and shape of soil aggregates, kind and amount of rock fragments, distribution of plant roots, reaction, and other features that enable them to identify soils. After describing the soils in the survey area and determining their properties, the soil scientists assigned the soils to taxonomic classes (units). Taxonomic classes are concepts. Each taxonomic class has a set of soil characteristics with precisely defined limits. The classes are used as a basis for comparison to classify soils systematically. Soil taxonomy, the system of taxonomic classification used in the United States, is based mainly on the kind and character of soil properties and the arrangement of horizons within the profile. After the soil

scientists classified and named the soils in the survey area, they compared the individual soils with similar soils in the same taxonomic class in other areas so that they could confirm data and assemble additional data based on experience and research.

The objective of soil mapping is not to delineate pure map unit components; the objective is to separate the landscape into landforms or landform segments that have similar use and management requirements. Each map unit is defined by a unique combination of soil components and/or miscellaneous areas in predictable proportions. Some components may be highly contrasting to the other components of the map unit. The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The delineation of such landforms and landform segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, onsite investigation is needed to define and locate the soils and miscellaneous areas.

Soil scientists make many field observations in the process of producing a soil map. The frequency of observation is dependent upon several factors, including scale of mapping, intensity of mapping, design of map units, complexity of the landscape, and experience of the soil scientist. Observations are made to test and refine the soil-landscape model and predictions and to verify the classification of the soils at specific locations. Once the soil-landscape model is refined, a significantly smaller number of measurements of individual soil properties are made and recorded. These measurements may include field measurements, such as those for color, depth to bedrock, and texture, and laboratory measurements, such as those for content of sand, silt, clay, salt, and other components. Properties of each soil typically vary from one point to another across the landscape.

Observations for map unit components are aggregated to develop ranges of characteristics for the components. The aggregated values are presented. Direct measurements do not exist for every property presented for every map unit component. Values for some properties are estimated from combinations of other properties.

While a soil survey is in progress, samples of some of the soils in the area generally are collected for laboratory analyses and for engineering tests. Soil scientists interpret the data from these analyses and tests as well as the field-observed characteristics and the soil properties to determine the expected behavior of the soils under different uses. Interpretations for all of the soils are field tested through observation of the soils in different uses and under different levels of management. Some interpretations are modified to fit local conditions, and some new interpretations are developed to meet local needs. Data are assembled from other sources, such as research information, production records, and field experience of specialists. For example, data on crop yields under defined levels of management are assembled from farm records and from field or plot experiments on the same kinds of soil.

Predictions about soil behavior are based not only on soil properties but also on such variables as climate and biological activity. Soil conditions are predictable over long periods of time, but they are not predictable from year to year. For example, soil scientists can predict with a fairly high degree of accuracy that a given soil will have a high water table within certain depths in most years, but they cannot predict that a high water table will always be at a specific level in the soil on a specific date.

After soil scientists located and identified the significant natural bodies of soil in the survey area, they drew the boundaries of these bodies on aerial photographs and

identified each as a specific map unit. Aerial photographs show trees, buildings, fields, roads, and rivers, all of which help in locating boundaries accurately.

Soil Map

The soil map section includes the soil map for the defined area of interest, a list of soil map units on the map and extent of each map unit, and cartographic symbols displayed on the map. Also presented are various metadata about data used to produce the map, and a description of each soil map unit.

Custom Soil Resource Report
Soil Map

MAP LEGEND

Area of Interest (AOI)

- Area of Interest (AOI)

Soils

- Soil Map Unit Polygons
- Soil Map Unit Lines
- Soil Map Unit Points

Special Point Features

- Blowout
- Borrow Pit
- Clay Spot
- Closed Depression
- Gravel Pit
- Gravelly Spot
- Landfill
- Lava Flow
- Marsh or swamp
- Mine or Quarry
- Miscellaneous Water
- Perennial Water
- Rock Outcrop
- Saline Spot
- Sandy Spot
- Severely Eroded Spot
- Sinkhole
- Slide or Slip
- Sodic Spot
- Spoil Area
- Stony Spot
- Very Stony Spot
- Wet Spot
- Other
- Special Line Features

Water Features

- Streams and Canals

Transportation

- Rails
- Interstate Highways
- US Routes
- Major Roads
- Local Roads

Background

- Aerial Photography

MAP INFORMATION

The soil surveys that comprise your AOI were mapped at scales ranging from 1:20,000 to 1:24,000.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service
Web Soil Survey URL:
Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Morrow County Area, Oregon
Survey Area Data: Version 11, Sep 8, 2023

Soil Survey Area: Umatilla County Area, Oregon
Survey Area Data: Version 22, Sep 13, 2023

Your area of interest (AOI) includes more than one soil survey area. These survey areas may have been mapped at different scales, with a different land use in mind, at different times, or at different levels of detail. This may result in map unit symbols, soil properties, and interpretations that do not completely agree across soil survey area boundaries.

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Jun 3, 2020—Jun 26, 2020

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background

MAP LEGEND	MAP INFORMATION
	imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
13E	Gravden very gravelly loam, 20 to 40 percent slopes	3.4	0.5%
44B	Ritzville very fine sandy loam, 2 to 7 percent slopes	636.9	84.6%
44C	Ritzville very fine sandy loam, 7 to 12 percent slopes	69.5	9.2%
45A	Ritzville silt loam, 0 to 2 percent slopes	0.3	0.0%
45B	Ritzville silt loam, 2 to 7 percent slopes	7.9	1.1%
75C	Willis silt loam, 5 to 12 percent slopes	34.7	4.6%
Subtotals for Soil Survey Area		**752.6**	**100.0%**
Totals for Area of Interest		**752.7**	**100.0%**

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
79B	Ritzville very fine sandy loam, 2 to 7 percent slopes	0.0	0.0%
80B	Ritzville silt loam, 2 to 7 percent slopes	0.0	0.0%
Subtotals for Soil Survey Area		**0.0**	**0.0%**
Totals for Area of Interest		**752.7**	**100.0%**

Map Unit Descriptions

The map units delineated on the detailed soil maps in a soil survey represent the soils or miscellaneous areas in the survey area. The map unit descriptions, along with the maps, can be used to determine the composition and properties of a unit.

A map unit delineation on a soil map represents an area dominated by one or more major kinds of soil or miscellaneous areas. A map unit is identified and named according to the taxonomic classification of the dominant soils. Within a taxonomic class there are precisely defined limits for the properties of the soils. On the landscape, however, the soils are natural phenomena, and they have the characteristic variability of all natural phenomena. Thus, the range of some observed properties may extend beyond the limits defined for a taxonomic class. Areas of soils of a single taxonomic class rarely, if ever, can be mapped without including areas of other taxonomic classes. Consequently, every map unit is made up of the soils or miscellaneous areas for which it is named and some minor components that belong to taxonomic classes other than those of the major soils.

Most minor soils have properties similar to those of the dominant soil or soils in the map unit, and thus they do not affect use and management. These are called

noncontrasting, or similar, components. They may or may not be mentioned in a particular map unit description. Other minor components, however, have properties and behavioral characteristics divergent enough to affect use or to require different management. These are called contrasting, or dissimilar, components. They generally are in small areas and could not be mapped separately because of the scale used. Some small areas of strongly contrasting soils or miscellaneous areas are identified by a special symbol on the maps. If included in the database for a given area, the contrasting minor components are identified in the map unit descriptions along with some characteristics of each. A few areas of minor components may not have been observed, and consequently they are not mentioned in the descriptions, especially where the pattern was so complex that it was impractical to make enough observations to identify all the soils and miscellaneous areas on the landscape.

The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The objective of mapping is not to delineate pure taxonomic classes but rather to separate the landscape into landforms or landform segments that have similar use and management requirements. The delineation of such segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, however, onsite investigation is needed to define and locate the soils and miscellaneous areas.

An identifying symbol precedes the map unit name in the map unit descriptions. Each description includes general facts about the unit and gives important soil properties and qualities.

Soils that have profiles that are almost alike make up a *soil series*. Except for differences in texture of the surface layer, all the soils of a series have major horizons that are similar in composition, thickness, and arrangement.

Soils of one series can differ in texture of the surface layer, slope, stoniness, salinity, degree of erosion, and other characteristics that affect their use. On the basis of such differences, a soil series is divided into *soil phases*. Most of the areas shown on the detailed soil maps are phases of soil series. The name of a soil phase commonly indicates a feature that affects use or management. For example, Alpha silt loam, 0 to 2 percent slopes, is a phase of the Alpha series.

Some map units are made up of two or more major soils or miscellaneous areas. These map units are complexes, associations, or undifferentiated groups.

A *complex* consists of two or more soils or miscellaneous areas in such an intricate pattern or in such small areas that they cannot be shown separately on the maps. The pattern and proportion of the soils or miscellaneous areas are somewhat similar in all areas. Alpha-Beta complex, 0 to 6 percent slopes, is an example.

An *association* is made up of two or more geographically associated soils or miscellaneous areas that are shown as one unit on the maps. Because of present or anticipated uses of the map units in the survey area, it was not considered practical or necessary to map the soils or miscellaneous areas separately. The pattern and relative proportion of the soils or miscellaneous areas are somewhat similar. Alpha-Beta association, 0 to 2 percent slopes, is an example.

An *undifferentiated group* is made up of two or more soils or miscellaneous areas that could be mapped individually but are mapped as one unit because similar interpretations can be made for use and management. The pattern and proportion of the soils or miscellaneous areas in a mapped area are not uniform. An area can

be made up of only one of the major soils or miscellaneous areas, or it can be made up of all of them. Alpha and Beta soils, 0 to 2 percent slopes, is an example.

Some surveys include *miscellaneous areas*. Such areas have little or no soil material and support little or no vegetation. Rock outcrop is an example.

Morrow County Area, Oregon

13E—Gravden very gravelly loam, 20 to 40 percent slopes

Map Unit Setting

National map unit symbol: 21rx
Elevation: 500 to 1,700 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 50 to 54 degrees F
Frost-free period: 150 to 190 days
Farmland classification: Not prime farmland

Map Unit Composition

Gravden and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Gravden

Setting

Landform: Hillslopes
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Gravelly alluvium and colluvium

Typical profile

H1 - 0 to 3 inches: very gravelly loam
H2 - 3 to 7 inches: very gravelly loam
H3 - 7 to 14 inches: extremely gravelly loam
H4 - 14 to 20 inches: cemented material
H5 - 20 to 60 inches: cemented material

Properties and qualities

Slope: 20 to 40 percent
Depth to restrictive feature: 10 to 20 inches to duripan; 20 to 60 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very low (about 1.1 inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 7e
Hydrologic Soil Group: D
Ecological site: R007XY020OR - South 8-10 PZ
Hydric soil rating: No

44B—Ritzville very fine sandy loam, 2 to 7 percent slopes

Map Unit Setting

National map unit symbol: 21tj
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: very fine sandy loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 2 to 7 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.6 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY130OR - Sandy Loam 10-12 PZ
Hydric soil rating: No

44C—Ritzville very fine sandy loam, 7 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21tk
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: very fine sandy loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 7 to 12 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.6 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY130OR - Sandy Loam 10-12 PZ
Hydric soil rating: No

45A—Ritzville silt loam, 0 to 2 percent slopes

Map Unit Setting

National map unit symbol: 21tm
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 0 to 2 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 1
Land capability classification (nonirrigated): 3c
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

45B—Ritzville silt loam, 2 to 7 percent slopes

Map Unit Setting

National map unit symbol: 21tn
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 77 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 2 to 7 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

75C—Willis silt loam, 5 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21wg
Elevation: 1,000 to 2,000 feet
Mean annual precipitation: 9 to 11 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 140 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Willis and similar soils: 90 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Willis

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess over cemented alluvium

Typical profile

H1 - 0 to 12 inches: silt loam
H2 - 12 to 27 inches: silt loam
H3 - 27 to 35 inches: silt loam
H4 - 35 to 39 inches: cemented material

Properties and qualities

Slope: 5 to 12 percent
Depth to restrictive feature: 20 to 40 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 6.8 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: C
Ecological site: R007XY014OR - Loamy 8-10 PZ
Hydric soil rating: No

Umatilla County Area, Oregon

79B—Ritzville very fine sandy loam, 2 to 7 percent slopes

Map Unit Setting

National map unit symbol: 255k
Elevation: 900 to 1,900 feet
Mean annual precipitation: 10 to 12 inches
Mean annual air temperature: 50 to 54 degrees F
Frost-free period: 150 to 170 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Hills
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 8 inches: very fine sandy loam
H2 - 8 to 30 inches: silt loam
H3 - 30 to 60 inches: silt loam

Properties and qualities

Slope: 2 to 7 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.7 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY130OR - Sandy Loam 10-12 PZ
Hydric soil rating: No

80B—Ritzville silt loam, 2 to 7 percent slopes

Map Unit Setting

National map unit symbol: 255q
Elevation: 900 to 1,900 feet
Mean annual precipitation: 10 to 12 inches
Mean annual air temperature: 50 to 54 degrees F
Frost-free period: 150 to 170 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Hills
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 8 inches: silt loam
H2 - 8 to 30 inches: silt loam
H3 - 30 to 60 inches: silt loam

Properties and qualities

Slope: 2 to 7 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 12.0 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

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Appendix 2: NRCS Soils Report – Project Tract

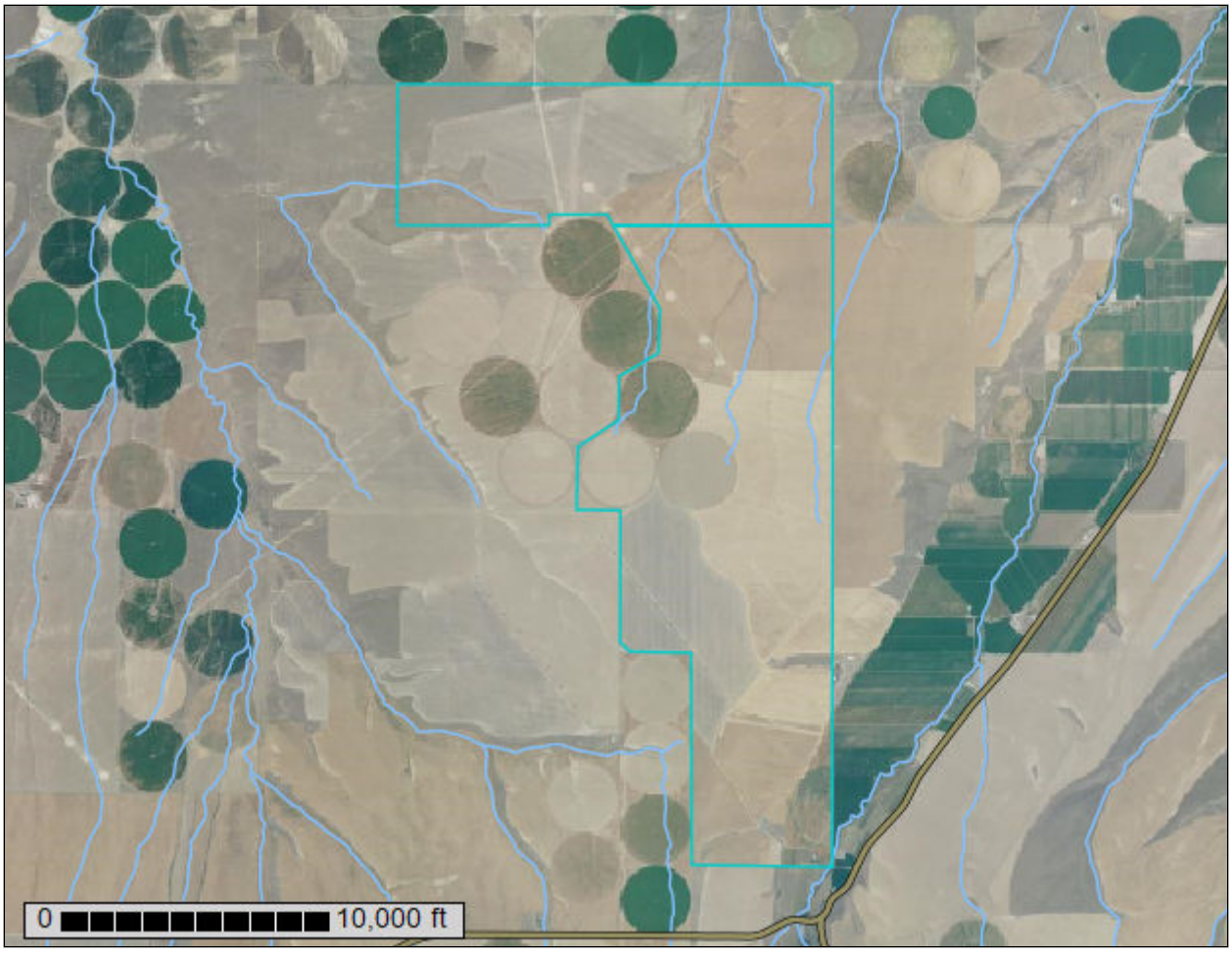
United States Department of Agriculture

NRCS

Natural Resources Conservation Service

A product of the National Cooperative Soil Survey, a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local participants

Custom Soil Resource Report for Morrow County Area, Oregon



January 19, 2024

Preface

Soil surveys contain information that affects land use planning in survey areas. They highlight soil limitations that affect various land uses and provide information about the properties of the soils in the survey areas. Soil surveys are designed for many different users, including farmers, ranchers, foresters, agronomists, urban planners, community officials, engineers, developers, builders, and home buyers. Also, conservationists, teachers, students, and specialists in recreation, waste disposal, and pollution control can use the surveys to help them understand, protect, or enhance the environment.

Various land use regulations of Federal, State, and local governments may impose special restrictions on land use or land treatment. Soil surveys identify soil properties that are used in making various land use or land treatment decisions. The information is intended to help the land users identify and reduce the effects of soil limitations on various land uses. The landowner or user is responsible for identifying and complying with existing laws and regulations.

Although soil survey information can be used for general farm, local, and wider area planning, onsite investigation is needed to supplement this information in some cases. Examples include soil quality assessments (http://www.nrcs.usda.gov/wps/portal/nrcs/main/soils/health/) and certain conservation and engineering applications. For more detailed information, contact your local USDA Service Center (https://offices.sc.egov.usda.gov/locator/app?agency=nrcs) or your NRCS State Soil Scientist (http://www.nrcs.usda.gov/wps/portal/nrcs/detail/soils/contactus/?cid=nrcs142p2_053951).

Great differences in soil properties can occur within short distances. Some soils are seasonally wet or subject to flooding. Some are too unstable to be used as a foundation for buildings or roads. Clayey or wet soils are poorly suited to use as septic tank absorption fields. A high water table makes a soil poorly suited to basements or underground installations.

The National Cooperative Soil Survey is a joint effort of the United States Department of Agriculture and other Federal agencies, State agencies including the Agricultural Experiment Stations, and local agencies. The Natural Resources Conservation Service (NRCS) has leadership for the Federal part of the National Cooperative Soil Survey.

Information about soils is updated periodically. Updated information is available through the NRCS Web Soil Survey, the site for official soil survey information.

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How Soil Surveys Are Made

Soil surveys are made to provide information about the soils and miscellaneous areas in a specific area. They include a description of the soils and miscellaneous areas and their location on the landscape and tables that show soil properties and limitations affecting various uses. Soil scientists observed the steepness, length, and shape of the slopes; the general pattern of drainage; the kinds of crops and native plants; and the kinds of bedrock. They observed and described many soil profiles. A soil profile is the sequence of natural layers, or horizons, in a soil. The profile extends from the surface down into the unconsolidated material in which the soil formed or from the surface down to bedrock. The unconsolidated material is devoid of roots and other living organisms and has not been changed by other biological activity.

Currently, soils are mapped according to the boundaries of major land resource areas (MLRAs). MLRAs are geographically associated land resource units that share common characteristics related to physiography, geology, climate, water resources, soils, biological resources, and land uses (USDA, 2006). Soil survey areas typically consist of parts of one or more MLRA.

The soils and miscellaneous areas in a survey area occur in an orderly pattern that is related to the geology, landforms, relief, climate, and natural vegetation of the area. Each kind of soil and miscellaneous area is associated with a particular kind of landform or with a segment of the landform. By observing the soils and miscellaneous areas in the survey area and relating their position to specific segments of the landform, a soil scientist develops a concept, or model, of how they were formed. Thus, during mapping, this model enables the soil scientist to predict with a considerable degree of accuracy the kind of soil or miscellaneous area at a specific location on the landscape.

Commonly, individual soils on the landscape merge into one another as their characteristics gradually change. To construct an accurate soil map, however, soil scientists must determine the boundaries between the soils. They can observe only a limited number of soil profiles. Nevertheless, these observations, supplemented by an understanding of the soil-vegetation-landscape relationship, are sufficient to verify predictions of the kinds of soil in an area and to determine the boundaries.

Soil scientists recorded the characteristics of the soil profiles that they studied. They noted soil color, texture, size and shape of soil aggregates, kind and amount of rock fragments, distribution of plant roots, reaction, and other features that enable them to identify soils. After describing the soils in the survey area and determining their properties, the soil scientists assigned the soils to taxonomic classes (units). Taxonomic classes are concepts. Each taxonomic class has a set of soil characteristics with precisely defined limits. The classes are used as a basis for comparison to classify soils systematically. Soil taxonomy, the system of taxonomic classification used in the United States, is based mainly on the kind and character of soil properties and the arrangement of horizons within the profile. After the soil

scientists classified and named the soils in the survey area, they compared the individual soils with similar soils in the same taxonomic class in other areas so that they could confirm data and assemble additional data based on experience and research.

The objective of soil mapping is not to delineate pure map unit components; the objective is to separate the landscape into landforms or landform segments that have similar use and management requirements. Each map unit is defined by a unique combination of soil components and/or miscellaneous areas in predictable proportions. Some components may be highly contrasting to the other components of the map unit. The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The delineation of such landforms and landform segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, onsite investigation is needed to define and locate the soils and miscellaneous areas.

Soil scientists make many field observations in the process of producing a soil map. The frequency of observation is dependent upon several factors, including scale of mapping, intensity of mapping, design of map units, complexity of the landscape, and experience of the soil scientist. Observations are made to test and refine the soil-landscape model and predictions and to verify the classification of the soils at specific locations. Once the soil-landscape model is refined, a significantly smaller number of measurements of individual soil properties are made and recorded. These measurements may include field measurements, such as those for color, depth to bedrock, and texture, and laboratory measurements, such as those for content of sand, silt, clay, salt, and other components. Properties of each soil typically vary from one point to another across the landscape.

Observations for map unit components are aggregated to develop ranges of characteristics for the components. The aggregated values are presented. Direct measurements do not exist for every property presented for every map unit component. Values for some properties are estimated from combinations of other properties.

While a soil survey is in progress, samples of some of the soils in the area generally are collected for laboratory analyses and for engineering tests. Soil scientists interpret the data from these analyses and tests as well as the field-observed characteristics and the soil properties to determine the expected behavior of the soils under different uses. Interpretations for all of the soils are field tested through observation of the soils in different uses and under different levels of management. Some interpretations are modified to fit local conditions, and some new interpretations are developed to meet local needs. Data are assembled from other sources, such as research information, production records, and field experience of specialists. For example, data on crop yields under defined levels of management are assembled from farm records and from field or plot experiments on the same kinds of soil.

Predictions about soil behavior are based not only on soil properties but also on such variables as climate and biological activity. Soil conditions are predictable over long periods of time, but they are not predictable from year to year. For example, soil scientists can predict with a fairly high degree of accuracy that a given soil will have a high water table within certain depths in most years, but they cannot predict that a high water table will always be at a specific level in the soil on a specific date.

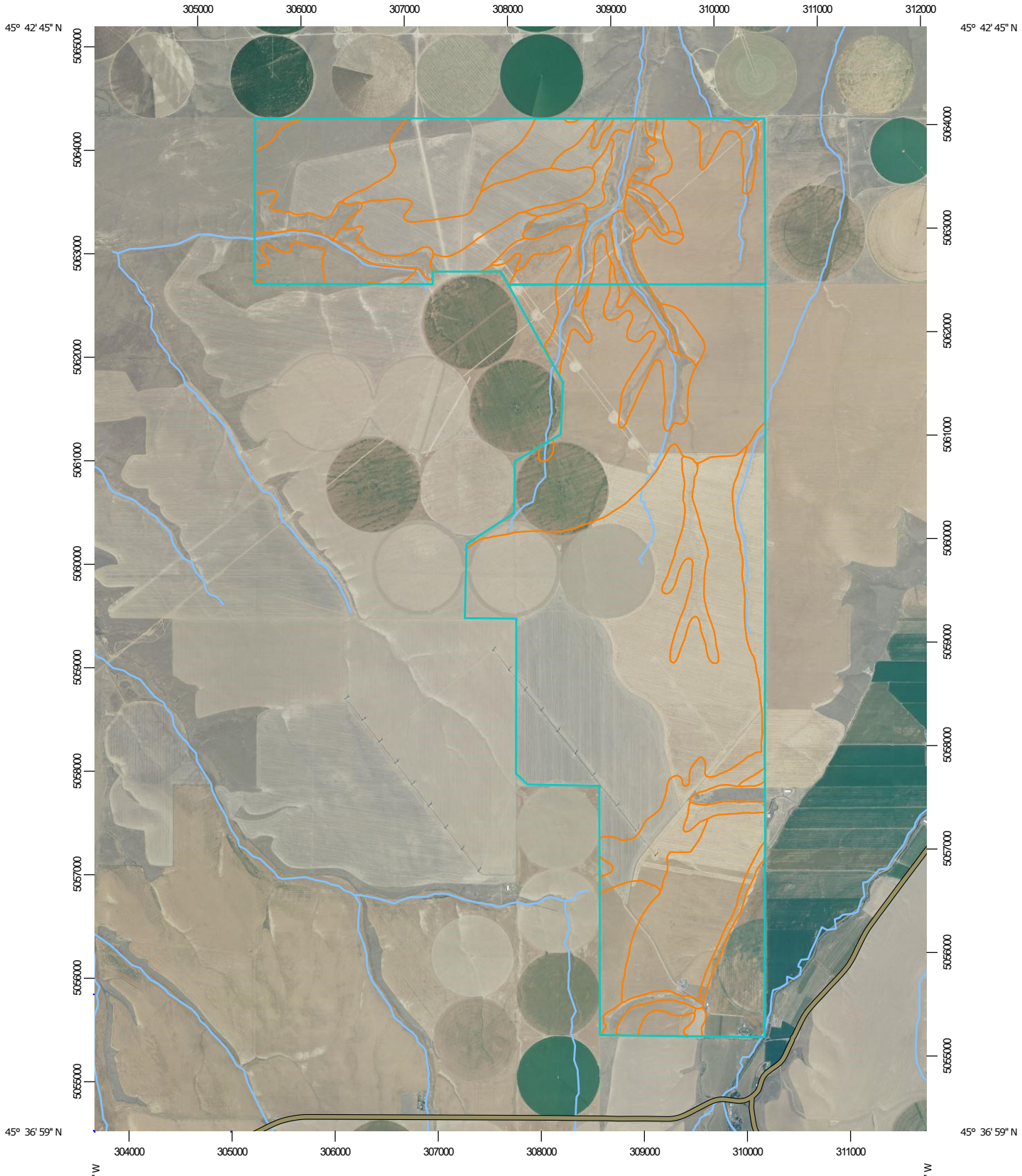
After soil scientists located and identified the significant natural bodies of soil in the survey area, they drew the boundaries of these bodies on aerial photographs and

identified each as a specific map unit. Aerial photographs show trees, buildings, fields, roads, and rivers, all of which help in locating boundaries accurately.

