

Echanis Wind Energy Project – Erosion Control Plan

The following Erosion Control Plan (ECP) relates to the portions of the North Steens 230kV Transmission Line Project located on federally-owned lands administered by the US Bureau of Land Management (BLM) Burns District Office.

PROPERTY DESCRIPTION:

Transmission Line and Access Coincident with Transmission Line Right-of-Way

Willamette Meridian

T. 26 S., R. 33 E.,

sec. 12, NE $\frac{1}{4}$ SE $\frac{1}{4}$.

T. 26 S., R. 34 E.,

sec. 18, lot 4.

T. 27 S., R. 34 E.,

sec. 7, lot 4, E $\frac{1}{2}$ SW $\frac{1}{4}$,

sec. 18, SW $\frac{1}{4}$ NE $\frac{1}{4}$, E $\frac{1}{2}$ NW $\frac{1}{4}$, NE $\frac{1}{4}$ SW $\frac{1}{4}$,

sec. 19, E $\frac{1}{2}$ SW $\frac{1}{4}$, SW $\frac{1}{4}$ NE $\frac{1}{4}$,

sec. 30, E $\frac{1}{2}$ SW $\frac{1}{4}$,

sec. 31, lots 2-4 inclusive, E $\frac{1}{2}$ W $\frac{1}{2}$.

T. 28 S., R. 33 E.,

sec. 12, E $\frac{1}{2}$ SE $\frac{1}{4}$;

sec. 13, NW $\frac{1}{4}$ NE $\frac{1}{4}$, E $\frac{1}{2}$ SW $\frac{1}{4}$, SW $\frac{1}{4}$ SW $\frac{1}{4}$, NW $\frac{1}{4}$ SE $\frac{1}{4}$;

sec. 23, SE $\frac{1}{4}$ NE $\frac{1}{4}$, NE $\frac{1}{4}$ SE $\frac{1}{4}$;

sec. 24, W $\frac{1}{2}$ NW $\frac{1}{4}$;

sec. 26, NW $\frac{1}{4}$ NE $\frac{1}{4}$.

T. 28 S., R. 34 E.,

sec. 6, lots 4-7 inclusive.

T. 29 S., R. 33 E.,

sec. 2, NW $\frac{1}{4}$ SE $\frac{1}{4}$;

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sec. 23, W $\frac{1}{2}$ SE $\frac{1}{4}$;
sec. 26, W $\frac{1}{2}$ E $\frac{1}{2}$, E $\frac{1}{2}$ W $\frac{1}{2}$;
sec. 35, W $\frac{1}{2}$ E $\frac{1}{2}$, SE $\frac{1}{4}$ SW $\frac{1}{4}$.

T. 30 S., R. 33 E.,
sec. 2, Lot 3, SE $\frac{1}{4}$ NW $\frac{1}{4}$, N $\frac{1}{2}$ SW $\frac{1}{4}$, SW $\frac{1}{4}$ SW $\frac{1}{4}$;
sec. 10, E $\frac{1}{2}$ NE $\frac{1}{4}$, NE $\frac{1}{4}$ SE $\frac{1}{4}$;
sec. 11, W $\frac{1}{2}$ NW $\frac{1}{4}$;
sec. 15, SW $\frac{1}{4}$ NE $\frac{1}{4}$, NW $\frac{1}{4}$ SE $\frac{1}{4}$, S $\frac{1}{2}$ SE $\frac{1}{4}$;
sec. 22, NE $\frac{1}{4}$ NE $\frac{1}{4}$;
sec. 23, NW $\frac{1}{4}$ SW $\frac{1}{4}$, SW $\frac{1}{4}$ NW $\frac{1}{4}$.