Soil Map

The soil map section includes the soil map for the defined area of interest, a list of soil map units on the map and extent of each map unit, and cartographic symbols displayed on the map. Also presented are various metadata about data used to produce the map, and a description of each soil map unit.

Custom Soil Resource Report
Soil Map



Map Scale: 1:52,000 if printed on A portrait (8.5" x 11") sheet.

N

Meters
0 500 1000 2000 3000

Feet
0 2500 5000 10000 15000

Map projection: Web Mercator Corner coordinates: WGS84 Edge tics: UTM Zone 11N WGS84

MAP LEGEND

Area of Interest (AOI)

- Area of Interest (AOI)

Soils

- Soil Map Unit Polygons
- Soil Map Unit Lines
- Soil Map Unit Points

Special Point Features

- Blowout
- Borrow Pit
- Clay Spot
- Closed Depression
- Gravel Pit
- Gravelly Spot
- Landfill
- Lava Flow
- Marsh or swamp
- Mine or Quarry
- Miscellaneous Water
- Perennial Water
- Rock Outcrop
- Saline Spot
- Sandy Spot
- Severely Eroded Spot
- Sinkhole
- Slide or Slip
- Sodic Spot
- Spoil Area
- Stony Spot
- Very Stony Spot
- Wet Spot
- Other
- Special Line Features

Water Features

- Streams and Canals

Transportation

- Rails
- Interstate Highways
- US Routes
- Major Roads
- Local Roads

Background

- Aerial Photography

MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:24,000.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service
Web Soil Survey URL:
Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Morrow County Area, Oregon
Survey Area Data: Version 11, Sep 8, 2023

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Jun 3, 2020—Jun 26, 2020

The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.

Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
13D	Gravden very gravelly loam, 5 to 20 percent slopes	46.3	0.8%
13E	Gravden very gravelly loam, 20 to 40 percent slopes	121.1	2.1%
22	Kimberly fine sandy loam	0.0	0.0%
36	Pedigo silt loam	161.0	2.8%
44B	Ritzville very fine sandy loam, 2 to 7 percent slopes	1,482.1	25.6%
44C	Ritzville very fine sandy loam, 7 to 12 percent slopes	342.5	5.9%
45A	Ritzville silt loam, 0 to 2 percent slopes	1,716.7	29.6%
45B	Ritzville silt loam, 2 to 7 percent slopes	415.4	7.2%
45C	Ritzville silt loam, 7 to 12 percent slopes	368.6	6.4%
45D	Ritzville silt loam, 12 to 20 percent slopes	26.2	0.5%
47E	Ritzville silt loam, 20 to 40 percent south slopes	112.4	1.9%
52D	Royal fine sandy loam, 12 to 20 percent slopes	54.7	0.9%
54B	Sagehill fine sandy loam, 2 to 5 percent slopes	328.6	5.7%
54C	Sagehill fine sandy loam, 5 to 12 percent slopes	84.0	1.4%
54D	Sagehill fine sandy loam, 12 to 20 percent slopes	67.8	1.2%
55B	Sagehill fine sandy loam, hummocky, 2 to 5 percent slopes	16.6	0.3%
58A	Taunton fine sandy loam, 0 to 2 percent slopes	252.3	4.4%
75B	Willis silt loam, 2 to 5 percent slopes	39.1	0.7%
75C	Willis silt loam, 5 to 12 percent slopes	112.5	1.9%
75D	Willis silt loam, 12 to 20 percent slopes	26.2	0.5%
88C	Burke silt loam, 7 to 12 percent slopes	25.2	0.4%
Totals for Area of Interest		**5,799.4**	**100.0%**

Map Unit Descriptions

The map units delineated on the detailed soil maps in a soil survey represent the soils or miscellaneous areas in the survey area. The map unit descriptions, along with the maps, can be used to determine the composition and properties of a unit.

A map unit delineation on a soil map represents an area dominated by one or more major kinds of soil or miscellaneous areas. A map unit is identified and named according to the taxonomic classification of the dominant soils. Within a taxonomic class there are precisely defined limits for the properties of the soils. On the landscape, however, the soils are natural phenomena, and they have the characteristic variability of all natural phenomena. Thus, the range of some observed properties may extend beyond the limits defined for a taxonomic class. Areas of soils of a single taxonomic class rarely, if ever, can be mapped without including areas of other taxonomic classes. Consequently, every map unit is made up of the soils or miscellaneous areas for which it is named and some minor components that belong to taxonomic classes other than those of the major soils.

Most minor soils have properties similar to those of the dominant soil or soils in the map unit, and thus they do not affect use and management. These are called noncontrasting, or similar, components. They may or may not be mentioned in a particular map unit description. Other minor components, however, have properties and behavioral characteristics divergent enough to affect use or to require different management. These are called contrasting, or dissimilar, components. They generally are in small areas and could not be mapped separately because of the scale used. Some small areas of strongly contrasting soils or miscellaneous areas are identified by a special symbol on the maps. If included in the database for a given area, the contrasting minor components are identified in the map unit descriptions along with some characteristics of each. A few areas of minor components may not have been observed, and consequently they are not mentioned in the descriptions, especially where the pattern was so complex that it was impractical to make enough observations to identify all the soils and miscellaneous areas on the landscape.

The presence of minor components in a map unit in no way diminishes the usefulness or accuracy of the data. The objective of mapping is not to delineate pure taxonomic classes but rather to separate the landscape into landforms or landform segments that have similar use and management requirements. The delineation of such segments on the map provides sufficient information for the development of resource plans. If intensive use of small areas is planned, however, onsite investigation is needed to define and locate the soils and miscellaneous areas.

An identifying symbol precedes the map unit name in the map unit descriptions. Each description includes general facts about the unit and gives important soil properties and qualities.

Soils that have profiles that are almost alike make up a *soil series*. Except for differences in texture of the surface layer, all the soils of a series have major horizons that are similar in composition, thickness, and arrangement.

Soils of one series can differ in texture of the surface layer, slope, stoniness, salinity, degree of erosion, and other characteristics that affect their use. On the basis of such differences, a soil series is divided into *soil phases*. Most of the areas

shown on the detailed soil maps are phases of soil series. The name of a soil phase commonly indicates a feature that affects use or management. For example, Alpha silt loam, 0 to 2 percent slopes, is a phase of the Alpha series.

Some map units are made up of two or more major soils or miscellaneous areas. These map units are complexes, associations, or undifferentiated groups.

A *complex* consists of two or more soils or miscellaneous areas in such an intricate pattern or in such small areas that they cannot be shown separately on the maps. The pattern and proportion of the soils or miscellaneous areas are somewhat similar in all areas. Alpha-Beta complex, 0 to 6 percent slopes, is an example.

An *association* is made up of two or more geographically associated soils or miscellaneous areas that are shown as one unit on the maps. Because of present or anticipated uses of the map units in the survey area, it was not considered practical or necessary to map the soils or miscellaneous areas separately. The pattern and relative proportion of the soils or miscellaneous areas are somewhat similar. Alpha-Beta association, 0 to 2 percent slopes, is an example.

An *undifferentiated group* is made up of two or more soils or miscellaneous areas that could be mapped individually but are mapped as one unit because similar interpretations can be made for use and management. The pattern and proportion of the soils or miscellaneous areas in a mapped area are not uniform. An area can be made up of only one of the major soils or miscellaneous areas, or it can be made up of all of them. Alpha and Beta soils, 0 to 2 percent slopes, is an example.

Some surveys include *miscellaneous areas*. Such areas have little or no soil material and support little or no vegetation. Rock outcrop is an example.

Morrow County Area, Oregon

13D—Gravden very gravelly loam, 5 to 20 percent slopes

Map Unit Setting

National map unit symbol: 21rw
Elevation: 500 to 1,700 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 50 to 54 degrees F
Frost-free period: 150 to 190 days
Farmland classification: Not prime farmland

Map Unit Composition

Gravden and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Gravden

Setting

Landform: Hillslopes
Landform position (two-dimensional): Shoulder
Landform position (three-dimensional): Nose slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Gravelly alluvium and colluvium

Typical profile

H1 - 0 to 3 inches: very gravelly loam
H2 - 3 to 7 inches: very gravelly loam
H3 - 7 to 14 inches: extremely gravelly loam
H4 - 14 to 20 inches: cemented material
H5 - 20 to 60 inches: cemented material

Properties and qualities

Slope: 5 to 20 percent
Depth to restrictive feature: 10 to 20 inches to duripan; 20 to 60 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very low (about 1.1 inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 7e
Hydrologic Soil Group: D
Ecological site: R007XY020OR - South 8-10 PZ
Hydric soil rating: No

13E—Gravden very gravelly loam, 20 to 40 percent slopes

Map Unit Setting

National map unit symbol: 21rx
Elevation: 500 to 1,700 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 50 to 54 degrees F
Frost-free period: 150 to 190 days
Farmland classification: Not prime farmland

Map Unit Composition

Gravden and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Gravden

Setting

Landform: Hillslopes
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Gravelly alluvium and colluvium

Typical profile

H1 - 0 to 3 inches: very gravelly loam
H2 - 3 to 7 inches: very gravelly loam
H3 - 7 to 14 inches: extremely gravelly loam
H4 - 14 to 20 inches: cemented material
H5 - 20 to 60 inches: cemented material

Properties and qualities

Slope: 20 to 40 percent
Depth to restrictive feature: 10 to 20 inches to duripan; 20 to 60 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very low (about 1.1 inches)

Interpretive groups

Land capability classification (irrigated): None specified
Land capability classification (nonirrigated): 7e
Hydrologic Soil Group: D
Ecological site: R007XY020OR - South 8-10 PZ
Hydric soil rating: No

22—Kimberly fine sandy loam

Map Unit Setting

National map unit symbol: 21sb
Elevation: 500 to 1,200 feet
Mean annual precipitation: 8 to 12 inches
Mean annual air temperature: 51 to 53 degrees F
Frost-free period: 140 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Kimberly and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Kimberly

Setting

Landform: Flood plains
Landform position (three-dimensional): Tread
Down-slope shape: Concave
Across-slope shape: Linear
Parent material: Mixed alluvium

Typical profile

H1 - 0 to 15 inches: fine sandy loam
H2 - 15 to 33 inches: sandy loam
H3 - 33 to 40 inches: sandy loam
H4 - 40 to 60 inches: sandy loam

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): High (1.98 to 5.95 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: Rare
Frequency of ponding: None
Calcium carbonate, maximum content: 8 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 7.8 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: A
Ecological site: R007XY010OR - Sandy Bottom 8-10 PZ
Hydric soil rating: No

36—Pedigo silt loam

Map Unit Setting

National map unit symbol: 21t2
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 11 to 14 inches
Mean annual air temperature: 49 to 51 degrees F
Frost-free period: 130 to 150 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Pedigo and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Pedigo

Setting

Landform: Flood plains
Landform position (three-dimensional): Tread
Down-slope shape: Concave
Across-slope shape: Linear
Parent material: Silty alluvium mixed with volcanic ash

Typical profile

H1 - 0 to 10 inches: silt loam
H2 - 10 to 66 inches: silt loam

Properties and qualities

Slope: 0 to 3 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Somewhat poorly drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: About 30 to 42 inches
Frequency of flooding: Rare
Frequency of ponding: None
Calcium carbonate, maximum content: 2 percent
Maximum salinity: Nonsaline to slightly saline (0.0 to 4.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 10.8 inches)

Interpretive groups

Land capability classification (irrigated): 2w
Land capability classification (nonirrigated): 3w
Hydrologic Soil Group: C
Ecological site: R010XY005OR - LOAMY BOTTOM
Hydric soil rating: No

44B—Ritzville very fine sandy loam, 2 to 7 percent slopes

Map Unit Setting

National map unit symbol: 21tj
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: very fine sandy loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 2 to 7 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.6 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY130OR - Sandy Loam 10-12 PZ
Hydric soil rating: No

44C—Ritzville very fine sandy loam, 7 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21tk
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: very fine sandy loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 7 to 12 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.6 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY130OR - Sandy Loam 10-12 PZ
Hydric soil rating: No

45A—Ritzville silt loam, 0 to 2 percent slopes

Map Unit Setting

National map unit symbol: 21tm
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 0 to 2 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 1
Land capability classification (nonirrigated): 3c
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

45B—Ritzville silt loam, 2 to 7 percent slopes

Map Unit Setting

National map unit symbol: 21tn
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Ritzville and similar soils: 77 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 2 to 7 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

45C—Ritzville silt loam, 7 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21tp
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 7 to 12 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

45D—Ritzville silt loam, 12 to 20 percent slopes

Map Unit Setting

National map unit symbol: 21tq
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Ritzville and similar soils: 70 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville

Setting

Landform: Plateaus
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 12 to 20 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 6e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: B
Ecological site: R008XY110OR - Loamy 10-12 PZ
Hydric soil rating: No

47E—Ritzville silt loam, 20 to 40 percent south slopes

Map Unit Setting

National map unit symbol: 21ts
Elevation: 1,000 to 2,500 feet
Mean annual precipitation: 9 to 12 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 130 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Ritzville, south, and similar soils: 60 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Ritzville, South

Setting

Landform: Hillslopes
Landform position (two-dimensional): Footslope, backslope
Landform position (three-dimensional): Side slope, head slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess mixed with small amounts of volcanic ash

Typical profile

H1 - 0 to 13 inches: silt loam
H2 - 13 to 33 inches: silt loam
H3 - 33 to 70 inches: silt loam

Properties and qualities

Slope: 20 to 40 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Very high (about 12.1 inches)

Interpretive groups

Land capability classification (irrigated): 6e
Land capability classification (nonirrigated): 6e
Hydrologic Soil Group: B
Ecological site: R008XY200OR - South 10-14 PZ
Hydric soil rating: No

52D—Royal fine sandy loam, 12 to 20 percent slopes

Map Unit Setting

National map unit symbol: 21v2
Elevation: 300 to 800 feet
Mean annual precipitation: 7 to 8 inches
Mean annual air temperature: 52 to 54 degrees F
Frost-free period: 150 to 200 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Royal and similar soils: 75 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Royal

Setting

Landform: Strath terraces
Landform position (three-dimensional): Riser
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Alluvium and glaciofluvial deposits reworked by wind

Typical profile

H1 - 0 to 6 inches: fine sandy loam
H2 - 6 to 14 inches: fine sandy loam
H3 - 14 to 60 inches: stratified fine sandy loam to very fine sandy loam

Properties and qualities

Slope: 12 to 20 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): High (1.98 to 5.95 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 7.2 inches)

Interpretive groups

Land capability classification (irrigated): 6e
Land capability classification (nonirrigated): 6e
Hydrologic Soil Group: A
Ecological site: R007XY013OR - Sandy Loam 8-10 PZ
Hydric soil rating: No

54B—Sagehill fine sandy loam, 2 to 5 percent slopes

Map Unit Setting

National map unit symbol: 21v4
Elevation: 510 to 1,200 feet
Mean annual precipitation: 8 to 9 inches
Mean annual air temperature: 49 to 53 degrees F
Frost-free period: 150 to 200 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Sagehill and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Sagehill

Setting

Landform: Strath terraces
Landform position (three-dimensional): Tread
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Sandy eolian deposits and loess over lacustrine deposits

Typical profile

H1 - 0 to 5 inches: fine sandy loam
H2 - 5 to 28 inches: fine sandy loam
H3 - 28 to 60 inches: stratified fine sandy loam to very fine sandy loam to silt loam

Properties and qualities

Slope: 2 to 5 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 35 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.4 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: B
Ecological site: R007XY013OR - Sandy Loam 8-10 PZ
Hydric soil rating: No

54C—Sagehill fine sandy loam, 5 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21v5
Elevation: 510 to 1,200 feet
Mean annual precipitation: 8 to 9 inches
Mean annual air temperature: 49 to 53 degrees F
Frost-free period: 150 to 200 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Sagehill and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Sagehill

Setting

Landform: Strath terraces
Landform position (three-dimensional): Riser
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Sandy eolian deposits and loess over lacustrine deposits

Typical profile

H1 - 0 to 5 inches: fine sandy loam
H2 - 5 to 28 inches: fine sandy loam
H3 - 28 to 60 inches: stratified fine sandy loam to very fine sandy loam to silt loam

Properties and qualities

Slope: 5 to 12 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 35 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.4 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: B
Ecological site: R007XY013OR - Sandy Loam 8-10 PZ
Hydric soil rating: No

54D—Sagehill fine sandy loam, 12 to 20 percent slopes

Map Unit Setting

National map unit symbol: 21v6
Elevation: 510 to 1,200 feet
Mean annual precipitation: 8 to 9 inches
Mean annual air temperature: 49 to 53 degrees F
Frost-free period: 150 to 200 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Sagehill and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Sagehill

Setting

Landform: Strath terraces
Landform position (three-dimensional): Riser
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Sandy eolian deposits and loess over lacustrine deposits

Typical profile

H1 - 0 to 5 inches: fine sandy loam
H2 - 5 to 28 inches: fine sandy loam
H3 - 28 to 60 inches: stratified fine sandy loam to very fine sandy loam to silt loam

Properties and qualities

Slope: 12 to 20 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 35 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.4 inches)

Interpretive groups

Land capability classification (irrigated): 6e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: B
Ecological site: R007XY013OR - Sandy Loam 8-10 PZ
Hydric soil rating: No

55B—Sagehill fine sandy loam, hummocky, 2 to 5 percent slopes

Map Unit Setting

National map unit symbol: 21v7
Elevation: 510 to 1,200 feet
Mean annual precipitation: 8 to 9 inches
Mean annual air temperature: 49 to 53 degrees F
Frost-free period: 150 to 200 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Sagehill, hummocky, and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Sagehill, Hummocky

Setting

Landform: Strath terraces
Landform position (three-dimensional): Tread
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Sandy eolian deposits and loess over lacustrine deposits

Typical profile

H1 - 0 to 5 inches: fine sandy loam
H2 - 5 to 28 inches: fine sandy loam
H3 - 28 to 60 inches: stratified fine sandy loam to very fine sandy loam to silt loam

Properties and qualities

Slope: 2 to 5 percent
Depth to restrictive feature: More than 80 inches
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Moderately high to high (0.57 to 1.98 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 35 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: High (about 11.4 inches)

Interpretive groups

Land capability classification (irrigated): 2e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: B
Ecological site: R007XY013OR - Sandy Loam 8-10 PZ
Hydric soil rating: No

58A—Taunton fine sandy loam, 0 to 2 percent slopes

Map Unit Setting

National map unit symbol: 21vc
Elevation: 700 to 1,000 feet
Mean annual precipitation: 8 to 9 inches
Mean annual air temperature: 49 to 52 degrees F
Frost-free period: 150 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Taunton and similar soils: 85 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Taunton

Setting

Landform: Strath terraces
Landform position (three-dimensional): Tread
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Eolian sands over strongly cemented alluvium

Typical profile

H1 - 0 to 5 inches: fine sandy loam
H2 - 5 to 15 inches: fine sandy loam
H3 - 15 to 32 inches: fine sandy loam
H4 - 32 to 36 inches: cemented material

Properties and qualities

Slope: 0 to 2 percent
Depth to restrictive feature: 20 to 40 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 25 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Low (about 5.2 inches)

Interpretive groups

Land capability classification (irrigated): 4e
Land capability classification (nonirrigated): 6e
Hydrologic Soil Group: C
Ecological site: R007XY013OR - Sandy Loam 8-10 PZ
Hydric soil rating: No

75B—Willis silt loam, 2 to 5 percent slopes

Map Unit Setting

National map unit symbol: 21wf
Elevation: 1,000 to 2,000 feet
Mean annual precipitation: 9 to 11 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 140 to 180 days
Farmland classification: Prime farmland if irrigated

Map Unit Composition

Willis and similar soils: 90 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Willis

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess over cemented alluvium

Typical profile

H1 - 0 to 12 inches: silt loam
H2 - 12 to 27 inches: silt loam
H3 - 27 to 35 inches: silt loam
H4 - 35 to 39 inches: cemented material

Properties and qualities

Slope: 2 to 5 percent
Depth to restrictive feature: 20 to 40 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 6.8 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: C
Ecological site: R007XY014OR - Loamy 8-10 PZ
Hydric soil rating: No

75C—Willis silt loam, 5 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21wg
Elevation: 1,000 to 2,000 feet
Mean annual precipitation: 9 to 11 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 140 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Willis and similar soils: 90 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Willis

Setting

Landform: Plateaus
Landform position (two-dimensional): Summit
Landform position (three-dimensional): Interfluve
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess over cemented alluvium

Typical profile

H1 - 0 to 12 inches: silt loam
H2 - 12 to 27 inches: silt loam
H3 - 27 to 35 inches: silt loam
H4 - 35 to 39 inches: cemented material

Properties and qualities

Slope: 5 to 12 percent
Depth to restrictive feature: 20 to 40 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 6.8 inches)

Interpretive groups

Land capability classification (irrigated): 3e
Land capability classification (nonirrigated): 3e
Hydrologic Soil Group: C
Ecological site: R007XY014OR - Loamy 8-10 PZ
Hydric soil rating: No

75D—Willis silt loam, 12 to 20 percent slopes

Map Unit Setting

National map unit symbol: 21wh
Elevation: 1,000 to 2,000 feet
Mean annual precipitation: 9 to 11 inches
Mean annual air temperature: 48 to 51 degrees F
Frost-free period: 140 to 180 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Willis and similar soils: 90 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Willis

Setting

Landform: Plateaus
Landform position (two-dimensional): Backslope
Landform position (three-dimensional): Side slope
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess over cemented alluvium

Typical profile

H1 - 0 to 12 inches: silt loam
H2 - 12 to 27 inches: silt loam
H3 - 27 to 35 inches: silt loam
H4 - 35 to 39 inches: cemented material

Properties and qualities

Slope: 12 to 20 percent
Depth to restrictive feature: 20 to 40 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 10 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Moderate (about 6.8 inches)

Interpretive groups

Land capability classification (irrigated): 6e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: C
Ecological site: R007XY014OR - Loamy 8-10 PZ
Hydric soil rating: No

88C—Burke silt loam, 7 to 12 percent slopes

Map Unit Setting

National map unit symbol: 21wy
Elevation: 650 to 1,300 feet
Mean annual precipitation: 8 to 10 inches
Mean annual air temperature: 50 to 54 degrees F
Frost-free period: 150 to 170 days
Farmland classification: Farmland of statewide importance

Map Unit Composition

Burke and similar soils: 75 percent
Estimates are based on observations, descriptions, and transects of the mapunit.

Description of Burke

Setting

Landform: Terraces
Landform position (three-dimensional): Riser
Down-slope shape: Linear
Across-slope shape: Linear
Parent material: Loess over strongly cemented alluvium

Typical profile

H1 - 0 to 8 inches: silt loam
H2 - 8 to 26 inches: silt loam
H3 - 26 to 60 inches: cemented material

Properties and qualities

Slope: 7 to 12 percent
Depth to restrictive feature: 20 to 40 inches to duripan
Drainage class: Well drained
Capacity of the most limiting layer to transmit water (Ksat): Very low to moderately low (0.00 to 0.06 in/hr)
Depth to water table: More than 80 inches
Frequency of flooding: None
Frequency of ponding: None
Calcium carbonate, maximum content: 15 percent
Maximum salinity: Nonsaline to very slightly saline (0.0 to 2.0 mmhos/cm)
Available water supply, 0 to 60 inches: Low (about 5.2 inches)

Interpretive groups

Land capability classification (irrigated): 4e
Land capability classification (nonirrigated): 4e
Hydrologic Soil Group: C
Ecological site: R007XY014OR - Loamy 8-10 PZ
Hydric soil rating: No

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Appendix 3: OAR 660-033-0130

Land Conservation and Development Department

Chapter 660

Division 33
AGRICULTURAL LAND

660-033-0130
Minimum Standards Applicable to the Schedule of Permitted and Conditional Uses

The following requirements apply to uses specified, and as listed in the table adopted by OAR 660-033-0120. For each section of this rule, the corresponding section number is shown in the table. Where no numerical reference is indicated on the table, this rule does not specify any minimum review or approval criteria. Counties may include procedures and conditions in addition to those listed in the table, as authorized by law.

(1) A dwelling on farmland may be considered customarily provided in conjunction with farm use if it meets the requirements of OAR 660-033-0135.

(2)(a) No enclosed structure with a design capacity greater than 100 people, or group of structures with a total design capacity of greater than 100 people, shall be approved in connection with the use within three miles of an urban growth boundary, unless an exception is approved pursuant to ORS 197.732 and OAR chapter 660, division 4, or unless the structure is described in a master plan adopted under the provisions of OAR chapter 660, division 34.

(b) Any enclosed structures or group of enclosed structures described in subsection (a) within a tract must be separated by at least one-half mile. For purposes of this section, "tract" means a tract as defined by ORS 215.010(2) that is in existence as of June 17, 2010.

(c) Existing facilities wholly within a farm use zone may be maintained, enhanced or expanded on the same tract, subject to other requirements of law, but enclosed existing structures within a farm use zone within three miles of an urban growth boundary may not be expanded beyond the requirements of this rule.

(3)(a) A dwelling may be approved on a pre-existing lot or parcel if:

(A) The lot or parcel on which the dwelling will be sited was lawfully created and was acquired and owned continuously by the present owner as defined in subsection (3)(g) of this rule:

(i) Since prior to January 1, 1985; or

(ii) By devise or by intestate succession from a person who acquired and had owned continuously the lot or parcel since prior to January 1, 1985.

(B) The tract on which the dwelling will be sited does not include a dwelling;

(C) The lot or parcel on which the dwelling will be sited was part of a tract on November 4, 1993, no dwelling exists on another lot or parcel that was part of that tract;

(D) The proposed dwelling is not prohibited by, and will comply with, the requirements of the acknowledged comprehensive plan and land use regulations and other provisions of law;

(E) The lot or parcel on which the dwelling will be sited is not high-value farmland except as provided in subsections (3)(c) and (d) of this rule; and

(F) When the lot or parcel on which the dwelling will be sited lies within an area designated in an acknowledged comprehensive plan as habitat of big game, the siting of the dwelling is consistent with the limitations on density upon

which the acknowledged comprehensive plan and land use regulations intended to protect the habitat are based.

(b) When the lot or parcel on which the dwelling will be sited is part of a tract, the remaining portions of the tract are consolidated into a single lot or parcel when the dwelling is allowed;

(c) Notwithstanding the requirements of paragraph (3)(a)(E) of this rule, a single-family dwelling may be sited on high-value farmland if:

(A) It meets the other requirements of subsections (3)(a) and (b) of this rule;

(B) The lot or parcel is protected as high-value farmland as defined in OAR 660-033-0020(8)(a);

(C) A hearings officer of a county determines that:

(i) The lot or parcel cannot practicably be managed for farm use, by itself or in conjunction with other land, due to extraordinary circumstances inherent in the land or its physical setting that do not apply generally to other land in the vicinity. For the purposes of this section, this criterion asks whether the subject lot or parcel can be physically put to farm use without undue hardship or difficulty because of extraordinary circumstances inherent in the land or its physical setting. Neither size alone nor a parcel's limited economic potential demonstrates that a lot of parcel cannot be practicably managed for farm use. Examples of "extraordinary circumstances inherent in the land or its physical setting" include very steep slopes, deep ravines, rivers, streams, roads, railroad or utility lines or other similar natural or physical barriers that by themselves or in combination separate the subject lot or parcel from adjacent agricultural land and prevent it from being practicably managed for farm use by itself or together with adjacent or nearby farms. A lot or parcel that has been put to farm use despite the proximity of a natural barrier or since the placement of a physical barrier shall be presumed manageable for farm use;

(ii) The dwelling will comply with the provisions of ORS 215.296(1); and

(iii) The dwelling will not materially alter the stability of the overall land use pattern in the area by applying the standards set forth in paragraph (4)(a)(D) of this rule; and

(D) A local government shall provide notice of all applications for dwellings allowed under subsection (3)(c) of this rule to the Oregon Department of Agriculture. Notice shall be provided in accordance with the governing body's land use regulations but shall be mailed at least 20 calendar days prior to the public hearing before the hearings officer under paragraph (3)(c)(C) of this rule.

(d) Notwithstanding the requirements of paragraph (3)(a)(E) of this rule, a single-family dwelling may be sited on high-value farmland if:

(A) It meets the other requirements of subsections (3)(a) and (b) of this rule;

(B) The tract on which the dwelling will be sited is:

(i) Identified in OAR 660-033-0020(8)(c) or (d);

(ii) Not high-value farmland defined in OAR 660-033-0020(8)(a); and

(iii) Twenty-one acres or less in size; and

(C) The tract is bordered on at least 67 percent of its perimeter by tracts that are smaller than 21 acres, and at least two such tracts had dwellings on January 1, 1993; or

(D) The tract is not a flaglot and is bordered on at least 25 percent of its perimeter by tracts that are smaller than 21 acres, and at least four dwellings existed on January 1, 1993, within one-quarter mile of the center of the subject tract. Up to two of the four dwellings may lie within an urban growth boundary, but only if the subject tract abuts an urban growth boundary; or

(E) The tract is a flaglot and is bordered on at least 25 percent of its perimeter by tracts that are smaller than 21 acres, and at least four dwellings existed on January 1, 1993, within one-quarter mile of the center of the subject tract and on the same side of the public road that provides access to the subject tract. The governing body of a county must interpret the center of the subject tract as the geographic center of the flaglot if the applicant makes a written request for that interpretation and that interpretation does not cause the center to be located outside the flaglot. Up to two of the four dwellings may lie within an urban growth boundary, but only if the subject tract abuts an urban growth boundary:

(i) "Flaglot" means a tract containing a narrow strip or panhandle of land providing access from the public road to the rest of the tract.

(ii) "Geographic center of the flaglot" means the point of intersection of two perpendicular lines of which the first line crosses the midpoint of the longest side of a flaglot, at a 90-degree angle to the side, and the second line crosses the midpoint of the longest adjacent side of the flaglot.

(e) If land is in a zone that allows both farm and forest uses, is acknowledged to be in compliance with both Goals 3 and 4 and may qualify as an exclusive farm use zone under ORS chapter 215, a county may apply the standards for siting a dwelling under either section (3) of this rule or OAR 660-006-0027, as appropriate for the predominant use of the tract on January 1, 1993;

(f) A county may, by application of criteria adopted by ordinance, deny approval of a dwelling allowed under section (3) of this rule in any area where the county determines that approval of the dwelling would:

(A) Exceed the facilities and service capabilities of the area;

(B) Materially alter the stability of the overall land use pattern of the area; or

(C) Create conditions or circumstances that the county determines would be contrary to the purposes or intent of its acknowledged comprehensive plan or land use regulations.

(g) For purposes of subsection (3)(a) of this rule, "owner" includes the wife, husband, son, daughter, mother, father, brother, brother-in-law, sister, sister-in-law, son-in-law, daughter-in-law, mother-in-law, father-in-law, aunt, uncle, niece, nephew, stepparent, stepchild, grandparent or grandchild of the owner or a business entity owned by any one or a combination of these family members;

(h) The county assessor shall be notified that the governing body intends to allow the dwelling.

(i) When a local government approves an application for a single-family dwelling under section (3) of this rule, the application may be transferred by a person who has qualified under section (3) of this rule to any other person after the effective date of the land use decision.

(4) A single-family residential dwelling not provided in conjunction with farm use requires approval of the governing body or its designate in any farmland area zoned for exclusive farm use:

(a) In the Willamette Valley, the use may be approved if:

(A) The dwelling or activities associated with the dwelling will not force a significant change in or significantly increase the cost of accepted farming or forest practices on nearby lands devoted to farm or forest use;

(B) The dwelling will be sited on a lot or parcel that is predominantly composed of Class IV through VIII soils that would not, when irrigated, be classified as prime, unique, Class I or II soils;

(C) The dwelling will be sited on a lot or parcel created before January 1, 1993;

(D) The dwelling will not materially alter the stability of the overall land use pattern of the area. In determining whether a proposed nonfarm dwelling will alter the stability of the land use pattern in the area, a county shall consider the cumulative impact of possible new nonfarm dwellings and parcels on other lots or parcels in the area similarly situated. To address this standard, the county shall:

(i) Identify a study area for the cumulative impacts analysis. The study area shall include at least 2000 acres or a smaller area not less than 1000 acres, if the smaller area is a distinct agricultural area based on topography, soil types, land use pattern, or the type of farm or ranch operations or practices that distinguish it from other, adjacent agricultural areas. Findings shall describe the study area, its boundaries, the location of the subject parcel within this area, why the selected area is representative of the land use pattern surrounding the subject parcel and is adequate to conduct the analysis required by this standard. Lands zoned for rural residential or other urban or nonresource uses shall not be included in the study area;

(ii) Identify within the study area the broad types of farm uses (irrigated or nonirrigated crops, pasture or grazing lands), the number, location and type of existing dwellings (farm, nonfarm, hardship, etc.), and the dwelling development trends since 1993. Determine the potential number of nonfarm/lot-of-record dwellings that could be approved under subsection (3)(a) and section (4) of this rule, including identification of predominant soil classifications, the parcels created prior to January 1, 1993 and the parcels larger than the minimum lot size that may be divided to create new parcels for nonfarm dwellings under ORS 215.263(4), ORS 215.263(5), and ORS 215.284(4). The findings shall describe the existing land use pattern of the study area including the distribution and arrangement of existing uses and the land use pattern that could result from approval of the possible nonfarm dwellings under this subparagraph; and

(iii) Determine whether approval of the proposed nonfarm/lot-of-record dwellings together with existing nonfarm dwellings will materially alter the stability of the land use pattern in the area. The stability of the land use pattern will be materially altered if the cumulative effect of existing and potential nonfarm dwellings will make it more difficult for the existing types of farms in the area to continue operation due to diminished opportunities to expand, purchase or lease farmland, acquire water rights or diminish the number of tracts or acreage in farm use in a manner that will destabilize the overall character of the study area; and

(E) The dwelling complies with such other conditions as the governing body or its designate considers necessary.

(b) In the Willamette Valley, on a lot or parcel allowed under OAR 660-033-0100(7), the use may be approved if:

(A) The dwelling or activities associated with the dwelling will not force a significant change in or significantly increase the cost of accepted farming or forest practices on nearby lands devoted to farm or forest use;

(B) The dwelling will not materially alter the stability of the overall land use pattern of the area. In determining whether a proposed nonfarm dwelling will alter the stability of the land use pattern in the area, a county shall consider the cumulative impact of nonfarm dwellings on other lots or parcels in the area similarly situated and whether creation of the parcel will lead to creation of other nonfarm parcels, to the detriment of agriculture in the area by applying the standards set forth in paragraph (4)(a)(D) of this rule; and

(C) The dwelling complies with such other conditions as the governing body or its designate considers necessary.

(c) In counties located outside the Willamette Valley require findings that:

(A) The dwelling or activities associated with the dwelling will not force a significant change in or significantly increase the cost of accepted farming or forest practices on nearby lands devoted to farm or forest use;

(B)(i) The dwelling, including essential or accessory improvements or structures, is situated upon a lot or parcel, or, in the case of an existing lot or parcel, upon a portion of a lot or parcel, that is generally unsuitable land for the production of farm crops and livestock or merchantable tree species, considering the terrain, adverse soil or land conditions, drainage and flooding, vegetation, location and size of the tract. A lot or parcel or portion of a lot or parcel shall not be considered unsuitable solely because of size or location if it can reasonably be put to farm or forest use in conjunction with other land; and

(ii) A lot or parcel or portion of a lot or parcel is not "generally unsuitable" simply because it is too small to be farmed profitably by itself. If a lot or parcel or portion of a lot or parcel can be sold, leased, rented or otherwise managed as a part of a commercial farm or ranch, then the lot or parcel or portion of the lot or parcel is not "generally unsuitable". A lot or parcel or portion of a lot or parcel is presumed to be suitable if, in Western Oregon it is composed predominantly of Class I-IV soils or, in Eastern Oregon, it is composed predominantly of Class I-VI soils. Just because a lot or parcel or portion of a lot or parcel is unsuitable for one farm use does not mean it is not suitable for another farm use; or

(iii) If the parcel is under forest assessment, the dwelling shall be situated upon generally unsuitable land for the production of merchantable tree species recognized by the Forest Practices Rules, considering the terrain, adverse soil or land conditions, drainage and flooding, vegetation, location and size of the parcel. If a lot or parcel is under forest assessment, the area is not "generally unsuitable" simply because it is too small to be managed for forest production profitably by itself. If a lot or parcel under forest assessment can be sold, leased, rented or otherwise managed as a part of a forestry operation, it is not "generally unsuitable". If a lot or parcel is under forest assessment, it is presumed suitable if, in Western Oregon, it is composed predominantly of soils capable of producing 50 cubic feet of wood fiber per acre per year, or in Eastern Oregon it is composed predominantly of soils capable of producing 20 cubic feet of wood fiber per acre per year. If a lot or parcel is under forest assessment, to be found compatible and not seriously interfere with forest uses on surrounding land it must not force a significant change in forest practices or significantly increase the cost of those practices on the surrounding land;

(C) The dwelling will not materially alter the stability of the overall land use pattern of the area. In determining whether a proposed nonfarm dwelling will alter the stability of the land use pattern in the area, a county shall consider the cumulative impact of nonfarm dwellings on other lots or parcels in the area similarly situated by applying the standards set forth in paragraph (4)(a)(D) of this rule. If the application involves the creation of a new parcel for the nonfarm dwelling, a county shall consider whether creation of the parcel will lead to creation of other nonfarm parcels, to the detriment of agriculture in the area by applying the standards set forth in paragraph (4)(a)(D) of this rule; and

(D) The dwelling complies with such other conditions as the governing body or its designate considers necessary.

(d) If a single-family dwelling is established on a lot or parcel as set forth in section (3) of this rule or OAR 660-006-0027, no additional dwelling may later be sited under the provisions of section (4) of this rule;

(e) Counties that have adopted marginal lands provisions before January 1, 1993, shall apply the standards in ORS 215.213(3) through 215.213(8) for nonfarm dwellings on lands zoned exclusive farm use that are not designated marginal or high-value farmland.

(5) Approval requires review by the governing body or its designate under ORS 215.296. Uses may be approved only where such uses:

(a) Will not force a significant change in accepted farm or forest practices on surrounding lands devoted to farm or forest use; and

(b) Will not significantly increase the cost of accepted farm or forest practices on surrounding lands devoted to farm or forest use.

(6) A facility for the primary processing of forest products shall not seriously interfere with accepted farming practices and shall be compatible with farm uses described in ORS 215.203(2). Such facility may be approved for a one-year period that is renewable and is intended to be only portable or temporary in nature. The primary processing of a forest product, as used in this section, means the use of a portable chipper or stud mill or other similar methods of initial treatment of a forest product in order to enable its shipment to market. Forest products as used in this section means timber grown upon a tract where the primary processing facility is located.

(7) A personal-use airport as used in this section means an airstrip restricted, except for aircraft emergencies, to use by the owner, and, on an infrequent and occasional basis, by invited guests, and by commercial aviation activities in connection with agricultural operations. No aircraft may be based on a personal-use airport other than those owned or controlled by the owner of the airstrip. Exceptions to the activities allowed under this definition may be granted through waiver action by the Oregon Department of Aviation in specific instances. A personal-use airport lawfully existing as of September 13, 1975, shall continue to be allowed subject to any applicable rules of the Oregon Department of Aviation.

(8)(a) A lawfully established dwelling may be altered, restored or replaced under ORS 215.213(1)(q) or 215.283(1)(p) if, when an application for a permit is submitted, the county finds to its satisfaction, based on substantial evidence that the dwelling to be altered, restored or replaced has, or formerly had:

(A) Intact exterior walls and roof structure;

(B) Indoor plumbing consisting of a kitchen sink, toilet and bathing facilities connected to a sanitary waste disposal system;

(C) Interior wiring for interior lights; and

(D) A heating system;

(b) In addition to the provisions of subsection (a), the dwelling to be replaced meets one of the following conditions;

(A) If the dwelling was removed, destroyed or demolished;

(i) The dwelling's tax lot does not have a lien for delinquent ad valorem taxes; and

(ii) Any removal, destruction, or demolition occurred on or after January 1, 1973.

(B) If the dwelling is currently in such a state of disrepair that the dwelling is unsafe for occupancy or constitutes an attractive nuisance, the dwelling's tax lot does not have a lien for delinquent ad valorem taxes; or

(C) A dwelling not described paragraph (A) or (B) of this subsection was assessed as a dwelling for the purposes of ad valorem taxation:

(i) For the previous five property tax years; or

(ii) From the time when the dwelling was erected upon or affixed to the land and became subject to assessment as described in ORS 307.010.

(c) For replacement of a lawfully established dwelling under ORS 215.213(1)(q) or 215.283(1)(p):

(A) The dwelling to be replaced must be removed, demolished or converted to an allowable nonresidential use:

(i) Within one year after the date the replacement dwelling is certified for occupancy pursuant to ORS 455.055; or

(ii) If the dwelling to be replaced is, in the discretion of the county, in such a state of disrepair that the structure is unsafe for occupancy or constitutes an attractive nuisance, on or before a date set by the county that is not less than 90 days after the replacement permit is issued; and

(iii) If a dwelling is removed by moving it off the subject parcel to another location, the applicant must obtain approval from the permitting authority for the new location.

(B) The applicant must cause to be recorded in the deed records of the county a statement that the dwelling to be replaced has been removed, demolished or converted.

(C) As a condition of approval, if the dwelling to be replaced is located on a portion of the lot or parcel that is not zoned for exclusive farm use, the applicant shall execute and cause to be recorded in the deed records of the county in which the property is located a deed restriction prohibiting the siting of another dwelling on that portion of the lot or parcel. The restriction imposed is irrevocable unless the county planning director, or the director's designee, places a statement of release in the deed records of the county to the effect that the provisions of 2019 Oregon Laws, chapter 440, section 1 and either ORS 215.213 or 215.283 regarding replacement dwellings have changed to allow the lawful siting of another dwelling.

(D) The county planning director, or the director's designee, shall maintain a record of:

(i) The lots and parcels for which dwellings to be replaced have been removed, demolished or converted; and

(ii) The lots and parcels that do not qualify for the siting of a new dwelling under subsection (c) of this section, including a copy of the deed restrictions filed under paragraph (C) of this subsection.

(d)(A) A replacement dwelling under ORS 215.213(1)(q) or 215.283(1)(p) must comply with applicable building codes, plumbing codes, sanitation codes and other requirements relating to health and safety or to siting at the time of construction. However, the standards may not be applied in a manner that prohibits the siting of the replacement dwelling.

(B) The replacement dwelling must be sited on the same lot or parcel:

(i) Using all or part of the footprint of the replaced dwelling or near a road, ditch, river, property line, forest boundary or another natural boundary of the lot or parcel; and

(ii) If possible, for the purpose of minimizing the adverse impacts on resource use of land in the area, within a concentration or cluster of structures or within 500 yards of another structure.

(e) A replacement dwelling permit that is issued under ORS 215.213(1)(q) or 215.283(1)(p):

(A) Is a land use decision as defined in ORS 197.015 where the dwelling to be replaced:

(i) Formerly had the features described in paragraph (a)(A) of this section; or

(ii) Is eligible for replacement under paragraph (b)(B) of this section; and

(B) Is not subject to the time to act limits of ORS 215.417.

(9)(a) To qualify for a relative farm help dwelling, a dwelling shall be occupied by relatives whose assistance in the management and farm use of the existing commercial farming operation is required by the farm operator. However, farming of a marijuana crop may not be used to demonstrate compliance with the approval criteria for a relative farm help dwelling. The farm operator shall continue to play the predominant role in the management and farm use of the farm. A farm operator is a person who operates a farm, doing the work and making the day-to-day decisions about such things as planting, harvesting, feeding and marketing.

(b) A relative farm help dwelling must be located on the same lot or parcel as the dwelling of the farm operator and must be on real property used for farm use.

(c) For the purpose of subsection (a), “relative” means a child, parent, stepparent, grandchild, grandparent, stepgrandparent, sibling, stepsibling, niece, nephew or first cousin of the farm operator or the farm operator’s spouse.

(d) Notwithstanding ORS 92.010 to 92.192 or the minimum lot or parcel requirements under 215.780, if the owner of a dwelling described in this section obtains construction financing or other financing secured by the dwelling and the secured party forecloses on the dwelling, the secured party may also foreclose on the “homesite,” as defined in 308A.250, and the foreclosure shall operate as a partition of the homesite to create a new parcel. Prior conditions of approval for the subject land and dwelling remain in effect.

(e) For the purpose of subsection (d), "foreclosure" means only those foreclosures that are exempt from partition under ORS 92.010(9)(a).

(10) Temporary residence for the term of the hardship suffered by the existing resident or relative as defined in ORS chapter 215. As used in this section "hardship" means a medical hardship or hardship for the care of an aged or infirm person or persons. “Hardship” also includes a natural hazard event that has destroyed homes, caused residential evacuations, or both, and resulted in an Executive Order issued by the Governor declaring an emergency for all or parts of Oregon pursuant to ORS 401.165, et seq. A temporary residence approved under this section is not eligible for replacement under ORS 215.213(1)(q) or 215.283(1)(p).

(a) For a medical hardship or hardship for the care of an aged or infirm person or persons the temporary residence may include a manufactured dwelling, or recreational vehicle, or the temporary residential use of an existing building. A manufactured dwelling shall use the same subsurface sewage disposal system used by the existing dwelling, if that disposal system is adequate to accommodate the additional dwelling. If the manufactured home will use a public sanitary sewer system, such condition will not be required. Governing bodies shall review the permit authorizing such manufactured homes every two years. Within three months of the end of the hardship, the manufactured dwelling or recreational vehicle shall be removed or demolished, or, in the case of an existing building, the building shall be removed, demolished, or returned to an allowed nonresidential use. Department of Environmental Quality review and removal requirements also apply.

(b) For hardships based on a natural hazard event described in this section, the temporary residence may include a recreational vehicle or the temporary residential use of an existing building. Governing bodies shall review the permit authorizing such temporary residences every two years. Within three months of the end of the hardship, the

recreational vehicle shall be removed or demolished, or, in the case of an existing building, the building shall be removed, demolished, or returned to an allowed nonresidential use. Department of Environmental Quality review and removal requirements also apply.

(c) For applications submitted under subsection (b) of this section, the county may find that the criteria of section (5) are satisfied when:

(A) The temporary residence is established within an existing building or, if a recreational vehicle, is located within 100 feet of the primary residence; or

(B) The temporary residence is located further than 250 feet from adjacent lands planned and zoned for resource use under Goal 3, Goal 4, or both.

(11) Subject to the issuance of a license, permit or other approval by the Department of Environmental Quality under ORS 454.695, 459.205, 468B.050, 468B.053 or 468B.055, or in compliance with rules adopted under 468B.095, and with the requirements of 215.246, 215.247, 215.249 and 215.251, the land application of reclaimed water, agricultural process or industrial process water or biosolids, or the onsite treatment of septage prior to the land application of biosolids, for agricultural, horticultural or silvicultural production, or for irrigation in connection with a use allowed in an exclusive farm use zones under this division is allowed. For the purposes of this section, onsite treatment of septage prior to the land application of biosolids is limited to treatment using treatment facilities that are portable, temporary and transportable by truck trailer, as defined in ORS 801.580, during a period of time within which land application of biosolids is authorized under the license, permit or other approval.

(12) In order to meet the requirements specified in the statute, a historic dwelling shall be listed on the National Register of Historic Places.

(13) Roads, highways and other transportation facilities, and improvements not otherwise allowed under this rule may be established, subject to the adoption of the governing body or its designate of an exception to Goal 3, Agricultural Lands, and to any other applicable goal with which the facility or improvement does not comply. In addition, transportation uses and improvements may be authorized under conditions and standards as set forth in OAR 660-012-0035 and 660-012-0065.

(14) Home occupations and the parking of vehicles may be authorized. Home occupations shall be operated substantially in the dwelling or other buildings normally associated with uses permitted in the zone in which the property is located. A home occupation shall be operated by a resident or employee of a resident of the property on which the business is located, and shall employ on the site no more than five full-time or part-time persons.

(15) New uses that batch and blend mineral and aggregate into asphalt cement may not be authorized within two miles of a planted vineyard. Planted vineyard means one or more vineyards totaling 40 acres or more that are planted as of the date the application for batching and blending is filed.

(16)(a) A utility facility established under ORS 215.213(1)(c) or 215.283(1)(c) is necessary for public service if the facility must be sited in an exclusive farm use zone in order to provide the service. To demonstrate that a utility facility is necessary, an applicant must:

(A) Show that reasonable alternatives have been considered and that the facility must be sited in an exclusive farm use zone due to one or more of the following factors:

(i) Technical and engineering feasibility;

(ii) The proposed facility is locationally-dependent. A utility facility is locationally-dependent if it must cross land in one or more areas zoned for exclusive farm use in order to achieve a reasonably direct route or to meet unique geographical needs that cannot be satisfied on other lands;

(iii) Lack of available urban and nonresource lands;

(iv) Availability of existing rights of way;

(v) Public health and safety; and

(vi) Other requirements of state and federal agencies.

(B) Costs associated with any of the factors listed in paragraph (A) of this subsection may be considered, but cost alone may not be the only consideration in determining that a utility facility is necessary for public service. Land costs shall not be included when considering alternative locations for substantially similar utility facilities and the siting of utility facilities that are not substantially similar.

(C) The owner of a utility facility approved under this section shall be responsible for restoring, as nearly as possible, to its former condition any agricultural land and associated improvements that are damaged or otherwise disturbed by the siting, maintenance, repair or reconstruction of the facility. Nothing in this paragraph shall prevent the owner of the

utility facility from requiring a bond or other security from a contractor or otherwise imposing on a contractor the responsibility for restoration.

(D) The governing body of the county or its designee shall impose clear and objective conditions on an application for utility facility siting to mitigate and minimize the impacts of the proposed facility, if any, on surrounding lands devoted to farm use in order to prevent a significant change in accepted farm practices or a significant increase in the cost of farm practices on surrounding farmlands.

(E) Utility facilities necessary for public service may include on-site and off-site facilities for temporary workforce housing for workers constructing a utility facility. Such facilities must be removed or converted to an allowed use under OAR 660-033-0130(19) or other statute or rule when project construction is complete. Off-site facilities allowed under this paragraph are subject to 660-033-0130(5). Temporary workforce housing facilities not included in the initial approval may be considered through a minor amendment request. A minor amendment request shall have no effect on the original approval.

(F) In addition to the provisions of paragraphs (A) to (D) of this subsection, the establishment or extension of a sewer system as defined by OAR 660-011-0060(1)(f) in an exclusive farm use zone shall be subject to the provisions of OAR 660-011-0060.

(G) The provisions of paragraphs (A) to (D) of this subsection do not apply to interstate natural gas pipelines and associated facilities authorized by and subject to regulation by the Federal Energy Regulatory Commission.

(b) An associated transmission line is necessary for public service and shall be approved by the governing body of a county or its designee if an applicant for approval under ORS 215.213(1)(c) or 215.283(1)(c) demonstrates to the governing body of a county or its designee that the associated transmission line meets either the requirements of paragraph (A) of this subsection or the requirements of paragraph (B) of this subsection.

(A) An applicant demonstrates that the entire route of the associated transmission line meets at least one of the following requirements:

(i) The associated transmission line is not located on high-value farmland, as defined in ORS 195.300, or on arable land;

(ii) The associated transmission line is co-located with an existing transmission line;

(iii) The associated transmission line parallels an existing transmission line corridor with the minimum separation necessary for safety; or

(iv) The associated transmission line is located within an existing right of way for a linear facility, such as a transmission line, road or railroad, that is located above the surface of the ground.

(B) After an evaluation of reasonable alternatives, an applicant demonstrates that the entire route of the associated transmission line meets, subject to paragraphs (C) and (D) of this subsection, two or more of the following criteria:

(i) Technical and engineering feasibility;

(ii) The associated transmission line is locationally-dependent because the associated transmission line must cross high-value farmland, as defined in ORS 195.300, or arable land to achieve a reasonably direct route or to meet unique geographical needs that cannot be satisfied on other lands;

(iii) Lack of an available existing right of way for a linear facility, such as a transmission line, road or railroad, that is located above the surface of the ground;

(iv) Public health and safety; or

(v) Other requirements of state or federal agencies.

(C) As pertains to paragraph (B), the applicant shall present findings to the governing body of the county or its designee on how the applicant will mitigate and minimize the impacts, if any, of the associated transmission line on surrounding lands devoted to farm use in order to prevent a significant change in accepted farm pratices or a significant increase in the cost of farm practices on the surrounding farmland.