Access Not Coincident with the Transmission Line Right-of-Way

Willamette Meridian

T. 29 S., R. 33 E.,
sec. 35, S $\frac{1}{2}$ NE $\frac{1}{4}$.

T. 30 S., R. 33 E.,
sec. 9, NW $\frac{1}{4}$ NW $\frac{1}{4}$, E $\frac{1}{2}$ SW $\frac{1}{4}$ SE $\frac{1}{4}$;
sec. 15, W $\frac{1}{2}$ SW $\frac{1}{4}$, SE $\frac{1}{4}$ SW $\frac{1}{4}$;
sec. 16, N $\frac{1}{2}$ NE $\frac{1}{4}$, SE $\frac{1}{4}$ NE $\frac{1}{4}$;
sec. 23, W $\frac{1}{2}$ NW $\frac{1}{4}$, NW $\frac{1}{4}$ SW $\frac{1}{4}$.

RATIONALE STATEMENT:

A comprehensive list of available best management practices (BMP) options based on Oregon DEQ's guidance manual has been reviewed to complete this erosion and sediment control plan. Some of the BMP's from the above listed manual were not chosen because they were determined to not effectively manage erosion prevention and sediment control for this project based on specific site conditions, including soil conditions, topographic constraints, accessibility to the site, and other related conditions. As the project progresses if there is a need to revise the plan, an action plan outlining the necessary changes will be submitted to a BLM engineer and may be approved or sent back for revisions by the BLM Authorized Officer.

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All activities conducted in construction of the row, including these erosion control measures, will be completed in accordance with the PDF's and BMP's listed in appendix a.3.1 of the final EIS for the North Steens Transmission Line

OWNER

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PLANNING/ENGINEER/SURVEYING FIRM

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NARRATIVE DESCRIPTION:

Existing Site Conditions

- * Partially Treed (Juniper) Pasture Areas

Developed Conditions

- * Access Road or Overground Access (OGA) For Transmission Line Installation

Nature Of Construction Activity

- * Clearing as needed of juniper
- * Minor grading if needed to permit vehicle access
- * Utility installation
- * Final stabilization

Total Site Area on Federal Lands = 150-Foot Wide Row X ~12 Miles

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Site Soil Classification

- Aconcamp-Rock Outcrop-Hackwood Complex,
30 To 80 Percent Slopes
- Gilispie-Noname Complex, 3 To 15 Percent Slopes.
- Ninemile Gravelly Loam, Hummocky,
0 To 8 Percent Slopes.
- Pernty-Rock Outcrop Complex,
30 To 70 Percent Slopes.
- Westbutte-Lambring-Rock Outcrop Complex,
35 To 65 Percent Slopes.

On-site soils have a slight to moderate erosion potential. All fill material shall be generated on-site from utility pole spoils.

Receiving Water Bodies

Riddle Creek and Malheur Lake

PERMITTEE'S SITE INSPECTOR:

Company: Otley Logging & Construction Company
Phone: (541) 573-7593
Contact: Robert Otley

Description of Experience:
20 years of erosion control construction and inspection.

INSPECTION FREQUENCY:

SITE CONDITION	MINIMUM FREQUENCY
1. Active period	Daily when storm water runoff, including runoff from snowmelt is occurring.
2. Prior to the site Becoming inactive or in Anticipation of site Inaccessibility	Once to ensure that erosion and sediment control measures are in working order. Any necessary maintenance and repair must be made prior to leaving the site.
3. Inactive periods greater Than seven (7) consecutive Calendar days.	Once every two (2) weeks

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4. Periods during which the site is inaccessible due to inclement weather. If practical inspections must occur daily at a relevant and accessible discharge point or downstream location.

When construction is complete, once the site has been restored and/or revegetated, in accordance with the restoration and re-vegetation plan, erosion inspections will no longer be necessary

- *Hold a pre-con meeting of project construction personnel that includes the ECP inspector.
- *All inspections must be made in accordance with DEQ regulations.
- *Inspection logs must be kept in accordance with DEQ's regulations.

This ECP and general conditions have been developed to facilitate compliance with DEQ requirements.