(D) The governing body of a county or its designee may consider costs associated with any of the factors listed in paragraph (B) of this subsection, but consideration of cost may not be the only consideration in determining whether the associated transmission line is necessary for public service.

(17) Permanent features of a power generation facility shall not use, occupy, or cover more than 12 acres unless an exception is taken pursuant to ORS 197.732 and OAR chapter 660, division 4. A power generation facility may include on-site and off-site facilities for temporary workforce housing for workers constructing a power generation facility. Such facilities must be removed or converted to an allowed use under OAR 660-033-0130(19) or other statute or rule when project construction is complete. Temporary workforce housing facilities not included in the initial approval may

be considered through a minor amendment request. A minor amendment request shall be subject to OAR 660-033-0130(5) and shall have no effect on the original approval.

(18)(a) Existing facilities wholly within a farm use zone may be maintained, enhanced or expanded on the same tract, subject to other requirements of law. An existing golf course may be expanded consistent with the requirements of sections (5) and (20) of this rule, but shall not be expanded to contain more than 36 total holes.

(b) Notwithstanding ORS 215.130, 215.213, 215.283, or any local zoning ordinance or regulation, a public or private school, including all buildings essential to the operation of a school, formerly allowed pursuant to ORS 215.213(1)(a) or 215.283(1)(a), as in effect before January 1, 2010, may be expanded provided:

(A) The expansion complies with ORS 215.296;

(B) The school was established on or before January 1, 2009;

(c) Subject to the requirements of sections (5) and (20) of this rule, a golf course may be established on land determined to be high-value farmland as defined in ORS 195.300(10)(c) if the land:

(A) Is not otherwise high-value farmland as defined in ORS 195.300(10);

(B) Is surrounded on all sides by an approved golf course; and

(C) Is west of U.S. Highway 101.

(19)(a) A campground is an area devoted to overnight temporary use for vacation, recreational or emergency purposes, but not for residential purposes. Campgrounds authorized by this rule shall not include intensively developed recreational uses such as swimming pools, tennis courts, retail stores or gas stations.

(b) Vacation or recreational purposes. Except on a lot or parcel contiguous to a lake or reservoir, private campgrounds devoted to vacation or recreational purposes shall not be allowed within three miles of an urban growth boundary unless an exception is approved pursuant to ORS 197.732 and OAR chapter 660, division 4. Campgrounds approved under this provision must be found to be established on a site or is contiguous to lands with a park or other outdoor natural amenity that is accessible for recreational use by the occupants of the campground and designed and integrated into the rural agricultural and forest environment in a manner that protects the natural amenities of the site and provides buffers of existing native trees and vegetation or other natural features between campsites. Overnight temporary use in the same campground by a camper or camper's vehicle shall not exceed a total of 30 days during any consecutive six-month period. Campsites may be occupied by a tent, travel trailer, yurt or recreational vehicle. Separate sewer, water or electric service hook-ups shall not be provided to individual camp sites except that electrical service may be provided to yurts allowed for by subsection (19)(d) of this rule.

(c) Emergency purposes. Emergency campgrounds may be authorized when a wildfire identified in an Executive Order issued by the Governor in accordance with the Emergency Conflagration Act, ORS 476.510 through 476.610, has destroyed homes or caused residential evacuations, or both within the county or an adjacent county. Commercial activities shall be limited to mobile commissary services scaled to meet the needs of campground occupants. Campgrounds approved under this section must be removed or converted to an allowed use within 36 months from the date of the Governor's Executive Order. The county may grant two additional 12-month extensions upon demonstration by the applicant that the campground continues to be necessary to support the natural hazard event recovery efforts because adequate amounts of permanent housing is not reasonably available. A county must process applications filed pursuant to this section in the manner identified at ORS 215.416(11).

(A) Campsites may be occupied by a tent, travel trailer, yurt or recreational vehicle. Separate sewer hook-ups shall not be provided to individual camp sites.

(B) Campgrounds shall be located outside of flood, geological, or wildfire hazard areas identified in adopted comprehensive plans and land use regulations to the extent possible.

(C) A plan for removing or converting the temporary campground to an allowed use at the end of the time-frame specified in paragraph (19)(c) shall be included in the application materials and, upon meeting the county's satisfaction, be attached to the decision as a condition of approval. A county may require that a removal plan developed pursuant to this paragraph include a specific financial agreement in the form of a performance bond, letter of credit or other assurance acceptable to the county that is furnished by the applicant in an amount necessary to ensure that there are adequate funds available for removal or conversion activities to be completed.

(d) Subject to the approval of the county governing body or its designee, a private campground may provide yurts for overnight camping. No more than one-third or a maximum of 10 campsites, whichever is smaller, may include a yurt. The yurt shall be located on the ground or on a wood floor with no permanent foundation. Upon request of a county governing body, the commission may provide by rule for an increase in the number of yurts allowed on all or a portion of the campgrounds in a county if the commission determines that the increase will comply with the standards described in

ORS 215.296(1). As used in this section, "yurt" means a round, domed shelter of cloth or canvas on a collapsible frame with no plumbing, sewage disposal hook-up or internal cooking appliance.

(e) For applications submitted under subsection (c) of this section, the criteria of section (5) can be found to be satisfied when:

(A) The Governor has issued an Executive Order declaring an emergency for all or parts of Oregon pursuant to ORS 401.165, et seq.

(B) The subject property is not irrigated.

(C) The subject property is not high-value farmland.

(D) The number of proposed campsites does not exceed 12; or

(E) The number of proposed campsites does not exceed 36: and

(F) Campsites and other campground facilities are located at least 660 feet from adjacent lands planned and zoned for resource use under Goal 3, Goal 4, or both.

(19)(a) Except on a lot or parcel contiguous to a lake or reservoir, private campgrounds shall not be allowed within three miles of an urban growth boundary unless an exception is approved pursuant to ORS 197.732 and OAR chapter 660, division 4. A campground is an area devoted to overnight temporary use for vacation, recreational or emergency purposes, but not for residential purposes and is established on a site or is contiguous to lands with a park or other outdoor natural amenity that is accessible for recreational use by the occupants of the campground. A campground shall be designed and integrated into the rural agricultural and forest environment in a manner that protects the natural amenities of the site and provides buffers of existing native trees and vegetation or other natural features between campsites. Campgrounds authorized by this rule shall not include intensively developed recreational uses such as swimming pools, tennis courts, retail stores or gas stations. Overnight temporary use in the same campground by a camper or camper's vehicle shall not exceed a total of 30 days during any consecutive six-month period.

(b) Campsites may be occupied by a tent, travel trailer, yurt or recreational vehicle. Separate sewer, water or electric service hook-ups shall not be provided to individual camp sites except that electrical service may be provided to yurts allowed for by subsection (19)(c) of this rule.

(c) Subject to the approval of the county governing body or its designee, a private campground may provide yurts for overnight camping. No more than one-third or a maximum of 10 campsites, whichever is smaller, may include a yurt. The yurt shall be located on the ground or on a wood floor with no permanent foundation. Upon request of a county governing body, the commission may provide by rule for an increase in the number of yurts allowed on all or a portion of the campgrounds in a county if the commission determines that the increase will comply with the standards described in ORS 215.296(1). As used in this section, "yurt" means a round, domed shelter of cloth or canvas on a collapsible frame with no plumbing, sewage disposal hook-up or internal cooking appliance.

(20) "Golf Course" means an area of land with highly maintained natural turf laid out for the game of golf with a series of nine or more holes, each including a tee, a fairway, a putting green, and often one or more natural or artificial hazards. A "golf course" for purposes of ORS 215.213(2)(f), 215.283(2)(f), and this division means a nine or 18 hole regulation golf course or a combination nine and 18 hole regulation golf course consistent with the following:

(a) A regulation 18 hole golf course is generally characterized by a site of about 120 to 150 acres of land, has a playable distance of 5,000 to 7,200 yards, and a par of 64 to 73 strokes;

(b) A regulation nine hole golf course is generally characterized by a site of about 65 to 90 acres of land, has a playable distance of 2,500 to 3,600 yards, and a par of 32 to 36 strokes;

(c) Non-regulation golf courses are not allowed uses within these areas. "Non-regulation golf course" means a golf course or golf course-like development that does not meet the definition of golf course in this rule, including but not limited to executive golf courses, Par three golf courses, pitch and putt golf courses, miniature golf courses and driving ranges;

(d) Counties shall limit accessory uses provided as part of a golf course consistent with the following standards:

(A) An accessory use to a golf course is a facility or improvement that is incidental to the operation of the golf course and is either necessary for the operation and maintenance of the golf course or that provides goods or services customarily provided to golfers at a golf course. An accessory use or activity does not serve the needs of the non-golfing public. Accessory uses to a golf course may include: Parking; maintenance buildings; cart storage and repair; practice range or driving range; clubhouse; restrooms; lockers and showers; food and beverage service; pro shop; a practice or beginners course as part of an 18 hole or larger golf course; or golf tournament. Accessory uses to a golf course do not include: Sporting facilities unrelated to golfing such as tennis courts, swimming pools, and weight rooms; wholesale or retail operations oriented to the non-golfing public; or housing;

(B) Accessory uses shall be limited in size and orientation on the site to serve the needs of persons and their guests who patronize the golf course to golf. An accessory use that provides commercial services (e.g., pro shop, etc.) shall be located in the clubhouse rather than in separate buildings; and

(C) Accessory uses may include one or more food and beverage service facilities in addition to food and beverage service facilities located in a clubhouse. Food and beverage service facilities must be part of and incidental to the operation of the golf course and must be limited in size and orientation on the site to serve only the needs of persons who patronize the golf course and their guests. Accessory food and beverage service facilities shall not be designed for or include structures for banquets, public gatherings or public entertainment.

(21) "Living History Museum" means a facility designed to depict and interpret everyday life and culture of some specific historic period using authentic buildings, tools, equipment and people to simulate past activities and events. As used in this rule, a living history museum shall be related to resource based activities and shall be owned and operated by a governmental agency or a local historical society. A living history museum may include limited commercial activities and facilities that are directly related to the use and enjoyment of the museum and located within authentic buildings of the depicted historic period or the museum administration building, if areas other than an exclusive farm use zone cannot accommodate the museum and related activities or if the museum administration buildings and parking lot are located within one quarter mile of an urban growth boundary. "Local historical society" means the local historical society, recognized as such by the county governing body and organized under ORS chapter 65.

(22) Permanent features of a power generation facility shall not use, occupy or cover more than 20 acres unless an exception is taken pursuant to ORS 197.732 and OAR chapter 660, division 4. A power generation facility may include on-site and off-site facilities for temporary workforce housing for workers constructing a power generation facility. Such facilities must be removed or converted to an allowed use under OAR 660-033-0130(19) or other statute or rule when project construction is complete. Temporary workforce housing facilities not included in the initial approval may be considered through a minor amendment request. A minor amendment request shall be subject to OAR 660-033-0130(5) and shall have no effect on the original approval.

(23) A farm stand may be approved if:

(a) The structures are designed and used for sale of farm crops and livestock grown on the farm operation, or grown on the farm operation and other farm operations in the local agricultural area, including the sale of retail incidental items and fee-based activity to promote the sale of farm crops or livestock sold at the farm stand if the annual sales of the incidental items and fees from promotional activity do not make up more than 25 percent of the total annual sales of the farm stand; and

(b) The farm stand does not include structures designed for occupancy as a residence or for activities other than the sale of farm crops and livestock and does not include structures for banquets, public gatherings or public entertainment.

(c) As used in this section, "farm crops or livestock" includes both fresh and processed farm crops and livestock grown on the farm operation, or grown on the farm operation and other farm operations in the local agricultural area. As used in this subsection, "processed crops and livestock" includes jams, syrups, apple cider, animal products and other similar farm crops and livestock that have been processed and converted into another product but not prepared food items.

(d) As used in this section, "local agricultural area" includes Oregon or an adjacent county in Washington, Idaho, Nevada or California that borders the Oregon county in which the farm stand is located.

(e) A farm stand may not be used for the sale, or to promote the sale, of marijuana products or extracts.

(24) Accessory farm dwellings as defined by subsection (e) of this section may be considered customarily provided in conjunction with farm use if:

(a) Each accessory farm dwelling meets all the following requirements:

(A) The accessory farm dwelling will be occupied by a person or persons who will be principally engaged in the farm use of the land and whose seasonal or year-round assistance in the management of the farm use, such as planting, harvesting, marketing or caring for livestock, is or will be required by the farm operator;

(B) The accessory farm dwelling will be located:

(i) On the same lot or parcel as the primary farm dwelling;

(ii) On the same tract as the primary farm dwelling when the lot or parcel on which the accessory farm dwelling will be sited is consolidated into a single parcel with all other contiguous lots and parcels in the tract;

(iii) On a lot or parcel on which the primary farm dwelling is not located, when the accessory farm dwelling is limited to only a manufactured dwelling with a deed restriction. The deed restriction shall be filed with the county clerk and require the manufactured dwelling to be removed when the lot or parcel is conveyed to another party. The manufactured dwelling may remain if it is reapproved under these rules;

(iv) On any lot or parcel, when the accessory farm dwelling is limited to only attached multi-unit residential structures allowed by the applicable state building code or similar types of farmworker housing as that existing on farm or ranch operations registered with the Department of Consumer and Business Services, Oregon Occupational Safety and Health Division under ORS 658.750. A county shall require all accessory farm dwellings approved under this subparagraph to be removed, demolished or converted to a nonresidential use when farmworker housing is no longer required. "Farmworker housing" shall have the meaning set forth in ORS 215.278 and not the meaning in ORS 315.163; or

(v) On a lot or parcel on which the primary farm dwelling is not located, when the accessory farm dwelling is located on a lot or parcel at least the size of the applicable minimum lot size under ORS 215.780 and the lot or parcel complies with the gross farm income requirements in OAR 660-033-0135(3) or (4), whichever is applicable; and

(C) There is no other dwelling on the lands designated for exclusive farm use owned by the farm operator that is vacant or currently occupied by persons not working on the subject farm or ranch and that could reasonably be used as an accessory farm dwelling.

(b) In addition to the requirements in subsection (a) of this section, the primary farm dwelling to which the proposed dwelling would be accessory, meets one of the following:

(A) On land not identified as high-value farmland, the primary farm dwelling is located on a farm or ranch operation that is currently employed for farm use, as defined in ORS 215.203, on which, in each of the last two years or three of the last five years or in an average of three of the last five years, the farm operator earned the lower of the following:

(i) At least $40,000 in gross annual income from the sale of farm products. In determining the gross income, the cost of purchased livestock shall be deducted from the total gross income attributed to the tract; or

(ii) Gross annual income of at least the midpoint of the median income range of gross annual sales for farms in the county with the gross annual sales of $10,000 or more according to the 1992 Census of Agriculture, Oregon. In determining the gross income, the cost of purchased livestock shall be deducted from the total gross income attributed to the tract;

(B) On land identified as high-value farmland, the primary farm dwelling is located on a farm or ranch operation that is currently employed for farm use, as defined in ORS 215.203, on which the farm operator earned at least $80,000 in gross annual income from the sale of farm products in each of the last two years or three of the last five years or in an average of three of the last five years. In determining the gross income, the cost of purchased livestock shall be deducted from the total gross income attributed to the tract;

(C) On land not identified as high-value farmland in counties that have adopted marginal lands provisions under former ORS 197.247 (1991 Edition) before January 1, 1993, the primary farm dwelling is located on a farm or ranch operation that meets the standards and requirements of ORS 215.213(2)(a) or (b) or paragraph (A) of this subsection; or

(D) It is located on a commercial dairy farm as defined by OAR 660-033-0135(8); and

(i) The building permits, if required, have been issued and construction has begun or been completed for the buildings and animal waste facilities required for a commercial dairy farm;

(ii) The Oregon Department of Agriculture has approved a permit for a "confined animal feeding operation" under ORS 468B.050 and 468B.200 to 468B.230; and

(iii) A Producer License for the sale of dairy products under ORS 621.072.

(c) The governing body of a county shall not approve any proposed division of a lot or parcel for an accessory farm dwelling approved pursuant to this section. If it is determined that an accessory farm dwelling satisfies the requirements of OAR 660-033-0135, a parcel may be created consistent with the minimum parcel size requirements in 660-033-0100.

(d) An accessory farm dwelling approved pursuant to this section cannot later be used to satisfy the requirements for a dwelling not provided in conjunction with farm use pursuant to section (4) of this rule.

(e) For the purposes of OAR 660-033-0130(24), "accessory farm dwelling" includes all types of residential structures allowed by the applicable state building code.

(f) Farming of a marijuana crop shall not be used to demonstrate compliance with the approval criteria for an accessory farm dwelling.

(g) Accessory farm dwellings destroyed by a wildfire identified in an Executive Order issued by the Governor in accordance with the Emergency Conflagration Act, ORS 476.510 through 476.610 may be replaced. The temporary use of modular structures, manufactured housing, fabric structures, tents and similar accommodations is allowed until replacement under this subsection occurs.

(25) In counties that have adopted marginal lands provisions under former ORS 197.247 (1991 Edition) before January 1, 1993, an armed forces reserve center is allowed, if the center is within one-half mile of a community college. An "armed forces reserve center" includes an armory or National Guard support facility.

(26) Buildings and facilities associated with a site for the takeoff and landing of model aircraft shall not be more than 500 square feet in floor area or placed on a permanent foundation unless the building or facility preexisted the use approved under this section. The site shall not include an aggregate surface or hard surface area unless the surface preexisted the use approved under this section. An owner of property used for the purpose authorized in this section may charge a person operating the use on the property rent for the property. An operator may charge users of the property a fee that does not exceed the operator's cost to maintain the property, buildings and facilities. As used in this section, "model aircraft" means a small-scale version of an airplane, glider, helicopter, dirigible or balloon that is used or intended to be used for flight and is controlled by radio, lines or design by a person on the ground.

(27) Insect species shall not include any species under quarantine by the Oregon Department of Agriculture or the United States Department of Agriculture. The county shall provide notice of all applications under this section to the Oregon Department of Agriculture. Notice shall be provided in accordance with the county's land use regulations but shall be mailed at least 20 calendar days prior to any administrative decision or initial public hearing on the application.

(28)(a) A facility for the processing of farm products is a permitted use under ORS 215.213 (1)(u) and ORS 215.283 (1)(r) on land zoned for exclusive farm use, only if the facility:

(A) Uses less than 10,000 square feet for its processing area and complies with all applicable siting standards. A county may not apply siting standards in a manner that prohibits the siting of a facility for the processing of farm products; or

(B) Notwithstanding any applicable siting standard, uses less than 2,500 square feet for its processing area. However, a local government shall apply applicable standards and criteria pertaining to floodplains, geologic hazards, beach and dune hazards, airport safety, tsunami hazards and fire siting standards.

(b) A county may not approve any division of a lot or parcel that separates a facility for the processing of farm products from the farm operation on which it is located.

(c) As used in this section, the following definitions apply:

(A) "Facility for the processing of farm products" means a facility for:

(i) Processing farm crops, including the production of biofuel as defined in ORS 315.141, if at least one-quarter of the farm crops come from the farm operation containing the facility; or

(ii) Slaughtering, processing or selling poultry or poultry products from the farm operation containing the facility and consistent with the licensing exemption for a person under ORS 603.038(2).

(B) "Processing area" means the floor area of a building dedicated to farm product processing. "Processing area" does not include the floor area designated for preparation, storage or other farm use.

(29)(a) Composting operations and facilities allowed on high-value farmland are limited to those that are accepted farming practices in conjunction with and auxiliary to farm use on the subject tract, and that meet the performance and permitting requirements of the Department of Environmental Quality under OAR 340-093-0050 and 340-096-0060. Excess compost may be sold to neighboring farm operations in the local area and shall be limited to bulk loads of at least one unit (7.5 cubic yards) in size. Buildings and facilities used in conjunction with the composting operation shall only be those required for the operation of the subject facility.

(b) Composting operations and facilities allowed on land not defined as high-value farmland shall meet the performance and permitting requirements of the Department of Environmental Quality under OAR 340-093-0050 and 340-096-0060. Composting operations that are accepted farming practices in conjunction with and auxiliary to farm use on the subject tract are allowed uses, while other composting operations are subject to the review standards of ORS 215.296. Buildings and facilities used in conjunction with the composting operation shall only be those required for the operation of the subject facility. Onsite sales shall be limited to bulk loads of at least one unit (7.5 cubic yards) in size that are transported in one vehicle.

(30) The county governing body or its designate shall require as a condition of approval of a single-family dwelling under ORS 215.213, 215.283 or 215.284 or otherwise in a farm or forest zone, that the landowner for the dwelling sign and record in the deed records for the county a document binding the landowner, and the landowner's successors in interest, prohibiting them from pursuing a claim for relief or cause of action alleging injury from farming or forest practices for which no action or claim is allowed under ORS 30.936 or 30.937.

(31) Public parks including only the uses specified under OAR 660-034-0035 or 660-034-0040, whichever is applicable.

(32) Utility facility service lines are utility lines and accessory facilities or structures that end at the point where the utility service is received by the customer and that are located on one or more of the following:

(a) A public right of way;

(b) Land immediately adjacent to a public right of way, provided the written consent of all adjacent property owners has been obtained; or

(c) The property to be served by the utility.

(33) An outdoor mass gathering as defined in ORS 433.735, subject to the provisions of ORS 433.735 to 433.770. A county may not require an outdoor mass gathering permit under ORS 433.750 for agri-tourism and other commercial events or activities permitted under ORS 215.213(11), 215.283(4), 215.451, 215.452, and ORS 215.449.

(34) An outdoor mass gathering of more than 3,000 persons any part of which is held outdoors and which continues or can reasonably be expected to continue for a period exceeding that allowable for an outdoor mass gathering as defined in ORS 433.735 is subject to review under the provisions of ORS 433.763.

(35)(a) As part of the conditional use approval process under ORS 215.296 and OAR 660-033-0130(5), for the purpose of verifying the existence, continuity and nature of the business described in ORS 215.213(2)(w) or 215.283(2)(y), representatives of the business may apply to the county and submit evidence including, but not limited to, sworn affidavits or other documentary evidence that the business qualifies; and

(b) Alteration, restoration or replacement of a use authorized in ORS 215.213(2)(w) or 215.283(2)(y) may be altered, restored or replaced pursuant to 215.130(5), (6) and (9).

(36) For counties subject to ORS 215.283 and not 215.213, a community center authorized under this section may provide services to veterans, including but not limited to emergency and transitional shelter, preparation and service of meals, vocational and educational counseling and referral to local, state or federal agencies providing medical, mental health, disability income replacement and substance abuse services, only in a facility that is in existence on January 1, 2006. The services may not include direct delivery of medical, mental health, disability income replacement or substance abuse services.

(37) For purposes of this rule a wind power generation facility includes, but is not limited to, the following system components: all wind turbine towers and concrete pads, permanent meteorological towers and wind measurement devices, electrical cable collection systems connecting wind turbine towers with the relevant power substation, new or expanded private roads (whether temporary or permanent) constructed to serve the wind power generation facility, office and operation and maintenance buildings, temporary lay-down areas and all other necessary appurtenances, including but not limited to on-site and off-site facilities for temporary workforce housing for workers constructing a wind power generation facility. Such facilities must be removed or converted to an allowed use under OAR 660-033-0130(19) or other statute or rule when project construction is complete. Temporary workforce housing facilities not included in the initial approval may be considered through a minor amendment request filed after a decision to approve a power generation facility. A minor amendment request shall be subject to OAR 660-033-0130(5) and shall have no effect on the original approval. A proposal for a wind power generation facility shall be subject to the following provisions:

(a) For high-value farmland soils described at ORS 195.300(10), the governing body or its designate must find that all of the following are satisfied:

(A) Reasonable alternatives have been considered to show that siting the wind power generation facility or component thereof on high-value farmland soils is necessary for the facility or component to function properly or if a road system or turbine string must be placed on such soils to achieve a reasonably direct route considering the following factors:

(i) Technical and engineering feasibility;

(ii) Availability of existing rights of way; and

(iii) The long term environmental, economic, social and energy consequences of siting the facility or component on alternative sites, as determined under paragraph (B);

(B) The long-term environmental, economic, social and energy consequences resulting from the wind power generation facility or any components thereof at the proposed site with measures designed to reduce adverse impacts are not significantly more adverse than would typically result from the same proposal being located on other agricultural lands that do not include high-value farmland soils;

(C) Costs associated with any of the factors listed in paragraph (A) may be considered, but costs alone may not be the only consideration in determining that siting any component of a wind power generation facility on high-value farmland soils is necessary;

(D) The owner of a wind power generation facility approved under subsection (a) shall be responsible for restoring, as nearly as possible, to its former condition any agricultural land and associated improvements that are damaged or otherwise disturbed by the siting, maintenance, repair or reconstruction of the facility. Nothing in this subsection shall

prevent the owner of the facility from requiring a bond or other security from a contractor or otherwise imposing on a contractor the responsibility for restoration; and

(E) The criteria of subsection (b) are satisfied.

(b) For arable lands, meaning lands that are cultivated or suitable for cultivation, including high-value farmland soils described at ORS 195.300(10), the governing body or its designate must find that:

(A) The proposed wind power facility will not create unnecessary negative impacts on agricultural operations conducted on the subject property. Negative impacts could include, but are not limited to, the unnecessary construction of roads, dividing a field or multiple fields in such a way that creates small or isolated pieces of property that are more difficult to farm, and placing wind farm components such as meteorological towers on lands in a manner that could disrupt common and accepted farming practices;

(B) The presence of a proposed wind power facility will not result in unnecessary soil erosion or loss that could limit agricultural productivity on the subject property. This provision may be satisfied by the submittal and county approval of a soil and erosion control plan prepared by an adequately qualified individual, showing how unnecessary soil erosion will be avoided or remedied and how topsoil will be stripped, stockpiled and clearly marked. The approved plan shall be attached to the decision as a condition of approval;

(C) Construction or maintenance activities will not result in unnecessary soil compaction that reduces the productivity of soil for crop production. This provision may be satisfied by the submittal and county approval of a plan prepared by an adequately qualified individual, showing how unnecessary soil compaction will be avoided or remedied in a timely manner through deep soil decompaction or other appropriate practices. The approved plan shall be attached to the decision as a condition of approval; and

(D) Construction or maintenance activities will not result in the unabated introduction or spread of noxious weeds and other undesirable weeds species. This provision may be satisfied by the submittal and county approval of a weed control plan prepared by an adequately qualified individual that includes a long-term maintenance agreement. The approved plan shall be attached to the decision as a condition of approval.

(c) For nonarable lands, meaning lands that are not suitable for cultivation, the governing body or its designate must find that the requirements of OAR 660-033-0130(37)(b)(D) are satisfied.

(d) In the event that a wind power generation facility is proposed on a combination of arable and nonarable lands as described in OAR 660-033-0130(37)(b) and (c) the approval criteria of 660-033-0130(37)(b) shall apply to the entire project.

(38) A proposal to site a photovoltaic solar power generation facility shall be subject to the following definitions and provisions:

(a) “Arable land” means land in a tract that is predominantly cultivated or, if not currently cultivated, predominantly comprised of arable soils.

(b) “Arable soils” means soils that are suitable for cultivation as determined by the governing body or its designate based on substantial evidence in the record of a local land use application, but “arable soils” does not include high-value farmland soils described at ORS 195.300(10) unless otherwise stated.

(c) “Dual-use development” means developing the same area of land for both a photovoltaic solar power generation facility and for farm use.

(d) “Nonarable land” means land in a tract that is predominantly not cultivated and predominantly comprised of nonarable soils.

(e) “Nonarable soils” means soils that are not suitable for cultivation. Soils with an NRCS agricultural capability class V–VIII and no history of irrigation shall be considered nonarable in all cases. The governing body or its designate may determine other soils, including soils with a past history of irrigation, to be nonarable based on substantial evidence in the record of a local land use application.

(f) “Photovoltaic solar power generation facility” includes, but is not limited to, an assembly of equipment that converts sunlight into electricity and then stores, transfers, or both, that electricity. This includes photovoltaic modules, mounting and solar tracking equipment, foundations, inverters, wiring, storage devices and other components. Photovoltaic solar power generation facilities also include electrical cable collection systems connecting the photovoltaic solar generation facility to a transmission line, all necessary grid integration equipment, new or expanded private roads constructed to serve the photovoltaic solar power generation facility, office, operation and maintenance buildings, staging areas and all other necessary appurtenances. For purposes of applying the acreage standards of this section, a photovoltaic solar power generation facility includes all existing and proposed facilities on a single tract, as well as any existing and proposed facilities determined to be under common ownership on lands with fewer than 1320 feet of separation from the tract on which the new facility is proposed to be sited. Projects connected to the same parent company or

individuals shall be considered to be in common ownership, regardless of the operating business structure. A photovoltaic solar power generation facility does not include a net metering project established consistent with ORS 757.300 and OAR chapter 860, division 39 or a Feed-in-Tariff project established consistent with ORS 757.365 and OAR chapter 860, division 84.

(g) For high-value farmland described at ORS 195.300(10), a photovoltaic solar power generation facility shall not use, occupy, or cover more than 12 acres unless:

(A) The provisions of paragraph (h)(H) are satisfied; or

(B) A county adopts, and an applicant satisfies, land use provisions authorizing projects subject to a dual-use development plan. Land use provisions adopted by a county pursuant to this paragraph may not allow a project in excess of 20 acres. Land use provisions adopted by the county must require sufficient assurances that the farm use element of the dual-use development plan is established and maintained so long as the photovoltaic solar power generation facility is operational or components of the facility remain on site. The provisions of this subsection are repealed on January 1, 2022.

(h) The following criteria must be satisfied in order to approve a photovoltaic solar power generation facility on high-value farmland described at ORS 195.300(10).

(A) The proposed photovoltaic solar power generation facility will not create unnecessary negative impacts on agricultural operations conducted on any portion of the subject property not occupied by project components. Negative impacts could include, but are not limited to, the unnecessary construction of roads dividing a field or multiple fields in such a way that creates small or isolated pieces of property that are more difficult to farm, and placing photovoltaic solar power generation facility project components on lands in a manner that could disrupt common and accepted farming practices;

(B) The presence of a photovoltaic solar power generation facility will not result in unnecessary soil erosion or loss that could limit agricultural productivity on the subject property. This provision may be satisfied by the submittal and county approval of a soil and erosion control plan prepared by an adequately qualified individual, showing how unnecessary soil erosion will be avoided or remedied. The approved plan shall be attached to the decision as a condition of approval;

(C) Construction or maintenance activities will not result in unnecessary soil compaction that reduces the productivity of soil for crop production. This provision may be satisfied by the submittal and county approval of a plan prepared by an adequately qualified individual, showing how unnecessary soil compaction will be avoided or remedied in a timely manner through deep soil decompaction or other appropriate practices. The approved plan shall be attached to the decision as a condition of approval;

(D) Construction or maintenance activities will not result in the unabated introduction or spread of noxious weeds and other undesirable weed species. This provision may be satisfied by the submittal and county approval of a weed control plan prepared by an adequately qualified individual that includes a long-term maintenance agreement. The approved plan shall be attached to the decision as a condition of approval;

(E) Except for electrical cable collection systems connecting the photovoltaic solar generation facility to a transmission line, the project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(a);

(F) The project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(b)-(e) or arable soils unless it can be demonstrated that:

(i) Non high-value farmland soils are not available on the subject tract;

(ii) Siting the project on non high-value farmland soils present on the subject tract would significantly reduce the project's ability to operate successfully; or

(iii) The proposed site is better suited to allow continuation of an existing commercial farm or ranching operation on the subject tract than other possible sites also located on the subject tract, including those comprised of non high-value farmland soils; and

(G) A study area consisting of lands zoned for exclusive farm use located within one mile measured from the center of the proposed project shall be established and:

(i) If fewer than 48 acres of photovoltaic solar power generation facilities have been constructed or received land use approvals and obtained building permits within the study area, no further action is necessary.

(ii) When at least 48 acres of photovoltaic solar power generation facilities have been constructed or received land use approvals and obtained building permits, either as a single project or as multiple facilities within the study area, the local government or its designate must find that the photovoltaic solar power generation facility will not materially alter the stability of the overall land use pattern of the area. The stability of the land use pattern will be materially altered if the overall effect of existing and potential photovoltaic solar power generation facilities will make it more difficult for the

existing farms and ranches in the area to continue operation due to diminished opportunities to expand, purchase or lease farmland, acquire water rights, or diminish the number of tracts or acreage in farm use in a manner that will destabilize the overall character of the study area.

(H) A photovoltaic solar power generation facility may be sited on more than 12 acres of high-value farmland described in ORS 195.300(10)(f)(C) without taking an exception pursuant to ORS 197.732 and OAR chapter 660, division 4, provided the land:

(i) Is not located within the boundaries of an irrigation district;

(ii) Is not at the time of the facility's establishment, and was not at any time during the 20 years immediately preceding the facility's establishment, the place of use of a water right permit, certificate, decree, transfer order or ground water registration authorizing the use of water for the purpose of irrigation;

(iii) Is located within the service area of an electric utility described in ORS 469A.052(2);

(iv) Does not exceed the acreage the electric utility reasonably anticipates to be necessary to achieve the applicable renewable portfolio standard described in ORS 469A.052(3); and

(v) Does not qualify as high-value farmland under any other provision of law; or

(i) For arable lands, a photovoltaic solar power generation facility shall not use, occupy, or cover more than 20 acres. The governing body or its designate must find that the following criteria are satisfied in order to approve a photovoltaic solar power generation facility on arable land:

(A) Except for electrical cable collection systems connecting the photovoltaic solar generation facility to a transmission line, the project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(a);

(B) The project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(b)-(e) or arable soils unless it can be demonstrated that:

(i) Nonarable soils are not available on the subject tract;

(ii) Siting the project on nonarable soils present on the subject tract would significantly reduce the project's ability to operate successfully; or

(iii) The proposed site is better suited to allow continuation of an existing commercial farm or ranching operation on the subject tract than other possible sites also located on the subject tract, including those comprised of nonarable soils;

(C) No more than 12 acres of the project will be sited on high-value farmland soils described at ORS 195.300(10);

(D) A study area consisting of lands zoned for exclusive farm use located within one mile measured from the center of the proposed project shall be established and:

(i) If fewer than 80 acres of photovoltaic solar power generation facilities have been constructed or received land use approvals and obtained building permits within the study area, no further action is necessary.

(ii) When at least 80 acres of photovoltaic solar power generation facilities have been constructed or received land use approvals and obtained building permits, either as a single project or as multiple facilities within the study area, the local government or its designate must find that the photovoltaic solar power generation facility will not materially alter the stability of the overall land use pattern of the area. The stability of the land use pattern will be materially altered if the overall effect of existing and potential photovoltaic solar power generation facilities will make it more difficult for the existing farms and ranches in the area to continue operation due to diminished opportunities to expand, purchase or lease farmland, acquire water rights, or diminish the number of tracts or acreage in farm use in a manner that will destabilize the overall character of the study area; and

(E) The requirements of OAR 660-033-0130(38)(h)(A), (B), (C) and (D) are satisfied.

(j) For nonarable lands, a photovoltaic solar power generation facility shall not use, occupy, or cover more than 320 acres. The governing body or its designate must find that the following criteria are satisfied in order to approve a photovoltaic solar power generation facility on nonarable land:

(A) Except for electrical cable collection systems connecting the photovoltaic solar generation facility to a transmission line, the project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(a);

(B) The project is not located on those high-value farmland soils listed in OAR 660-033-0020(8)(b)-(e) or arable soils unless it can be demonstrated that:

(i) Siting the project on nonarable soils present on the subject tract would significantly reduce the project's ability to operate successfully; or

(ii) The proposed site is better suited to allow continuation of an existing commercial farm or ranching operation on the subject tract as compared to other possible sites also located on the subject tract, including sites that are comprised of nonarable soils;

(C) No more than 12 acres of the project will be sited on high-value farmland soils described at ORS 195.300(10);

(D) No more than 20 acres of the project will be sited on arable soils;

(E) The requirements of OAR 660-033-0130(38)(h)(D) are satisfied;

(F) If a photovoltaic solar power generation facility is proposed to be developed on lands that contain a Goal 5 resource protected under the county's comprehensive plan, and the plan does not address conflicts between energy facility development and the resource, the applicant and the county, together with any state or federal agency responsible for protecting the resource or habitat supporting the resource, will cooperatively develop a specific resource management plan to mitigate potential development conflicts. If there is no program present to protect the listed Goal 5 resource(s) present in the local comprehensive plan or implementing ordinances and the applicant and the appropriate resource management agency(ies) cannot successfully agree on a cooperative resource management plan, the county is responsible for determining appropriate mitigation measures; and

(G) If a proposed photovoltaic solar power generation facility is located on lands where, after site specific consultation with an Oregon Department of Fish and Wildlife biologist, it is determined that the potential exists for adverse effects to state or federal special status species (threatened, endangered, candidate, or sensitive) or habitat or to big game winter range or migration corridors, golden eagle or prairie falcon nest sites or pigeon springs, the applicant shall conduct a site-specific assessment of the subject property in consultation with all appropriate state, federal, and tribal wildlife management agencies. A professional biologist shall conduct the site-specific assessment by using methodologies accepted by the appropriate wildlife management agency and shall determine whether adverse effects to special status species or wildlife habitats are anticipated. Based on the results of the biologist's report, the site shall be designed to avoid adverse effects to state or federal special status species or to wildlife habitats as described above. If the applicant's site-specific assessment shows that adverse effects cannot be avoided, the applicant and the appropriate wildlife management agency will cooperatively develop an agreement for project-specific mitigation to offset the potential adverse effects of the facility. Where the applicant and the resource management agency cannot agree on what mitigation will be carried out, the county is responsible for determining appropriate mitigation, if any, required for the facility.

(k) An exception to the acreage and soil thresholds in subsections (g), (h), (i), and (j) of this section may be taken pursuant to ORS 197.732 and OAR chapter 660, division 4.

(l) The county governing body or its designate shall require as a condition of approval for a photovoltaic solar power generation facility, that the project owner sign and record in the deed records for the county a document binding the project owner and the project owner's successors in interest, prohibiting them from pursuing a claim for relief or cause of action alleging injury from farming or forest practices as defined in ORS 30.930(2) and (4).

(m) Nothing in this section shall prevent a county from requiring a bond or other security from a developer or otherwise imposing on a developer the responsibility for retiring the photovoltaic solar power generation facility.

(n) If ORS 469.300(11)(a)(D) is amended, the commission may re-evaluate the acreage thresholds identified in subsections (g), (i) and (j) of this section.

(39) Dog training classes or testing trials conducted outdoors or in farm buildings that existed on January 1, 2019, when:

(a) The number of dogs participating in training does not exceed 10 per training class and the number of training classes to be held on-site does not exceed six per day; and

(b) The number of dogs participating in a testing trial does not exceed 60 and the number of testing trials to be conducted on-site does not exceed four per calendar year.

(40) A youth camp may be established on agricultural land under the requirements of this section. The purpose of this section is to allow for the establishment of youth camps that are generally self-contained and located on a lawfully established unit of land of suitable size and location to limit potential impacts on nearby land and to ensure compatibility with surrounding farm uses.

(a) Definitions: In addition to the definitions provided for this division in OAR 660-033-0020 and ORS 92.010, for purposes of this section the following definitions apply:

(A)"Low impact recreational facilities" means facilities that have a limited amount of permanent disturbance on the landscape and are likely to create no, or only minimal impacts on adjacent private lands. Low impact recreational facilities include, but are not limited to, open areas, ball fields, volleyball courts, soccer fields, archery or shooting ranges, hiking and biking trails, horseback riding areas, swimming pools and zip lines. Low impact recreational facilities are designed and developed in a manner consistent with the lawfully established unit of land's natural environment.

(B) "Youth camp" means a facility that is either owned or leased, and is operated by a state or local government or a nonprofit corporation as defined under ORS 65.001 and is established for the purpose of providing an outdoor recreational and educational experience primarily for the benefit of persons 21 years of age and younger. Youth camps do not include a juvenile detention center or juvenile detention facility or similar use.

(C) "Youth camp participants" means persons directly involved with providing or receiving youth camp services, including but not limited to, campers, group leaders, volunteers or youth camp staff.

(b) Location: A youth camp may be located only on a lawfully established unit of land suitable to ensure an outdoor experience in a private setting without dependence on the characteristics of adjacent and nearby public and private land. In determining the suitability of a lawfully established unit of land for a youth camp the county shall consider its size, topography, geographic features and other characteristics, the proposed number of overnight participants and the type and number of proposed facilities. A youth camp may be located only on a lawfully established unit of land that is:

(A) At least 1,000 acres;

(B) In eastern Oregon;

(C) Composed predominantly of class VI, VII or VIII soils;

(D) Not within an irrigation district;

(E) Not within three miles of an urban growth boundary;

(F) Not in conjunction with an existing golf course;

(G) Suitable for the provision of protective buffers to separate the visual and audible aspects of youth camp activities from other nearby and adjacent lands and uses. Such buffers shall consist of natural vegetation, topographic or other natural features and shall be implemented through the requirement of setbacks from adjacent public and private lands, public roads, roads serving other ownerships and riparian areas. Setbacks from riparian areas shall be consistent with OAR 660-023-0090. Setbacks from adjacent public and private lands, public roads and roads serving other ownerships shall be 250 feet unless the county establishes on a case-by-case basis a different setback distance sufficient to:

(i) Prevent significant conflicts with commercial resource management practices;

(ii) Prevent a significant increase in safety hazards associated with vehicular traffic on public roads and roads serving other ownerships; and

(iii) Minimize conflicts with resource uses on nearby resource lands;

(H) At least 1320 feet from any other lawfully established unit of land containing a youth camp approved pursuant to this section; and

(I) Suitable to allow for youth camp development that will not interfere with the exercise of legally established water rights on nearby properties.

(c) Overnight Youth Camp Participants: The maximum number of overnight youth camp participants is 350 participants unless the county finds that a lower number of youth camp participants is necessary to avoid conflicts with surrounding uses based on consideration of the size, topography, geographic features and other characteristics of the lawfully established unit of land proposed for the youth camp. Notwithstanding the preceding sentence, a county may approve a youth camp for more than 350 overnight youth camp participants consistent with this subsection if resource lands not otherwise needed for the youth camp that are located in the same county or adjacent counties that are in addition to, or part of, the lawfully established unit of land approved for the youth camp are permanently protected by restrictive covenant as provided in subsection (d) and subject to the following provisions:

(A) For each 160 acres of agricultural lands predominantly composed of class I-V soils that are permanently protected from development, an additional 50 overnight youth camp participants may be allowed;

(B) For each 160 acres of wildlife habitat that is either included on an acknowledged inventory in the local comprehensive plan or identified with the assistance and support of Oregon Department of Fish and Wildlife, regardless of soil types and resource land designation that are permanently protected from development, an additional 50 overnight youth camp participants may be allowed;

(C) For each 160 acres of agricultural lands predominantly composed of class VI-VIII soils that are permanently protected from development, an additional 25 overnight youth camp participants may be allowed; or

(D) A youth camp may have 351 to 600 overnight youth camp participants when:

(i) The tract on which the youth camp will be located includes at least 1,920 acres; and

(ii) At least 920 acres is permanently protected from development. The county may require a larger area to be protected from development when it finds a larger area necessary to avoid conflicts with surrounding uses.

(E) Under no circumstances shall more than 600 overnight youth camp participants be allowed.

(d) The county shall require, as a condition of approval of an increased number of overnight youth camp participants authorized by paragraphs (c)(A), (B), (C) or (D) of this section requiring other lands to be permanently protected from development, that the land owner of the other lands to be protected sign and record in the deed records for the county or counties where such other lands are located a document that protects the lands as provided herein, which for purposes of this section shall be referred to as a restrictive covenant.

(A) A restrictive covenant shall be sufficient if it is in a form substantially the same as the form attached hereto as Exhibit B.

(B) The county condition of approval shall require that the land owner record a restrictive covenant under this subsection:

(i) Within 90 days of the final land use decision if there is no appeal, or

(ii) Within 90 days after an appellate judgment affirming the final land use decision on appeal.

(C) The restrictive covenant is irrevocable, unless a statement of release is signed by an authorized representative of the county or counties where the land subject to the restrictive covenant is located.

(D) Enforcement of the restrictive covenant may be undertaken by the department or by the county or counties where the land subject to the restrictive covenant is located.

(E) The failure to follow the requirements of this section shall not affect the validity of the transfer of property or the legal remedies available to the buyers of property that is subject to the restrictive covenant required by this subsection.

(F) The county planning director shall maintain a copy of the restrictive covenant filed in the county deed records pursuant to this section and a map or other record depicting the tracts, or portions of tracts, subject to the restrictive covenant filed in the county deed records pursuant to this section. The map or other record required by this subsection shall be readily available to the public in the county planning office.

(e) In addition, the county may allow:

(A) Up to eight nights during the calendar year during which the number of overnight youth camp participants may exceed the total number of overnight youth camp participants allowed under subsection (c) of this section.

(B) Overnight stays at a youth camp for participants of adult programs that are intended primarily for individuals over 21 years of age, not including staff, for up to 30 days in any one calendar year.

(f) Facilities: A youth camp may provide only the facilities described in paragraphs (A) through (I) of this subsection:

(A) Low impact recreational facilities. Intensive developed facilities such as water parks and golf courses are not allowed;

(B) Cooking and eating facilities, provided they are within a building that accommodates youth camp activities but not in a building that includes sleeping quarters. Food services shall be limited to those provided in conjunction with the operation of the youth camp and shall be provided only for youth camp participants. The sale of individual meals may be offered only to family members or guardians of youth camp participants;

(C) Bathing and laundry facilities;

(D) Up to three camp activity buildings, not including a building for primary cooking and eating facilities.

(E) Sleeping quarters, including cabins, tents or other structures, for youth camp participants only, consistent with subsection (c) of this section. Sleeping quarters intended as overnight accommodations for persons not participating in activities allowed under this section or as individual rentals are not allowed. Sleeping quarters may include restroom facilities and, except for the caretaker's dwelling, may provide only one shower for every five beds. Sleeping quarters may not include kitchen facilities.

(F) Covered areas that are not fully enclosed for uses allowed in this section;

(G) Administrative, maintenance and storage buildings including permanent structures for administrative services, first aid, equipment and supply storage, and a gift shop available to youth camp participants but not open to the general public;

(H) An infirmary, which may provide sleeping quarters for medical care providers (e.g., a doctor, registered nurse, or emergency medical technician);

(I) A caretaker's residence, provided no other dwelling is on the lawfully established unit of land on which the youth camp is located.

(g) A campground as described in ORS 215.283(2)(c), OAR 660-033-0120, and section (19) of this rule may not be established in conjunction with a youth camp.

(h) Conditions of Approval: In approving a youth camp application, a county must include conditions of approval as necessary to achieve the requirements of this section.

(A) With the exception of trails, paths and ordinary farm and ranch practices not requiring land use approval, youth camp facilities shall be clustered on a single development envelope of no greater than 40 acres.

(B) A youth camp shall adhere to standards for the protection of archaeological objects, archaeological sites, burials, funerary objects, human remains, objects of cultural patrimony and sacred objects, as provided in ORS 97.740 to 97.750 and 358.905 to 358.961, as follows:

(i) If a particular area of the lawfully established unit of land proposed for the youth camp is proposed to be excavated, and if that area contains or is reasonably believed to contain resources protected by ORS 97.740 to 97.750 and 358.905 to 358.961, the application shall include evidence that there has been coordination among the appropriate Native American Tribe, the State Historic Preservation Office (SHPO) and a qualified archaeologist, as described in ORS 390.235(6)(b).

(ii) The applicant shall obtain a permit required by ORS 390.235 before any excavation of an identified archeological site begins.

(iii) The applicant shall monitor construction during the ground disturbance phase(s) of development if such monitoring is recommended by SHPO or the appropriate Native American Tribe.

(C) A fire safety protection plan shall be adopted for each youth camp that includes the following:

(i) Fire prevention measures;

(ii) On site pre-suppression and suppression measures; and

(iii) The establishment and maintenance of fire-safe area(s) in which camp participants can gather in the event of a fire.

(D) A youth camp's on-site fire suppression capability shall at least include:

(i) A 1000 gallon mobile water supply that can reasonably serve all areas of the camp;

(ii) A 60 gallon-per-minute water pump and an adequate amount of hose and nozzles;

(iii) A sufficient number of firefighting hand tools; and

(iv) Trained personnel capable of operating all fire suppression equipment at the camp during designated periods of fire danger.

(v) An equivalent level of fire suppression facilities may be determined by the governing body or its designate. The equivalent capability shall be based on the response time of the effective wildfire suppression agencies.

(E) The county shall require, as a condition of approval of a youth camp, that the land owner of the youth camp sign and record in the deed records for the county a document binding the land owner, the operator of the youth camp if different from the owner, and the land owner's or operator's successors in interest, prohibiting:

(i) a claim for relief or cause of action alleging injury from farming or forest practices for which no action or claim is allowed under ORS 30.936 or 30.937;

(ii) future land divisions resulting in a lawfully established unit of land containing the youth camp that is smaller in size than required by the county for the original youth camp approval; and

(iii) development on the lawfully established unit of land that is not related to the youth camp and would require a land use decision as defined at ORS 197.015(10) unless the county's original approval of the camp is rescinded and the youth camp development is either removed or can remain, consistent with a county land use decision that is part of such rescission.

(F) Nothing in this rule relieves a county from complying with other requirements contained in the comprehensive plan or implementing land use regulations, such as the requirements addressing other resource values (e.g. resources identified in compliance with statewide planning Goal 5) that exist on agricultural lands.

(i) If a youth camp is proposed to be developed on lands that contain a Goal 5 resource protected under the county's comprehensive plan, and the plan does not address conflicts between youth camp development and the resource, the applicant and the county, together with any state or federal agency responsible for protecting the resource or habitat

supporting the resource, will cooperatively develop a specific resource management plan to mitigate potential development conflicts consistent with OAR chapter 660, divisions 16 and 23. If there is no program to protect the listed Goal 5 resource(s) included in the local comprehensive plan or implementing ordinances and the applicant and the appropriate resource management agency cannot successfully agree on a cooperative resource management plan, the county is responsible for determining appropriate mitigation measures in compliance with OAR chapter 660, division 23; and

(ii) If a proposed youth camp is located on lands where, after site specific consultation with a district state biologist, the potential exists for adverse effects to state or federal special status species (threatened, endangered, candidate, or sensitive) or habitat, or to big game winter range or migration corridors, golden eagle or prairie falcon nest sites, or pigeon springs), the applicant shall conduct a site-specific assessment of the land in consultation with all appropriate state, federal, and tribal wildlife management agencies. A professional biologist shall conduct the site-specific assessment by using methodologies accepted by the appropriate wildlife management agency and shall determine whether adverse effects to special status species or wildlife habitats are anticipated. Based on the results of the biologist's report, the site shall be designed to avoid adverse effects to state or federal special status species or to wildlife habitats as described above. If the applicant's site-specific assessment shows that adverse effects cannot be avoided, the applicant and the appropriate wildlife management agency will cooperatively develop an agreement for project-specific mitigation to offset the potential adverse effects of the youth camp facility. Where the applicant and the resource management agency cannot agree on what mitigation will be carried out, the county is responsible for determining appropriate mitigation, if any, required for the youth camp facility.

(iii) The commission shall consider the repeal of the provisions of subparagraph (ii) on or before January 1, 2022.

(i) Extension of Sewer to a Youth Camp. A Goal 11 exception to authorize the extension of a sewer system to serve a youth camp shall be taken pursuant to ORS 197.732(1)(c), Goal 2, and this section. The exceptions standards in OAR chapter 660, division 4 and OAR chapter 660, division 11 shall not apply. Exceptions adopted pursuant to this section shall be deemed to fulfill the requirements for goal exceptions under ORS 197.732(1)(c) and Goal 2.

(A) A Goal 11 exception shall determine the general location for the proposed sewer extension and shall require that necessary infrastructure be no larger than necessary to accommodate the proposed youth camp.

(B) To address Goal 2, Part II(c)(1), the exception shall provide reasons justifying why the state policy in the applicable goals should not apply. Goal 2, Part II(c)(1) shall be found to be satisfied if the proposed sewer extension will serve a youth camp proposed for up to 600 youth camp participants.

(C) To address Goal 2, Part II(c)(2), the exception shall demonstrate that areas which do not require a new exception cannot reasonably accommodate the proposed sewer extension. Goal 2, Part II(c)(2) shall be found to be satisfied if the sewer system to be extended was in existence as of January 1, 1990 and is located outside of an urban growth boundary on lands for which an exception to Goal 3 has been taken.

(D) To address Goal 2, Part II(c)(3), the exception shall demonstrate that the long term environmental, economic, social, and energy consequences resulting from the proposed extension of sewer with measures to reduce the effect of adverse impacts are not significantly more adverse than would typically result from the same proposal being located in areas requiring a goal exception other than the lawfully established unit of land proposed for the youth camp. Goal 2, Part II(c)(3) shall be found to be satisfied if the proposed sewer extension will serve a youth camp located on a tract of at least 1,000 acres.

(E) To address Goal 2, Part II(c)(4), the exception shall demonstrate that the proposed sewer extension is compatible with other adjacent uses or will be so rendered through measures designed to reduce adverse impacts. Goal 2, Part II(c)(4) shall be found to be satisfied if the proposed sewer extension for a youth camp is conditioned to comply with section (5) of this rule.