STANDARD EROSION CONTROL PLAN NOTES:

1. Hold a pre-construction meeting of project construction personnel that includes the inspector to discuss erosion and sediment control measures and construction limits.
2. The ECP must be kept onsite and all erosion and sediment control measures discussed in the plan must be installed in such a manner to ensure that sediment or sediment laden water that enters or is likely to enter surface waters or conveyance systems leading to surface water, roadway, or other properties does not occur.
3. The implementation of the ECP and construction, maintenance, replacement, and upgrading of the erosion and sediment control measures is the responsibility of the permit registrant until all construction is completed and approved by the BLM and vegetation/landscaping is established. The ROW holder shall be responsible for maintenance after the project is completed.
4. The ROW holder must be responsible for proper installation and maintenance of all erosion and sediment control measures, in accordance with local, state, or federal regulations.
5. Necessary erosion and sediment control measures including perimeter sediment control must be in place before vegetation is disturbed and must remain in place and be maintained, repaired, and promptly implemented following procedures established for the duration of construction.
6. Wet weather BMPs: construction activities must avoid or minimize excavation and creation of bare ground on slopes greater than five (5) percent from October 1 through May 31 each year.
7. Wet weather BMPs: temporary stabilization of the site must be installed at the end of the shift before a holiday or weekend or at the end of each workday if significant rainfall is forecast in the next 24 hours and each weekend and holiday.
8. Identify, mark, and protect (by fencing off or other means) critical riparian areas and vegetation including important trees and associated rooting zones and vegetation areas to be preserved.

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9. Provide permanent erosion prevention measures on all exposed areas to prevent from becoming a source of erosion and remove all temporary control measures, unless local ordinances require otherwise, as areas are stabilized.
10. All temporary sediment controls must remain in place until permanent vegetation or other permanent covering of exposed soil is established. Identify the type of vegetative seed mix used acceptable to BLM.
11. Temporary stabilization or covering of soil stockpiles and protection of stockpile located away from construction.
12. The ECP measures in this plan are minimum requirements for anticipated site conditions. During the construction period, these measures must be upgraded as needed to comply with all applicable local, state, and federal erosion and sediment control regulations.
13. Significant amounts of sediment, which leaves the site, must be cleaned up within 24 hours and placed back on the site and stabilized or properly disposed. The cause of the sediment release must be found and prevented from causing a recurrence of the discharge within the same 24 hours. Any in-stream clean-up of sediment shall be performed according to the Oregon Division of State Lands required time frame.
14. Sediment must be removed from behind bio bags and other barriers when it has reached a height of two (2) inches and before BMP removal.
15. Should all construction activities cease for thirty days or more, the entire site must be temporarily stabilized using vegetation or a heavy mulch layer, temporary seeding, or other method acceptable to BLM.
16. Daily inspections when significant rainfall and runoff occurs of the BMPs and discharge outfalls must be conducted by the project ECP inspector. These inspections and observations must be recorded in a log that is available on site.
17. BMPs must be inspected before, during, and after significant storm events.
18. All ECP controls and practices must be inspected visually once to ensure that BMPs are in working order prior to the site becoming inactive or in anticipation of site inaccessibility and must be inspected visually once every two (2) weeks during inactive periods greater than seven (7) consecutive calendar days.
19. If practical, inspections must occur daily at a relevant and accessible discharge point or downstream location during periods which the site is inaccessible due to inclement weather.

LOCAL AGENCY SPECIFIC EROSION CONTROL NOTES:

1. Owner or designated person shall be responsible for proper installation and maintenance of all erosion and sediment control measures, in accordance with local, state, and federal regulations.

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2. Prior to any land disturbing activities, the boundaries of the clearing limits, vegetated buffers, and any sensitive areas shall be clearly delineated in the field. During the construction period, no disturbance is permitted beyond the clearing limits. The Owner/Permittee must maintain the delineation for the duration of the project. Note: vegetated corridors to be delineated with orange construction fence or approved equal.
3. The ECP must be kept on site. All measures shown on the plan must be installed properly to ensure that sediment or sediment laden water does not enter a surface water system, roadway, or other properties.
4. In areas subject to wind erosion, appropriate bmp's must be used which may include the application of fine water spraying, plastic sheeting, mulching, or other approved measures.
5. All exposed soils must be covered during the wet weather period.