(F) An exception taken pursuant to this section does not authorize extension of sewer beyond what is justified in the exception.

(j) Applicability: The provisions of this section shall apply directly to any land use decision pursuant to ORS 197.646 and 215.427(3). A county may adopt provisions in its comprehensive plan or land use regulations that establish standards and criteria in addition to those set forth in this section, or that are necessary to ensure compliance with any standards or criteria in this section.

(41) Equine and equine-affiliated therapeutic counseling activities shall be conducted in existing buildings that were lawfully constructed on the property before January 1, 2019, or in new buildings that are accessory, incidental, and subordinate to the farm use on the tract. All individuals conducting therapeutic or counseling activities must act within the proper scope of any licenses required by the state.

Statutory/Other Authority: ORS 197.040
Statutes/Other Implemented: ORS 197.040, ORS 215.213, ORS 215.275, ORS 215.282, ORS 215.283, ORS 215.301, ORS 215.448, ORS 215.459, ORS 215.705 & ORS 215.449

History:

LCDD 4-2021, amend filed 08/16/2021, effective 08/16/2021
LCDD 15-2020, temporary amend filed 11/10/2020, effective 11/10/2020 through 05/08/2021
LCDD 13-2020, amend filed 08/01/2020, effective 08/01/2020
LCDD 11-2020, amend filed 07/31/2020, effective 08/01/2020
LCDD 9-2020, amend filed 06/22/2020, effective 07/03/2020
LCDD 2-2020, amend filed 03/03/2020, effective 03/03/2020
LCDD 5-2019, amend filed 05/30/2019, effective 05/30/2019
LCDD 4-2019, temporary amend filed 03/23/2019, effective 03/23/2019 through 07/26/2019
LCDD 3-2019, temporary amend filed 01/29/2019, effective 01/29/2019 through 03/22/2019
LCDD 5-2018, temporary amend filed 07/30/2018, effective 07/30/2018 through 01/25/2019
LCDD 1-2018, amend filed 02/23/2018, effective 02/27/2018
LCDD 3-2016, f. & cert. ef. 2-10-16
LCDD 2-2015, f. & cert. ef. 4-9-15
LCDD 2-2014, f. & cert. ef. 10-14-14
LCDD 6-2013, f. 12-20-13, cert. ef. 1-1-14
LCDD 2-2013, f. & cert. ef. 1-29-13
LCDD 7-2012, f. & cert. ef. 2-14-12
LCDD 9-2011, f. & cert. ef. 11-23-11
LCDD 4-2011, f. & cert. ef. 3-16-11
LCDD 11-2010, f. & cert. ef. 11-23-10
LCDD 9-2010, f. & cert. ef. 9-24-10
LCDD 7-2010(Temp), f. & cert. ef. 6-17-10 thru 11-30-10
LCDD 6-2010, f. & cert. ef. 6-17-10
LCDD 5-2009, f. & cert. ef. 12-7-09
LCDD 5-2008, f. 12-31-08, cert. ef. 1-2-09
LCDD 3-2008, f. & cert. ef. 4-18-08
LCDD 2-2006, f. & cert. ef. 2-15-06
LCDD 1-2004, f. & cert. ef. 4-30-04
LCDD 1-2002, f. & cert. ef. 5-22-02
LCDD 9-2000, f. & cert. ef. 11-3-00
LCDD 5-2000, f. & cert. ef. 4-24-00
LCDD 2-1998, f. & cert. ef. 6-1-98
LCDD 5-1997, f. & cert. ef. 12-23-97
LDCD 5-1996, f. & cert. ef. 12-23-96
LCDC 8-1995, f. & cert. ef. 6-29-95
LCDC 6-1994 , f. & cert. ef. 6-3-94
LCDC 3-1994, f. & cert. ef. 3-1-94
LCDC 6-1992, f. 12-10-92, cert. ef. 8-7-93

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Attachment K

GLARE ANALYSIS - FORGE SOLAR

Passage Solar
February 2024

OneEnergy Renewables
2003 Western Ave, Suite 225
Seattle, Washington 98121

oneenergy
renewables
.com

FORGESOLAR GLARE ANALYSIS

Project: **Passage Solar**

Passage Solar will include approximately 1,382 acres of Agricultural land in Morrow and Umatilla Counties, Oregon. Some light grading and clearing may take place but there will be little change to the quantity of impervious surface. It is expected that the project will generate 74+ MW of power.

Site configuration: **DoD SUA R-5701-FINAL2-temp-16**

Created 12 Jan, 2024
Updated 12 Jan, 2024
Time-step 1 minute
Timezone offset UTC-8
Minimum sun altitude 0.0 deg
DNI peaks at 1,000.0 W/m^2
Category 10 MW to 100 MW
Site ID 109614.15987

Ocular transmission coefficient 0.5
Pupil diameter 0.002 m
Eye focal length 0.017 m
Sun subtended angle 9.3 mrad
PV analysis methodology V2

Summary of Results

Glare with low potential for temporary after-image predicted

PV Array	Tilt	Orient	Annual Green Glare		Annual Yellow Glare		Energy
	°	°	min	hr	min	hr	kWh
Passage Solar - Full Possible Extent	SA tracking	SA tracking	5,781	96.3	0	0.0	-

Total glare received by each receptor; may include duplicate times of glare from multiple reflective surfaces.

Receptor	Annual Green Glare		Annual Yellow Glare	
	min	hr	min	hr
SUA R-5701 East	2,897	48.3	0	0.0
SUA R-5701 West	2,884	48.1	0	0.0

Component Data

PV Arrays

Name: Passage Solar - Full Possible Extent
Axis tracking: Single-axis rotation
Backtracking: None
Tracking axis orientation: 180.0°
Tracking axis tilt: 0.0°
Tracking axis panel offset: 0.0°
Max tracking angle: 52.0°
Rated power: -
Panel material: Light textured glass with AR coating
Reflectivity: Vary with sun
Slope error: correlate with material

Vertex	Latitude (°)	Longitude (°)	Ground elevation (ft)	Height above ground (ft)	Total elevation (ft)
1	45.675533	-119.443419	1031.74	7.00	1038.74
2	45.677872	-119.443591	1025.62	7.00	1032.62
3	45.679851	-119.445222	1011.60	7.00	1018.60
4	45.686207	-119.446080	995.02	7.00	1002.02
5	45.687226	-119.446338	1013.70	7.00	1020.70
6	45.692083	-119.450629	991.75	7.00	998.75
7	45.694541	-119.451316	961.18	7.00	968.18
8	45.694886	-119.451294	951.46	7.00	958.46
9	45.694976	-119.447153	985.40	7.00	992.40
10	45.697179	-119.448076	982.41	7.00	989.41
11	45.699097	-119.448333	981.51	7.00	988.51
12	45.700536	-119.448312	946.44	7.00	953.44
13	45.701315	-119.448612	955.83	7.00	962.83
14	45.702574	-119.448526	937.55	7.00	944.55
15	45.702769	-119.448033	939.71	7.00	946.71
16	45.704627	-119.448119	949.93	7.00	956.93
17	45.704612	-119.440952	910.05	7.00	917.05
18	45.704342	-119.439922	913.92	7.00	920.92
19	45.704432	-119.438613	931.77	7.00	938.77
20	45.703967	-119.437497	936.48	7.00	943.48
21	45.704147	-119.436360	940.50	7.00	947.50
22	45.704597	-119.435781	969.91	7.00	976.91
23	45.704657	-119.434665	975.78	7.00	982.78
24	45.690034	-119.434664	1011.55	7.00	1018.55
25	45.684218	-119.434664	1024.20	7.00	1031.20
26	45.681999	-119.434707	1027.01	7.00	1034.01
27	45.679121	-119.434707	1029.09	7.00	1036.09
28	45.675601	-119.434677	1038.13	7.00	1045.13
29	45.675598	-119.435063	1038.05	7.00	1045.05

Flight Path Receptors

Name: SUA R-5701 East
Description:
Threshold height: 1000 ft
Direction: 90.0°
Glide slope: 0.0°
Pilot view restricted? Yes
Vertical view: 30.0°
Azimuthal view: 50.0°

Point	Latitude (°)	Longitude (°)	Ground elevation (ft)	Height above ground (ft)	Total elevation (ft)
Threshold	45.703462	-119.399614	972.57	1000.00	1972.57
Two-mile	45.703477	-119.441062	939.82	1032.75	1972.57

Name: SUA R-5701 West
Description:
Threshold height: 1000 ft
Direction: 270.0°
Glide slope: 0.0°
Pilot view restricted? Yes
Vertical view: 30.0°
Azimuthal view: 50.0°

Point	Latitude (°)	Longitude (°)	Ground elevation (ft)	Height above ground (ft)	Total elevation (ft)
Threshold	45.703611	-119.482555	997.91	1000.00	1997.91
Two-mile	45.703611	-119.441106	938.31	1059.60	1997.91

Glare Analysis Results

Summary of Results

Glare with low potential for temporary after-image predicted

PV Array	Tilt	Orient	Annual Green Glare		Annual Yellow Glare		Energy
	°	°	min	hr	min	hr	kWh
Passage Solar - Full Possible Extent	SA tracking	SA tracking	5,781	96.3	0	0.0	-

Total glare received by each receptor; may include duplicate times of glare from multiple reflective surfaces.

Receptor	Annual Green Glare		Annual Yellow Glare	
	min	hr	min	hr
SUA R-5701 East	2,897	48.3	0	0.0
SUA R-5701 West	2,884	48.1	0	0.0

PV: Passage Solar - Full Possible Extent

low potential for temporary after-image

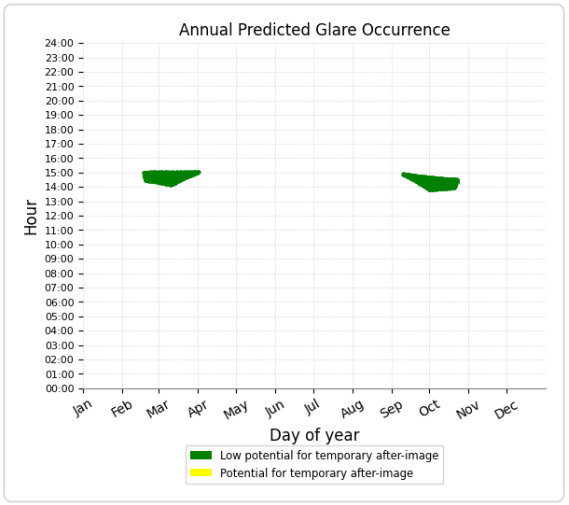
Receptor results ordered by category of glare

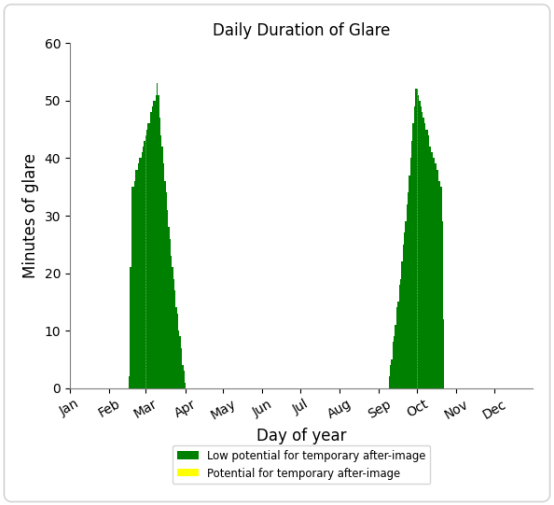
Receptor	Annual Green Glare		Annual Yellow Glare	
	min	hr	min	hr
SUA R-5701 East	2,897	48.3	0	0.0
SUA R-5701 West	2,884	48.1	0	0.0

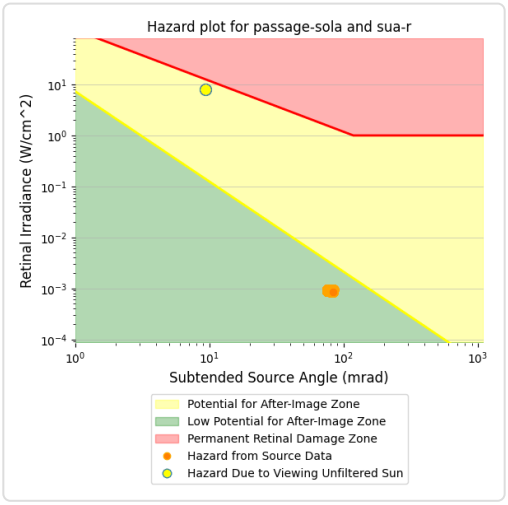
Passage Solar - Full Possible Extent and FP: SUA R-5701 East

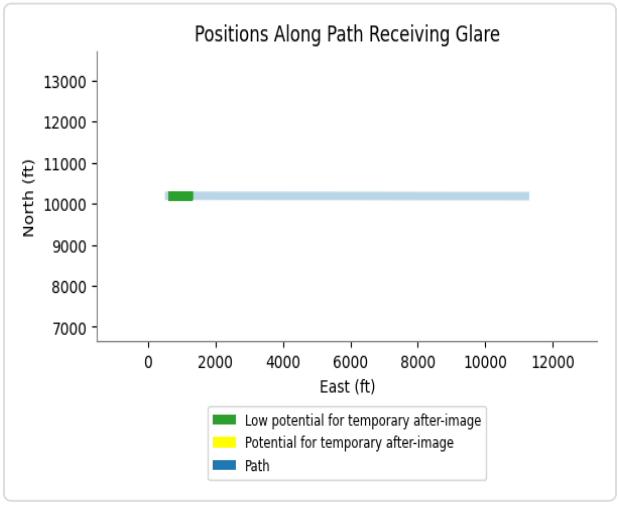
Yellow glare: none

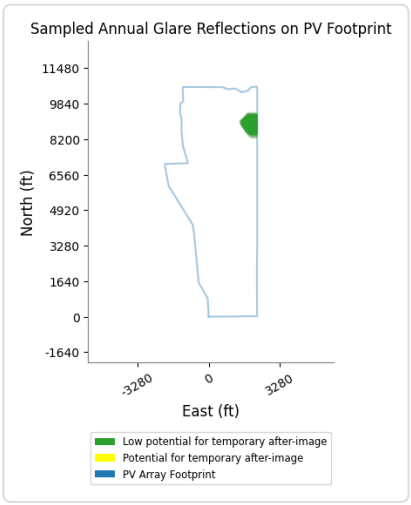
Green glare: 2,897 min.

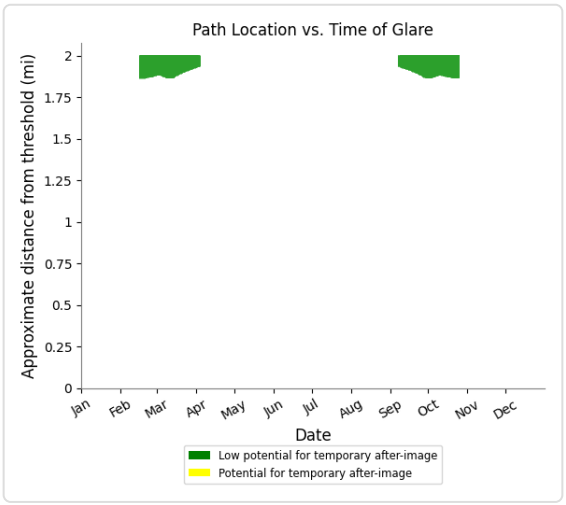








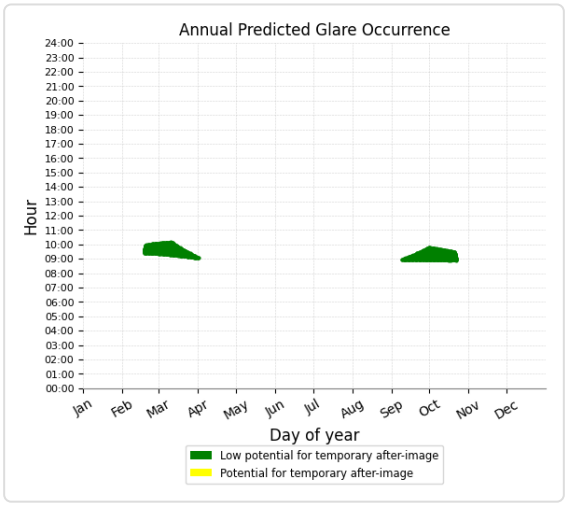


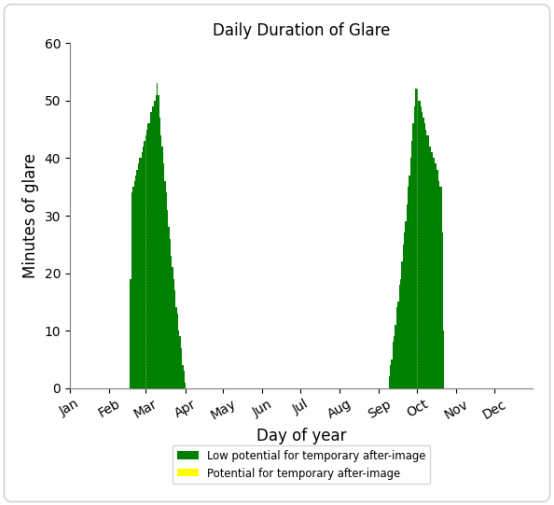


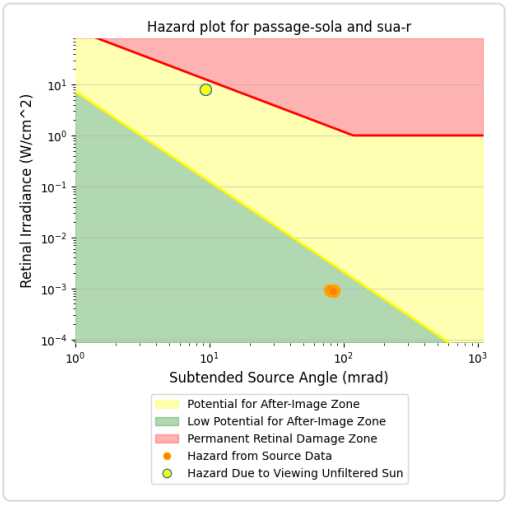
Passage Solar - Full Possible Extent and FP: SUA R-5701 West

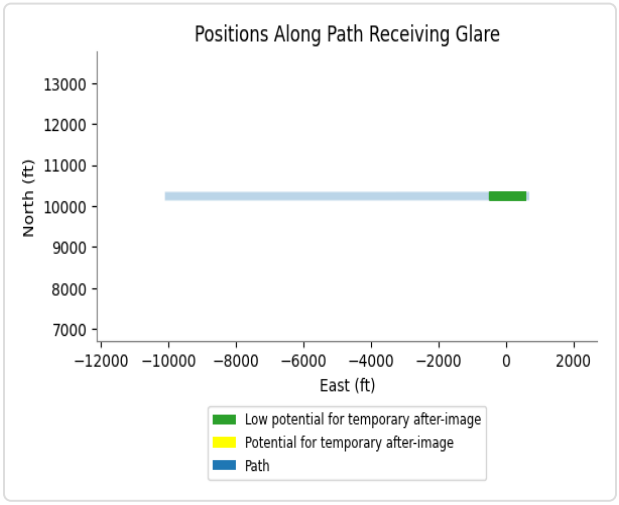
Yellow glare: none

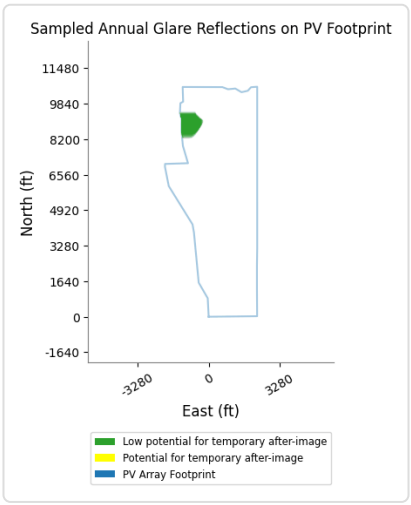
Green glare: 2,884 min.

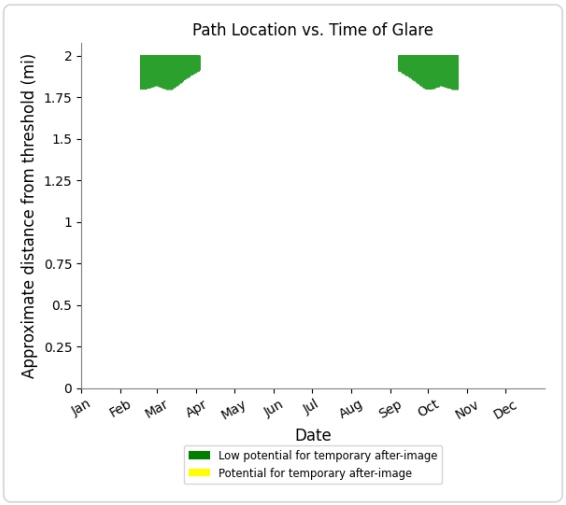












Assumptions

"Green" glare is glare with low potential to cause an after-image (flash blindness) when observed prior to a typical blink response time.
"Yellow" glare is glare with potential to cause an after-image (flash blindness) when observed prior to a typical blink response time.
Times associated with glare are denoted in Standard time. For Daylight Savings, add one hour.
The algorithm does not rigorously represent the detailed geometry of a system; detailed features such as gaps between modules, variable height of the PV array, and support structures may impact actual glare results. However, we have validated our models against several systems, including a PV array causing glare to the air-traffic control tower at Manchester-Boston Regional Airport and several sites in Albuquerque, and the tool accurately predicted the occurrence and intensity of glare at different times and days of the year.
Several V1 calculations utilize the PV array centroid, rather than the actual glare spot location, due to algorithm limitations. This may affect results for large PV footprints. Additional analyses of array sub-sections can provide additional information on expected glare. This primarily affects V1 analyses of path receptors.
Random number computations are utilized by various steps of the annual hazard analysis algorithm. Predicted minutes of glare can vary between runs as a result. This limitation primarily affects analyses of Observation Point receptors, including ATCTs. Note that the SGHAT/ ForgeSolar methodology has always relied on an analytical, qualitative approach to accurately determine the overall hazard (i.e. green vs. yellow) of expected glare on an annual basis.
The analysis does not automatically consider obstacles (either man-made or natural) between the observation points and the prescribed solar installation that may obstruct observed glare, such as trees, hills, buildings, etc.
The subtended source angle (glare spot size) is constrained by the PV array footprint size. Partitioning large arrays into smaller sections will reduce the maximum potential subtended angle, potentially impacting results if actual glare spots are larger than the sub-array size. Additional analyses of the combined area of adjacent sub-arrays can provide more information on potential glare hazards. (See previous point on related limitations.)
The variable direct normal irradiance (DNI) feature (if selected) scales the user-prescribed peak DNI using a typical clear-day irradiance profile. This profile has a lower DNI in the mornings and evenings and a maximum at solar noon. The scaling uses a clear-day irradiance profile based on a normalized time relative to sunrise, solar noon, and sunset, which are prescribed by a sun-position algorithm and the latitude and longitude obtained from Google maps. The actual DNI on any given day can be affected by cloud cover, atmospheric attenuation, and other environmental factors.
The ocular hazard predicted by the tool depends on a number of environmental, optical, and human factors, which can be uncertain. We provide input fields and typical ranges of values for these factors so that the user can vary these parameters to see if they have an impact on the results. The speed of SGHAT allows expedited sensitivity and parametric analyses.
The system output calculation is a DNI-based approximation that assumes clear, sunny skies year-round. It should not be used in place of more rigorous modeling methods.
Hazard zone boundaries shown in the Glare Hazard plot are an approximation and visual aid based on aggregated research data. Actual ocular impact outcomes encompass a continuous, not discrete, spectrum.
Glare locations displayed on receptor plots are approximate. Actual glare-spot locations may differ.
Refer to the Help page at **www.forgesolar.com/help/** for assumptions and limitations not listed here.

Default glare analysis parameters and observer eye characteristics (for reference only):

- Analysis time interval: 1 minute
- Ocular transmission coefficient: 0.5
- Pupil diameter: 0.002 meters
- Eye focal length: 0.017 meters
- Sun subtended angle: 9.3 milliradians

Attachment L

VEGETATION AND WEED MANAGEMENT PLAN

Passage Solar
February 2024

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1. INTRODUCTION

Passage Solar OR, LLC (the Applicant) proposes to construct and operate Passage Solar (Project), a solar photovoltaic project sized up to 120 megawatt (MW) with an optional battery storage system capable of storing up to 120 MWh of energy located in Morrow County, Oregon.

This document addresses vegetation management activities related to the Project construction and operation and specifically methods that will be implemented for effective noxious weed control and revegetation. The Applicant has consulted with the Morrow County Noxious Weed Control Board to develop this plan.

2. VEGETATION MANAGEMENT

2.1 CURRENT VEGETATON

The Project may be located on up to 753 acres (Project Area). The Project Area is comprised of land jointly owned by the Timothy and Shannon Rust Living Trust, the Shannon Rust Share of the Frank and LaVonne Mader Living Trust, and the Clarkston Development Company consisting of 2 land tracts (3N2700-00-01200 and 2N2700-00-00100) including a total of 5,800 acres (Figure 1).

The Project is located on the Umatilla Plateau across private land that is used for unirrigated crop cultivation. The Project Area also includes access roads and other developed areas. The terrain consists of generally flat topography with the exception of Fourmile Canyon which is located directly west of the Project. The Project Parcel is accessed via two private roads: Mader-Rust Land and Madison Sayler Road, both of which connect to Oregon Route 207, also known as the Lexington-Echo Highway.

Land use surrounding the Project Area consists primarily of agriculture and livestock grazing. An existing conditions survey was completed in October of 2023 during the habitat assessment by Tetra Tech, Inc. (***Attachment E*** of the CUP). The dominant habitat type within the Project Area Extent is Agriculture, Pasture, and Mixed environs, with minor Eastside Grassland isolated in patches around the Project Area margin. Vegetation in these isolated patches was primarily composed of non-native cereal rye, cheatgrass, squirreltail, rattail fescue, fiddleneck, and yarrow. The bulk of the Project area, however, is comprised of dryland wheat fields.

2.2 CONSTRUCTION IMPACTS TO VEGETATON

During construction, the Applicant will employ Best Management Practices (BMPs) to avoid impacts to native plant species when possible. These include erosion control and temporary fencing protection. In addition, site preparation will consist of clearing the existing vegetation only in those areas where construction, grading, and road improvements will occur and leaving existing vegetation intact when feasible. The marginal Eastside Grassland areas will be avoided altogether. Once the site is prepared, the installation of racking systems, modules and inverter pads will use internal access roads. Reclamation measures will be implemented to restore the temporarily disturbed near-surface soils at the Project site. Permanent impacts from project

construction will be minimized whenever possible, enabling the land to return to agricultural uses at the end of its useful life.

2.3 REVEGETATION

Revegetation will be conducted following construction and decommissioning. At the conclusion of construction, disturbed areas will be re-seeded with a certified weed-free, low-growing native seed mix, selected in coordination with the Oregon Department of Fish and Wildlife. The existing conditions will inform the selection of the appropriate seed mix. The Applicant may replace lost topsoil in disturbed areas. The method and timing of planting will depend on the seed mix, site conditions and weather, with typical seeding occurring around Fall during the wetter months.

2.4 OPERATIONAL VEGETATON MANAGEMENT

Minimal on-site maintenance will be required over the life of the Project. Once the Project is operational, mechanical control (i.e. mowing) will be conducted on a monthly and/or bi-monthly basis, depending on the season and as-needed, over the entire lifespan of the Project. The Applicant is exploring alternative and additive vegetation management strategies, such as sheep grazing, though no commitments have been entered into with graziers. The Project is purposefully designed to allow inter-row spaces wide enough to allow more efficient and effective mower decks access to the majority of the Project's acreage.

2.5 MONITORING

Operations and maintenance staff will routinely monitor buffer areas for vegetation loss to ensure vegetation replacement occurs quickly. A grounds maintenance schedule will be put into place prior to the start of construction to document the mowing, watering, and vegetation monitoring schedules. Monitoring would be done at least four times a year for weeds—approximately once every other month from March through October, or more frequently as needed. The plan will include approved vegetation management measures to control undesirable plant species, eliminate shading of panels, and maintain reliable access for operations, maintenance, and emergency response purposes should mowing be insufficient.

3. WEED MANAGEMENT

The primary species of concern are described in the Morrow County Noxious Weed List (excerpt included as Appendix 1), which is jointly maintained by the Oregon State Noxious Weed Control Board and the Morrow County Weed Control District. The list contains the non-native weeds classified as "A", and "B" state designated noxious weeds. As defined by the Oregon Department of Agriculture Noxious Weed Policy, and OAR 603-052-1200, "A" List weeds are of known economic importance which occurs in the state in small enough infestations to make eradication or containment possible; or is not known by the Morrow County Weed Control District to occur, but its presence in neighboring states make future occurrence in Oregon seem imminent. "B" List weeds are defined as weeds of economic importance which are regionally abundant, but which may not occur or have limited distribution in some counties.

The Project will comply with OAR 603-052-1200 and ORS 569.175 to 569.195 related to the landowner's duty to control the spread of noxious weeds. All "A" weeds found at the Project site before or during construction and during operation will be eradicated. "B" weeds will be controlled or eradicated, and the Project will work with the Oregon Department of Agriculture and/or the County to develop a plan for mitigating the risk of spreading those weeds. The Project operations and maintenance staff would conduct bi-annual meetings with the County Weed Coordinator to ensure monitoring and treatments were a success and to ensure re-vegetation sites were effective. In addition, the applicant will comply with Morrow County Code Enforcement Ordinance (ORD-2019-4).

Rush skeleton weed, yellow star thistle, and scotch thistle are weeds of primary concern in this area. These weeds revegetate with mechanical treatment and will also be controlled using a broadleaf control herbicide when necessary. Additionally, Morrow County has expressed the importance of weed prevention. The Applicant has addressed this by incorporating truck/equipment wash stations on-site to further control the spread of weeds into and out of the site during construction (see Section 3.1-Preventative Measures).

Applicant will exercise the following combination of efforts for the most cost-effective and practical approach to managing noxious weed populations:

- Preventative Measures: Monitoring, detection, best management practices, preventative planning and training;
- Control Measures: Mechanical treatment, seed head clipping, and/or herbicide treatment, as appropriate.
- Herbicide Application and Handling Guidelines: Relevant application standards, methods, and transport guidelines.

3.1 PREVENTATIVE MEASURES

Soil preservation and preparation techniques represent the foundation of successful noxious weed control as disturbed soils are the most common vector for noxious weeds to colonize an area. The likelihood of invasion by noxious weeds can be reduced by rehabilitating ground that is temporarily disturbed during construction. The Project will minimize soil disturbance during construction and will replant disturbed areas with low-growing native seed mixes.

One of the main preventative measures in weed control includes equipment washing, which limits the spread of weeds into and out of sites. The Applicant will incorporate a wash station on-site during construction for trucks and equipment to use before entering the site and prior to exiting the site. Additionally, a survey of the existing conditions has been conducted by Tetra Tech Inc. in which the Listed weeds identified on-site included Cereal Rye and Diffuse Knapweed. These weeds will be removed during site preparation using a combination of mechanical control and herbicide application to limit spread during construction activities.

3.2 CONTROL MEASURES

Once the Project is operational, mechanical control (i.e. mowing) will be conducted on a monthly and/or bi-monthly basis, depending on the season, and as needed, over the entire lifespan of the Project, unless it is found that agrivoltaic sheep grazing will be an adequate substitute or supplement to mechanical control, and that it is agreed upon with the landowner and adherent to Morrow County Code.

The Project will retain a qualified landscaping contractor to provide regular weed control and eliminate the spread of new noxious weed presence resultant from construction and operations activity at the Project site. If herbicide treatment is necessary, Applicant will only use herbicides that are approved for use in the state of Oregon by the U.S. Environmental Protection Agency (EPA) and the Oregon Department of Agriculture (ODA). In such cases, Applicant will notify landowners of the herbicide proposed for use on their lands and obtain approval prior to application. Applicant will apply herbicides to identified treatable noxious weed populations as described below. If a weed population is deemed to be untreatable (e.g., too widespread and established in area to successfully control), Applicant will implement all the control measures discussed above except treatment with herbicides. Applicant will coordinate with the Morrow County Weed Control District and reference the “Pacific Northwest Weed Management Handbook” in determining the appropriate application of herbicides.

The success of the combined targeted chemical control, mechanical control, and low-growing native seed mix will be documented and reported by the operation and maintenance team responsible for maintaining the site.

3.3 HERBICIDE APPLICATION AND HANDLING GUIDELINES

Herbicide application would adhere to EPA and ODA standards. Only herbicides approved by the EPA and ODA will be used. In general, application of herbicides would not occur when the following conditions exist:

- Wind velocity exceeds 15 miles per hour for granular application or 10 miles per hour for liquid applications;
- Snow or ice covers the foliage of target species; or
- Adverse weather conditions are forecasted in the next few days.

Hand application methods (e.g., backpack spraying) may be used in roadless areas or in rough terrain. Calibration checks of equipment would be conducted at the beginning of spraying and repeated periodically to ensure that proper application rates are achieved.

Herbicides would be transported to the Project site with the following provisions:

- Only the quantity needed for that day’s work would be transported.
- Concentrate would be transported in approved containers only, in a manner that prevents tipping or spilling, and in a compartment that is isolated from food, clothing, and safety equipment.
- Mixing would be done off site and at a distance greater than 200 feet from open or flowing water, wetlands, or other sensitive resources such as known

Threatened and Endangered and sensitive species habitat. No herbicides would be applied at these areas unless authorized by the appropriate regulatory agencies.

- All herbicide equipment and containers would be inspected for leaks daily.
- Herbicide use would be in accordance with all manufacturer label recommendations and warnings. All herbicide treatments will fall within label guidelines since “the label is the law.”

During the operation of the Project, chemical control measures shall be conducted on an as-needed basis in a frequency and intensity to be determined by trained professionals according to the guidelines set forth by the Pacific Northwest Weed Management Handbook (PEA, 2020).

4. ADAPTIVE MANAGEMENT

The plan outlined in this document will follow adaptive management practices, whereby management activities will be assessed on a continual basis and amendments to this plan may occur if specific site conditions warrant an alteration to this plan. The Applicant would coordinate any amendments to this plan with the permitting authority and other parties involved in the management of the Project.

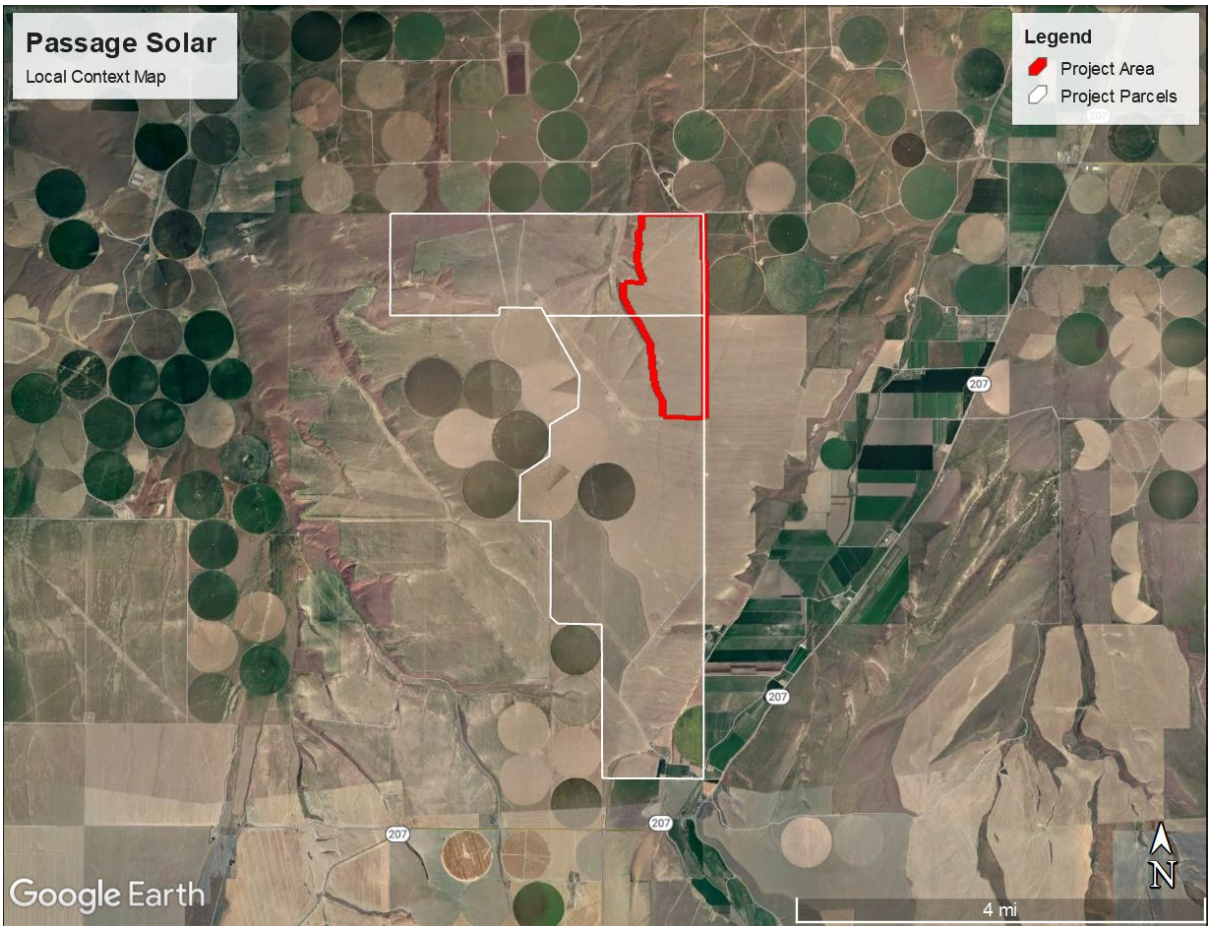

Figure 1: Local Context Map

SOURCES

Morrow County. 2017. Morrow Soil and Water Conservation District Board: Weed List (serves as the Weed Advisory Board for the Morrow County Weed Control District). http://www.co.morrow.or.us/publicworks/page/weed-department . Accessed January 18, 2024. (Enclosed as Appendix 1)

Co.morrow.or.us. 2022. *Morrow County Code Enforcement Ordinance*. [online] Available at: https://www.co.morrow.or.us/sites/default/files/fileattachments/planning/page/16373/07052021_effective_2021_code_enforcement_ordinance.pdf Accessed January 18 2024.

Oregon Department of Agriculture. 2020. Oregon Department of Agriculture Noxious Weed Policy and Classification System 2020. https://www.oregon.gov/ODA/shared/Documents/Publications/Weeds/NoxiousWeedPolicyClassification.pdf#:~:text=The%20Oregon%20Department%20of%20Agriculture%20%28ODA%29%20Noxious%20Weed,assessments%2C%20and%20maintaining%20the%20state%20noxious%20weed%20list. Accessed January 18, 2024.

Peachey, E., editor. 2020. Pacific Northwest Weed Management Handbook. Corvallis, OR: Oregon State University.

APPENDIX 1: MORROW COUNTY NOXIOUS WEED LIST & MORROW COUNTY WEED ORDINANCE

Excerpted from Morrow County Weed Department website on January 18, 2024

Morrow County Weed List:

NOXIOUS WEEDS
Noxious Weeds – "A" List" – Any plant that is determined by the weed advisory board, and so declared by the County Board of Commissioners to be injurious to public health, crops, livestock, land or property under provisions of Oregon State Statute and thus mandated for control.

- Rush Skeletonweed
- Yellow Starthistle
- Tansy Ragwort
- Dalmatian & Yellow Toadflax
- Mediterranean Sage
- Leafy Spurge
- Spikeweed
- Musk Thistle
- Scotch Thistle
- Purple Loosestrife
- Common Crupina
- White Top
- Hounds tongue
- Plumeless Thistle
- Flowering Rush
- Yellow Flag Iris

WEEDS OF ECONOMIC IMPORTANCE
Weeds of Economic Importance – "B" List – Weeds of limited distribution in the county and subject to intensive control or eradication where feasible.

- Poison Hemlock
- Canada Thistle
- Jointed Goatgrass
- St. Johnswort
- Perennial Sowthistle
- Field Bindweed
- Cereal Rye
- Wild Oats
- Johnsongrass
- Knapweeds – Russian, Diffuse, Spotted
- Field Dodder
- Water Hemlock
- Medusahead Rye
- Puncturevine
- Kochia
- Perennial Pepperweed
- Myrtle Spurge
- Ventenata

Attachment M

TRANSPORTATION PLAN

Passage Solar
February 2024

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GENERAL TRANSPORTATION INFORMATION

Morrow County requires a Traffic Impact Analysis (TIA) if a project will generate more than 400 passenger car equivalent trips per day. MCZO 6.030(D)(2). Based on similar sized solar projects, Passage Solar OR, LLC (Applicant) provides the following traffic estimates to demonstrate that a TIA is not required under the MCZO. Applicant then uses this information to prepare the Transportation Plan and Transportation Routing Options discussed below.

Traffic Assumptions and Estimates

- Construction Period: 9-18 months

- Deliveries: During peak construction it is estimated to be up to 40-50 heavy vehicle round-trips per day, primarily semi-trailer trucks delivering equipment (gravel, cement, electrical equipment, panels). Peak construction traffic is estimated to last only 1-4 weeks, and then subside to much smaller numbers for the remainder of construction.

- Construction Personnel: At peak, the Project will require approximately 300 construction personnel per day. Vehicle use is estimated based on 2 personnel per vehicle for at peak construction levels, resulting in approximately 150 passenger vehicle trips per day. The peak personnel construction level is anticipated to follow the peak delivery period of construction, so that maximum delivery and personnel traffic periods do not significantly overlap.

- In total up to approximately 200 vehicles per day will be added to the background traffic patterns along the primary transportation route during construction, inlcuding truck trips and personnel trips.

- Operations: Limited traffic for maintenance crews, this includes quarterly to yearly electrical and PV maintenance and regular vegetation maintenance visits.

Transportation routes will be used to bring in equipment, materials, and the labor force to the Project. The main transportation routes to the general vicinity are I-84 and I-82. As Interstate Highways, these roads are designated freight routes and provide a safe and efficient transportation route.

TRANSPORTATION ROUTE OPTION 1 – via Madison Road

The first proposed transportation route will use Exit 182 off I-84 to take Oregon State Road 207 south for 5.3 miles before continuing west onto Madison Road (County Road No. 1356). After approximately 0.7 miles, Madison Road becomes a private road on which trucks will continue approximately 3.5 miles until they reach the Project Area. From that location, a new access point for the Project will be created.

This route is preferred due to its close proximity to the existing exit on I-84, and the minimization of traffic on state and local roads. All transport routes will use only existing highways, local county roads and private roads. Any new road construction will occur only within the Project Area. Construction related traffic is not expected to cause any traffic delays on either highways or local roadways.

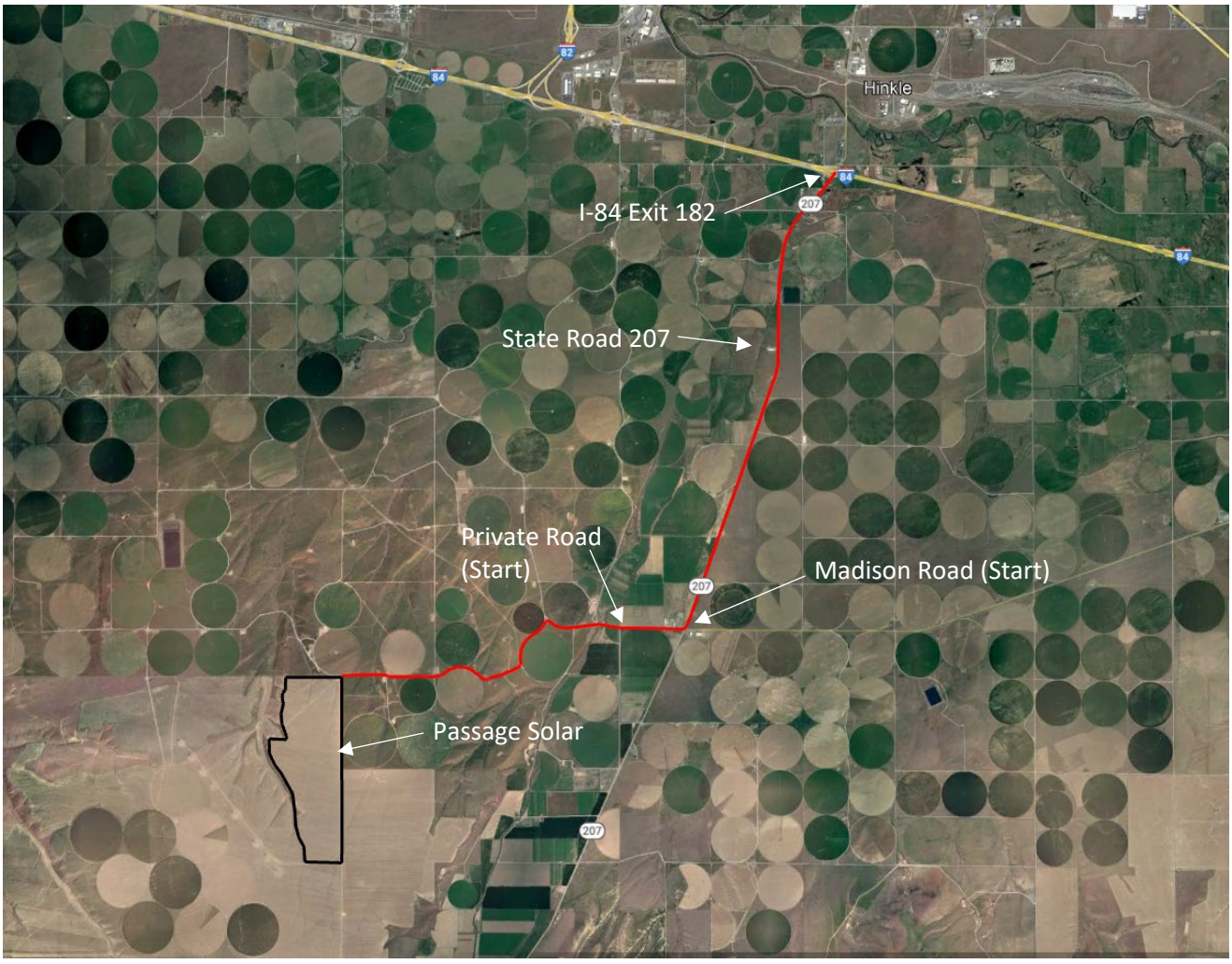
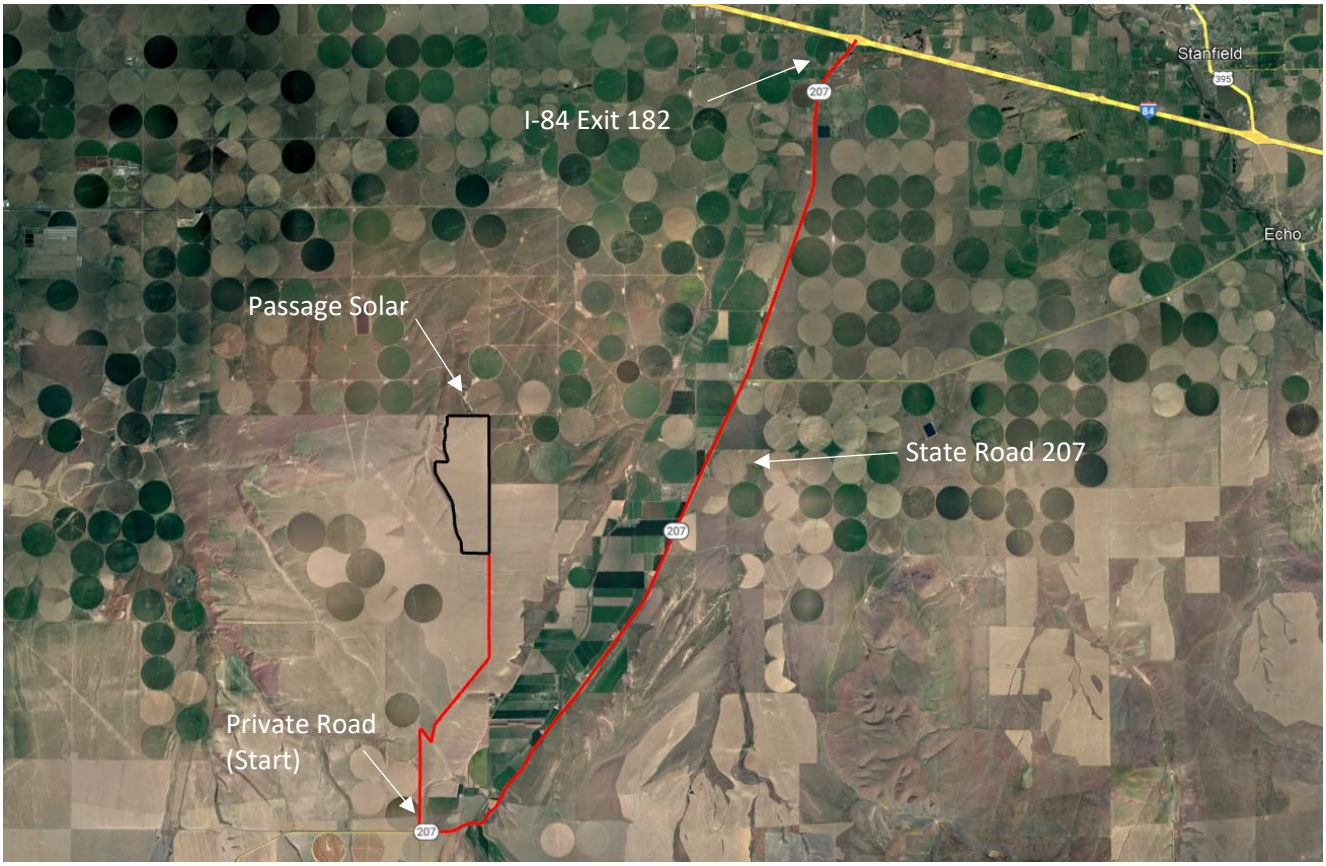


Figure 1: Map of Transportation Route Option 1

TRANSPORTATION ROUTE OPTION 2 – via Unnamed Private Road

The second proposed transportation route will also use Exit 182 off I-84 to take Oregon State Road 207 south for 13.8 miles before turning north onto a private road. The turnoff point is located at 45°37'02.95"N, 119°27'19.91"W. From the turnoff, the road proceeds 4.75 miles through private land to the Project Area. This route does not include transport on any county roads.



Attachment N

DECOMMISSIONING PLAN

Passage Solar
February 2024

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DECOMMISSIONING PLAN

The Project has an estimated useful life of 35 years, with the possibility of extending that useful life in the case of equipment replacement, upgrading, and repowering. When the useful life of the Project has reached its end, power generation will cease, the Project will be decommissioned, and all components of the Project will be removed from the property. Finally, the site will be returned to the farmable conditions in place prior to construction of the Project.

This Decommissioning Plan contains the current industry best practices and may change as these practices evolve and improve between now and the end of the useful life.

Decommissioning Process

The Project's infrastructure will consist of mostly recyclable materials, including semiconductor material, aluminum, glass, steel, copper, and plastic. At the time of decommissioning, these components will be dismantled, removed from the property, separated by material, and sorted according to salvageable value and recyclability. Salvage value is expected to provide a significant portion of the funding for the decommissioning of the Project.

Improvements made to the land (including access roads, driveways, and plantings) during the construction and operation will be reclaimed using industry best practices. Some may remain on the site per the wishes of the landowner. All improvements not reclaimed and returned to agricultural use will be approved by the Morrow County Department of Planning Services.

Decommissioning is planned to include the following steps:

1. The project owner will schedule a pre-closure meeting with the Morrow County Planning Department up to one year prior to the planned decommissioning of the Project. Final details of the decommissioning will be discussed at this meeting and developed in coordination with Morrow County.
2. Any necessary permits will be acquired prior to the commencing of decommissioning.
3. Any agencies and other local departments necessary will be contacted and coordinated with.
4. The Project will be disconnected from the electric grid in coordination with Umatilla Electric Cooperative (UEC) and Bonneville Power Administration (BPA).
5. Within 12 months of disconnection, the following decommissioning activities will take place:
    a. PV modules will be disconnected and removed for salvage or recycling.
    b. All electrical cabling (both above and below ground) shall be removed for salvage or recycling.
    c. Aluminum racking used to support PV modules will be removed for salvage or recycling.
    d. Steel foundation piles will be removed for salvage or recycling. These piles will either be moved in their entirety or will be cut off approximately 3' below grade, deep enough to allow the land to return to agricultural use.
    e. All electric interconnection equipment, including inverters and transformers, shall be removed for salvage or recycling.

f. All concrete foundations shall be removed and properly disposed of.
g. All fencing shall be removed and properly disposed of.
h. All soils disturbed during the decommissioning process will be re-graded to meet existing contours and seeded with a native, dryland seed mix.

Financial Assurance

The capital investment represented by the Project will create significant value from the materials used to construct the Project. The salvage value of the electronics, semiconductor materials, aluminum, steel, and copper from the decommissioned Project, will cover most or all of the decommissioning cost. The Applicant proposes to provide financial assurance for 100% of the estimated costs of the decommissioning efforts at the later of i) ten years after the Project's Commercial Operation Date or ii) at the expiration of the Project's Power Purchase Agreement, which is not yet executed.The financial assurance shall be either in the form of a bond from an individual or entity engaged in the construction business, a surety bond, a corporate guarantee, a letter of credit issued by a financial institution, or a cash deposit. The amount of the financial assurance shall be based on a written estimate from a company with experience with such matters which sets forth such company's estimate of the cost of removing the solar facilities, net of their estimated salvage value.

Attachment O

FIRE CODE VARIANCE LETTER

Passage Solar
February 2024

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Marty Broadbent
Fire Marshal
Boardman Fire Rescue District
300 SW Wilson Lane,
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January 25, 2024

RE: Passage Solar Project – Fire Variance

The Passage Solar project ("Project") is a proposed photovoltaic solar power generation facility in Morrow County on tax lots 1200 in Township 3 North, Range 27 East and 100 in Township 2 North, Range 27 East. The Project developer, Passage Solar OR, LLC, has consulted with the Boardman Fire Rescue District regarding fire prevention, fire management, and access plans for the Project.

Subsection 1204.4 of the 2019 Oregon Fire Code requires a non-combustible base be installed and maintained under and around the installation. This requirement is contrary to the developer's goals of minimally invasive development and would drastically increase the permanently impacted acreage. In consultation with the Oregon Department of Fish and Wildlife (ODFW) and the Morrow County Weed Control Supervisor, the preference is to seed the ground with a native grass seed mix as an alternative. As such, OneEnergy seeks a variance from the 2019 Oregon Fire Code Subsection 1204.4 requirements for the Project.

This variance is acceptable per the 2019 Oregon Fire Code Chapter 1:

> *104.8 Modifications. Whenever there are practical difficulties involved in carrying out the provisions of this code, the fire code official shall have the authority to grant modifications for individual cases, provided the fire code official shall first find that special individual reason makes the strict letter of this code impractical and the modification is in compliance with the intent and purpose of this code and that such modification does not lessen health, life and fire safety requirements. The details of action granting modifications shall be recorded and entered in the files of the department of fire prevention.*

This modification does not lessen health, life and fire safety requirements. The Project will be constructed following all other guidance found in the 2019 Oregon Fire Code, including "Appendix D: Fire Apparatus Access Roads", and the Project will be managed in accordance with Oregon Fire Code requirements 2104.1.

Access to the Project will lead to a security fence, which will frame the complete perimeter of the project, with an access gate that is twenty (20) feet in width. This entry gate will contain accessible hardware (i.e. an installed lockbox or padlock) in compliance with requirements imposed by the fire code official.

Inside the security fence there will be interior roads that will be sized for emergency vehicle access in accordance with the 2019 Oregon Fire Code. The roads will be twenty (20) feet in width, with an inner turning radius of twenty-eight (28) feet and an outer turning radius of forty-

eight (48) feet and built on no greater than ten percent (10%) slopes, except where allowed by the fire code official. A fire break of twenty-six (26) feet will encircle one hundred percent of the facility components to provide a noncombustible defensible space clearance. This area is more expansive than the 10-foot clearance required under 2019 Oregon Fire Code Section 1204.4 and will serve as a fire break, kept clear and brush-free.

As the fire code official for the Boardman Fire Rescue District, I hereby grant a variance waiving the requirements of subsection 1204.4 of the 2019 Oregon Fire Code for the Passage Solar project.

Sincerely,

Marty Broadbent
Fire Marshal
Boardman Fire Rescue District

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PRELIMINARY FINDINGS OF FACT
CONDITIONAL USE REQUEST
CUP-S-365-24

REQUEST: To allow a home occupation in the Exclusive Farm Use Zone.

APPLICANT/OWNER: Jacob Trahan
T5 Firearm Solution LLC.
59471 Highway 74
Lexington, OR 97839

PROPERTY DESCRIPTION: Tax Lot 2005 of Assessor's Map 1S25E

PROPERTY LOCATION: Approximately two-miles west of the Town of Lexington on Highway 74.

I. **BACKGROUND INFORMATION:** The parcel is approximately 20-acres and zoned Exclusive Farm Use (EFU) and outside the Town of Lexington Urban Growth Boundary (UGB). The subject application is a request for a Home Occupation to allow firearms dealing, repairs, and general gunsmithing. The application indicates that these activities will be secondary to the residence and the activities will take place in an existing garage on the property.

II. **COMPLIANCE WITH MORROW COUNTY ZONING ORDINANCE SECTIONS 6.025, 6.030, 6.050, and 6.075.** The requirements for approval are listed below in **bold type**, followed by a response in standard type.

SECTION 6.025. RESOURCE ZONE STANDARDS FOR APPROVAL.

A. In the Exclusive Farm Use zone, a conditional use may be approved only when the County finds that the use will not:

1. Force a significant change in accepted farm or forest practices on surrounding lands devoted to farm or forest use; or

2. Significantly increase the cost of accepted farm or forest practices on surrounding lands devoted to farm or forest use.

Finding:
The Applicant has indicated that the Home Occupation will be secondary to the residence, and will not require any additional structures, or improvements to the existing structures. Planning staff do not find that the approval of this Application would force any significant change or practices on surrounding lands devoted to farm or forest use.

B. In the Forest Use Zone, a conditional use may be approved only when requirements that are designed to make the use compatible with forest operations and agriculture and to conserve values found on forest lands are met. A conditional use may be approved only when the County finds that the use will not:

1. **Force a significant change in, or significantly increase the cost of, accepted farming or forest practices on agriculture or forest lands;**
2. **Significantly increase fire hazard or significantly increase fire suppression costs or significantly increase risks to fire suppression personnel; and**
3. **A written statement recorded with the deed or written contract with the County is obtained from the land owner that recognizes the rights of adjacent and nearby land owners to conduct forest operations consistent with the Forest Practices Act and Rules. (MC OR-1-2013)**

Finding:
Subject property is zoned EFU, these criteria do not apply.

SECTION 6.030 GENERAL CONDITIONS.

In addition to the standards and conditions set forth in a specific zone, this article, and other applicable regulations; in permitting a new conditional use or the alteration of an existing conditional use, the Commission may impose conditions which it finds necessary to avoid a detrimental impact and to otherwise protect the best interests of the surrounding area or the County as a whole. These conditions may include the following:

A. Limiting the manner in which the use is conducted including restricting the time an activity may take place and restraints to minimize such environmental effects as noise, vibration, air pollution, glare and odor.

Finding:
The proposed use shall be operated in a way that will not disturb surrounding agricultural operations or neighboring residences. Any complaints received may result in a review of the activity and potential revocation of the permit.

B. Establishing a special yard or other open space or lot area or dimension.

Finding:
This proposed use will utilize existing lot area. Planning staff would not recommend any additional requirements for open space.

C. Limiting the height, size or location of a building or other structure.

Finding:
Any structures associated with this project are required to have appropriate Zoning and Building permits in compliance with applicable Ordinances and Codes, this is listed as a condition of approval. Staff would not recommend any additional limitations on height, size, or location of the structures.

D. Designating the size, number, location and nature of vehicle access points.

1. **Where access to a county road is needed, a permit from Morrow County Public Works department is required. Where access to a state highway is needed, a permit from ODOT is required.**
2. **Finding:**

The existing access is from Highway 74. ODOT was provided notice of the request and provided an opportunity to comment.

3. **In addition to the other standards and conditions set forth in this section, a TIA will be required for all projects generating more than 400 passenger car equivalent trips per day. A TIA will include: trips generated by the project, trip distribution for the project, identification of intersections for which the project adds 30 or more peak hour passenger car equivalent trips, and level of service assessment, impacts of the project, and mitigation of the impacts. If the corridor is a State Highway, use ODOT standards.**

Finding:
This action will not trigger the need for a Traffic Impact Analysis as it will not generate more than 400 passenger car equivalent trips per day. According to the Applicants Narrative, an additional 1-5 vehicles would be entering and exiting throughout the day, well below the 400-passenger car equivalent threshold for a TIA.

E. Increasing the amount of street dedication, roadway width or improvements within the street right-of-way.

Finding:
No increase in street dedication, roadway width, or improvements in the right-of-way are proposed by the applicant. These preliminary Findings of Fact have been provided to Morrow County Public Works for their review and comment.

1. **It is the responsibility of the land owner to provide appropriate access for emergency vehicles at the time of development.**

Finding:
Preliminary Findings of Fact have been provided to the Ione Rural Fire Protection District for their review and comment.

F. Designating the size, location, screening, drainage, surfacing or other improvement of a parking area or loading area.

Finding:
The subject parcel is located along Highway 74 with a current residential use. The parking area will be contained to the existing area and no conditions would be recommended at this time. This criterion is met.

G. Limiting or otherwise designating the number, size, location, height, and lighting of signs.

Finding:
The Applicants Narrative indicates that one non-illuminated sign is proposed near the entrance. All signs must meet the sign requirements in the Morrow County Zoning Ordinance.

H. Limiting the location and intensity of outdoor lighting and requiring its shielding.

Finding:

Lighting is not proposed in the application. Any outdoor lighting not similar to residential lighting should be limited and shielded from the roadway and neighboring residences.

I. Requiring diking, screening, landscaping or another facility to protect adjacent or nearby property and designating standards for its installation and maintenance.

Finding:
The proposed use would not require diking, screening or landscaping to protect nearby property. Planning staff would not require any of these provisions due to the proposed use.

J. Designating the size, height, location and materials for a fence.

Finding:
Based on the current and proposed uses planning staff would not require any actions under this criterion.

K. Protecting and preserving existing trees, vegetation, water resources, wildlife habitat or other significant natural resources.

Finding:
The proposed occupation will be limited to existing structures and will not create any negative impacts based on the proposed use. Planning staff would not place any additional requirements.

L. Other conditions necessary to permit the development of the County in conformity with the intent and purpose of this Ordinance and the policies of the Comprehensive Plan.

Finding:
No additional requirements are deemed necessary.

SECTION 6.050 STANDARDS GOVERNING CONDITIONAL USES

A conditional use shall comply with the standards of the zone in which it is located and with the standards set forth in this subsection.

G. Home Occupations, when permitted as a conditional use and conducted as an accessory use, shall be subject to the following limitations:

1. The home occupation is to be secondary to the main use of the property as a residence and shall be conducted only by the resident of such dwelling within the same dwelling or in an accessory building on the same or adjacent property.

Finding:
The primary use of the property is residential. The dwelling is the applicants' home and they will be conducting the home occupation within the existing garage. This criterion is met.

2. No structural alterations shall be allowed to accommodate the home occupation except when otherwise required by law, and then only after the plans for such alteration have been reviewed and approved by the Planning Commission. Such

structural alterations shall not detract from the outward appearance of the building as an accessory structure to a residence.

Finding:
No structural alterations are proposed nor will be needed to accommodate the home occupation. This criterion is met.

3. **One non-illuminated sign not to exceed 200 square inches and bearing only the name and occupation of the resident shall be permitted.**

Finding:
One non-illuminated sign is proposed in the Applicants Narrative, no other signs are proposed. As indicated above any signs will need to meet requirements of the Morrow County sign ordinance. This criterion is met.

4. **No materials or mechanical equipment shall be used which will be detrimental to the residential use of the property or adjoining residences because of vibration, noise, dust, smoke, odor, interferences with radio or television reception, or other factors.**

Finding:
No materials or mechanical equipment which is detrimental to adjoining properties is needed for the proposed use. This criterion is met.

5. **No materials or commodities shall be delivered to or from the property which are of such bulk or quantity as to require delivery by a commercial vehicle or a trailer or the parking of customer's vehicles in a manner or frequency as to cause disturbance or inconvenience to nearby residents or so as to necessitate off-street parking.**

Finding:
Deliveries required for the proposed use will be delivered by a standard delivery vehicle. This criterion is met.

6. **Retail sales shall be limited or accessory to a service.**

Finding:
Retail sales will be limited and related to firearm servicing and improvement. No on-site retail shop is proposed. This criterion is met.

7. **No persons shall be employed except members of the immediate family.**

Finding:
The persons conducting the business reside at the residence on the property, only members of the immediate family may be employed for the home occupation. This criterion is met.

8. **The permit allowing a home occupation shall be reviewed every 12 months following the date the permit was issued and may continue the permit if the home occupation continues to comply with the requirements of this section.**

Finding:
This permit shall be reviewed annually with other home occupation permits as long as the proposed use continues.

SECTION 6.075. LENGTH OF PERMITS, PERMIT HOLDER, RENEWAL AND REVOCATION.

A. Length of Permit and Permit Holder: The County may evaluate how long a particular conditional use is expected to remain valid. Some conditional uses may be considered "permanent" as a fully developed use that "runs with the land" and it attaches to and benefits the land and is not limited to a particular landowner. The County may require the owner of the original conditional use permit to record the permitted use on the deed record. The permit is the responsibility of the current owner of the property, whether that is the original applicant or a successor.

A conditional use permit may allow a use that would benefit the permit owner on a sporadic or temporary basis until the purpose for the conditional use permit no longer exists. Upon termination of the use, the land must be in a condition that it may be re- developed in compliance with its current zoning designation. The County may authorize a conditional use permit until a particular date, for a stated period of time, or until the occurrence of a particular event. Additionally, the County may stipulate that a Conditional Use Permit will be reviewed or renewable after a stated time period.

Finding:
This permit allows a use that benefits the permit owner and is valid until the use no longer exists or the ownership of the land changes at which time the new land owner will need to reapply for a conditional use permit as a continued use. The proposed activities are subject to annual review for the home occupation.

B. Reviews and Renewals. If a review or renewal date is included as a condition by which a conditional use permit is granted, initial review would be ministerial and completed by the Planning Director. The holder of the conditional use permit will be required to make application and pay the requisite fee for review. The review would evaluate the permit conditions and adherence to them, determine if any changes had taken place with the uses allowed in the zone, and determine whether any complaints had been logged concerning the property or the conditional use. If any concerns arise further review will take place at a public hearing with notice. If no concerns arise the permit will be renewed.

For conditional use permits without a review or renewal condition, or if complaints are received concerning a conditional use permit, the County may review any valid conditional use permit for compliance with the conditions of the permit. This review would be a ministerial review done by the Planning Director. If it is deemed necessary by the Planning Director to amend or revoke the permit, a public hearing with notice must be held before the Planning Commission. If action is based on a complaint the complainant may be required to pay any permit review or renewal application fees.

Finding:
This home occupation shall be reviewed annually with other home occupations therefore no condition is necessary. However, the applicant shall maintain the home occupation as presented in the application. If complaints are received and it is found that the permit is being performed outside

what has been proposed the applicant will be responsible for paying any applicable review or renewal application fees. This is listed as a condition of approval.

C. Revocation or Vacation. Any conditional use permit may be vacated by the current landowner or by the County after appropriate notice and hearing when:

- **The use has been terminated and there is no expectation by the land owner and the County that the use will continue;**
- **The use is not being conducted in compliance with the stated conditions of the permit, or**
- **The County finds that the use jeopardizes the public health, safety and welfare of Morrow County and the use does not conform to the Morrow County Code Enforcement Ordinance or other adopted ordinances. (MC OR-1-2013)**

Finding:
The County reserves the right to revoke the permit based on this criterion.

III. LEGAL NOTICE PUBLISHED: March 06, 2024
Heppner Gazette-Times

March 05, 2024
East Oregonian

IV. AGENCIES NOTIFIED: Mike Gorman, Morrow County Assessor; Eric Imes and Mike Haugen, Morrow County Public Works; Steve Rhea, Heppner Rural Fire Protection District; Virgil Morgan, Ione Rural Fire Protection District; John Doherty, City of Heppner; Liz Peterson, City of Ione; Veronica Hess, Town of Lexington; Brian Sy

V. PROPERTY OWNERS NOTIFIED: March 01, 2024

VI. HEARING DATE: March 26, 2024
Morrow County Government Center
Irrigon, Oregon

VII. DECISION OF PLANNING COMMISSION: The Planning Director recommends approval of the application subject to the following CONDITIONS OF APPROVAL:

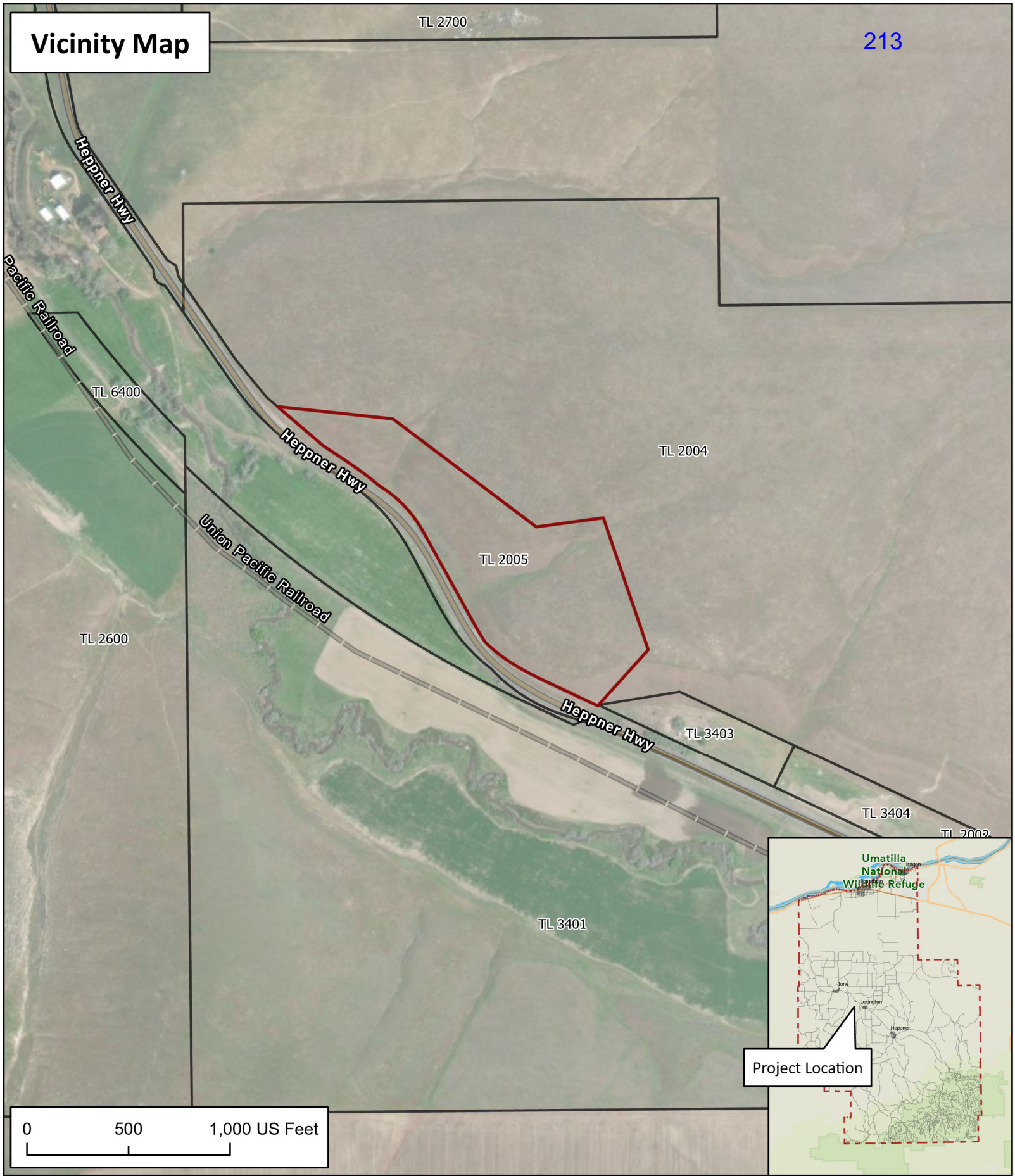
1. The applicant shall maintain the home occupation as presented in the application. If complaints are received and it is found that the permit is being performed outside what has been proposed the applicant will be responsible for paying any applicable review or renewal application fees.

2. This permit is valid until the use no longer exists or the ownership of the land changes at which time the new land owner will need to reapply for a conditional use permit as a continued use.

Stacy Ekstrom, Chair Date

Attachments:
Vicinity Map
Application with Attachments

Vicinity Map



CUP-S-365-24

Jacob Trahan

1S25E TL2005

Morrow County Tax Lot

Morrow County Boundary

Subject Parcel

Coordinate System:
NAD 1983 HARN StatePlane Oregon North FIPS 3601
Projection: Lambert Conformal Conic
Datum: North American 1983 HARN

Cartography By: Stephen Wrecsics
Friday, February 23, 2024
Morrow County Planning Department

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To: Morrow County Board of Commissioners
From: Tamra Mabbott, Planning Director
CC: Planning Commission
BOC Date: March 20, 2024
RE: Monthly Planning Update

Mission Statement

Morrow County Planning Department provides guidance and support to citizens for short term and long-range planning in land use, to sustain and improve the county's lands for future generations. Our goal is to foster development where people can live, work & play.

Land Use Actions

At the February 26th Planning Commission meeting Gordon Howard, Regional Programs Manager and Dawn Hert from Department of Land Conservation and Development (DLCD) provided comprehensive training. Staff and commissioners from other cities joined the training.

Planning Permits	February 2024
Zoning Permits	6
Land Use Compatibility Reviews	5
Land Partitions	3
Property Line Adjustments	1
Land Use Decisions	2
Rural Addresses	2
Plan and Zone Amendment	1
Farm Ag Exempt Permit	1
Other	3

Energy Projects

Several large projects permitted under the state Energy Facility Siting Council (EFSC) have filed for amendments. Planning staff have met with the developer and EFSC staff to review numerous changes. Planning staff also had meetings with developers to discuss existing and proposed new projects. Staff also reviewed final documents for the Pinegate Renewables proposed Agricultural Mitigation Plan.

Summary of energy projects in Morrow County is found here
https://www.co.morrow.or.us/planning/page/renewable-energy-1

Morrow County Heritage Trail Update

Staff will be posting a Request for Proposal for the Heritage Trail Master Plan update.

Interpretive Panel Update

Staff have been working closely with the contractor for the Interpretive Panel Update over the past months to discuss changes and improvements to the following rounds of draft panels. Staff submitted all comments regarding the second round of draft panels. A new set of draft panels should be expected later this month. Confirmation regarding the construction documents of the panel stands were also approved during this time. The second draft updated interpretive panels are available for review upon request to staff. The existing panels can be viewed on the Planning webpage: https://www.co.morrow.or.us/planning/page/heritage-trail-panels

WATER AND PLANNING ACTIVITIES

Water Advisory Committee

The Water Advisory Committee met on March 11 and heard presentations on more water planning projects including the Integrated Water Resources Strategy and the Integrated Water Resource Planning in the Walla Walla River Basin. The Walla Walla plan is a model of interjurisdictional collaboration for water planning. WAC members had a robust discussion about these planning efforts and about possible policy and project recommendations for Morrow County. The next meeting will be May 13, 2024, which will include more presentations to consider as model for Morrow County, as well as continued dialogue about water issues in Morrow County.

The slides presented during the March 11 meeting and a recording is on the county webpage. https://www.co.morrow.or.us/planning/page/water

Meetings are open to the public. The next WAC meeting is scheduled for May 13, 2024, 4-6 pm at the North Morrow County Government Center, Irrigon.

LUBGWMA

Planning Director participates in the Communications Subcommittee and the Best Management Practices subcommittee meetings of the LUBGWMA. The LUBGWMA meeting was postponed due to other projects ongoing in the basin.

Dr. Salini Sadishiran and a graduate student have started a new research project of wells in the LUBGWMA. Planning Director toured the LUBGWMA to show residential areas and is helping to put identify 10-12 well owners willing to allow OSU to test their well. The purpose of this research project is to test for chemicals that would necessarily link drinking water to septic system, for

example caffeine and artificial sweeteners. This would help enhance understanding of the source of nitrate contamination. The study will continue for multiple years. Anyone willing to allow OSU team to test their well for this purpose please contact the Planning Department.

Morrow Umatilla County Drinking Water Investigation

The Environmental Protection Agency grant-funded project is now known as the "Morrow and Umatilla County Drinking Water Investigation." A bi-county meeting of Umatilla and Morrow County Commissioners was held on March 13th for the purpose of approving an Intergovernmental Agreement, appointing a Steering Committee, and hear a presentation from the consultant and accept agency and public comment on the draft Scope of Work. Consultant selected for the project is GSI Water Solutions Inc. lead by Ronan Igloria, Project Manager.

Next steps will include finalizing a Scope of Work with the Steering Committee and requesting Board approval of a contract with GSI Water Solutions, Inc.

The research project will conclude in August 2025. Final report will include a variety of recommendations to provide drinking water to rural households. Persons interested in the research project are encouraged to contact Tamra Mabbott at tmabbott@co.morrow.or.us Multiple public engagement and outreach opportunities will take place in the next 2.5 years.

Congressionally Directed Spending (CDS) was announced on Friday, March 8th and Morrow County's request for $1.2 million was included. This funding will take the above-water investigation work to the next level, including design and engineering work. There will be some overlap with the two projects.

Water Infrastructure Funding

As time and resources allow, staff are gathering resources and assembling a list of various funding sources for water projects. This funding could be accessed by private and public entities and may be a resource to implement some of the recommendations expected in the "Morrow and Umatilla Drinking Water Investigation." Several state and federal agencies have programs. An example of a funding program is the Oregon Water Resources Department (OWRD) Well Abandonment and Replacement Program which is available to individual well owners.

Water Data and Mapping
As part of the bi-county Water Investigation, planners are working to secure data from Oregon from Oregon Health Authority (OHA) which will serve as the starting point for data analysis.

CODE COMPLIANCE
Following the large landowner meeting on February 27th, staff have constructed an agreement form for landowners in violation to sign regarding their commercial trucking businesses. Staff recognizes the hardship of relocating a use that was left unmonitored for decades. Multiple landowners have already met with staff to sign the said agreement. Staff have been working diligently to cover the workload while the county looks to fill the Compliance Planner position. It is currently being advertised.

Natural Hazard Mitigation Plan (NHMP) Update
NHMP Update is still in progress. Anyone interested in the NHMP Update please contact Stephen Wrecsics swrecsics@co.morrow.or.us The plan update is scheduled to be complete the first half of 2024.

Oregon Legislature
Staff is tracking land use and water related bills with relevance to Morrow County.

Planning Director participated in a presentation to a class of undergradaute and graduate students in Public Policy at Eastern Oregon University. Students seem eager to learn more about land use planning in Oregon and in Morrow county.

Planners attended a Lexington Town Council, along with two planners from Department of Land Conservation & Development, to share ideas about planning and other incentives to encourage housing. Lexington is working hard to set aside funding for their city-wide water project but has some capacity to add a small inventory of new homes.