AIRPORT INDUSTRIAL SITE
WETLAND DELINEATION REPORT

Linn County Tax Lots
12S02W16 2802 & 2804

Prepared for
City of Lebanon

Site Description
56.34 acres farmed for annual rye grass seed and hay

Site Centroid
Latitude 44.529142° N
Longitude –122.933778° W

Prepared by
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Appendix

A) Landscape Setting and Land Use

A.1 Site Description

The site is located on the north side of Airport Drive on the west side of the Lebanon urban growth boundary. The study area is the entire 56.34 acres that lie within Linn County tax lot 12S02W16 2802 & 2804 (see table below). Agricultural fields lie to the north, west and south with the Lebanon airport forming the east boundary and Airport Drive the southern boundary.

The site is cultivated for annual rye grass seed and has been used for agriculture for more than fifty years. Topographically, the site is flat sloping gently to the northwest with the highest elevation of 33 feet in the southeast corner and the lowest elevation of 331 feet in the northwest corner.

Site description	Lot size (acres)	Ownership	Address
12S02W16 2802	25.67	Kristine Holtzinger	Farm use – address not assigned
12S02W16 2804	30.67	Dale & Kathy Parker	36585 Airport Drive, Lebanon

Table 1: Tax Lot Information

Little Oak Creek, an intermittent 1st order tributary flows diagonally northwesterly across the southwest corner of the site. The only area not used for agriculture on the parcels is a small 1-acre area surrounding a single-family residence in the south end of tax lot 2804.

A.2 Vegetation

Vegetation consists of the annual rye grass over most of the site. Hedge rows along boundaries and on interior fences contain patches of blackberry thickets. Most of tax lot 2804 is not cultivated for annual rye grass and it is mowed and harvested for hay. Vegetation includes a mix of pasture grasses and weeds with dominant vegetation mostly *Agrostis capillaris*, *Anthoxanthum odoratum, Schedonorus arundinaceus* and *Hypochaeris radicata*. Vegetation associated with the intermittent tributary includes *Phalaris arundinacea* and *Mentha pulegium*.

A.3 Soil

Two soil types are mapped on the site by the Linn County Soil Survey:

- Clackamas variant silt loam gravelly silt loam (24): not hydric with hydric inclusions
- Dayton silt loam (33): hydric

Field visits occurred in August and all soil pits were dug at least 20 inches with a backhoe due to the hard ground. All colors recorded for soil plots refer to moist soil. Soil texture was mostly silty clay loam with lessor amounts of gravelly silt clay loams. Soil chroma was typically 10YR, hues were dominantly 3 with values of 2. Soil in upland areas and in the broad transitional zone between upland and wetland were typically 10YR 3/2 silty clay loams within 20" of the surface. In shallow depressions where saturation persisted for extended periods, hydric soil indicator F6 was most common.

A.4 Hydrology

Hydrology is provided exclusively by precipitation. Low soil permeability and flat topography retains water and the flat terraces stay saturated, occasionally ponded for extended periods in the springtime.

The site slopes very gently to the northwest but evidence of surface flow was not evident. The intermittent channel in the southwest corner is known as Little Oak Creek, a 1st order tributary to Oak Creek which flows into the Willamette River near Albany. Little Oak Creek is not known to contain fish due to a series of fish barrier culverts between the site and the Willamette River located about ten miles west.

B) Site Alterations

Site alterations were observed.

C) Precipitation Data and Analysis

The following table summarizes precipitation on the day of field visits, precipitation two weeks prior to the field investigation, the percent of normal rainfall for the water year to date, and the monthly percent of normal precipitation for each of the three months preceding the field investigation. All precipitation data is from the Corvallis Hyslop weather station (also referenced as "Corvallis State Univ."). Elevations on the site range from 338 to 331 feet above mean sea level and the Hyslop weather station elevation is 230 feet. The subject property lies about 14.5 miles southeast of the Hyslop Farm where the US Weather Service Station is located.

Rainfall in the months preceding the August site was normal or above normal since the start of the water year and similar for the calendar year. The site visit was conducted during the dry season and as a result primary wetland hydrology indicators were not observed.

Date of Site Visit	PPT during site visit	PPT two weeks preceding	Recorded PPT since October (thru preceding month)	WETS Avg PPT for water year thru preceding month	% of Normal PPT for water year based on WETS Avg.	Monthly % of normal ppt for each of 3 months preceding site visit based on WETS avg.		
						Preceding month	2nd preceding month	3rd preceding month
8/14/17	0.04	0.15	58.43	41.46	141	0	106	75
8/17/17	0	0.19	58.43	41.46	141	0	106	75

Table 2: Precipitation preceding site visits

Month	Rainfall recorded for Water Year	WETS* average rainfall	Rainfall relative to WETS* average	30% Chance rainfall will be		30% WETS range comparison to recorded rainfall
				Less than	More than	
October	12.15	3.02	402%	1.70	3.68	Above
November	7.78	6.94	112%	4.55	8.34	Within
December	5.16	7.43	69%	5.03	8.88	Within
January	5.33	6.46	83%	3.95	7.82	Within
February	12.48	5.71	219%	3.91	6.80	Above
March	8.11	4.59	177%	3.46	5.35	Above
April	4.14	2.98	139%	2.09	3.53	Above
May	1.73	2.30	75%	1.52	2.81	Within
June	1.55	1.46	106%	0.93	1.76	Within
July	0	0.57	0	0.17	0.68	below
TOTAL	**58.43**	**41.46**	**141%**	**27.31**	**49.65**	**Above**

*WETS Data from Corvallis State University WETS Station 1971-2000

Table 3: Precipitation Summary based on Corvallis Hyslop Weather Station data

D) Methods

For the office work that occurred prior to the site visit, we acquired a collection of recent orthophotos and wet season historical air photos. The information was used to prioritize areas for review during field visits. In addition, the site was reviewed using the Google Earth and Microsoft Bing websites. The areas to investigate were plotted as vector shapefiles to be used with the mobile GIS/GPS field equipment.

Normal circumstances exist on the site; however, the site visits occurred in the normally dry season of the year. As a result, hydrology was based on secondary indicators when present. Other information such as position in the landscape and hydric soil indicators was also used to aid in formulating a best professional judgement decision. In addition, procedures for difficult wetland situations from the Corps regional supplemental manual were followed when necessary because primary hydrology was not present. The following procedure from Chapter 5 of the Corps supplement regional manual was considered when necessary because the site visit occurred in the dry season of the year.

SITE VISIT DURING DRY SEASON
Chapter 5 – Difficult Wetland Situations
Problem area as a result of lack of wetland hydrology due to normal seasonal rainfall variability
Wetlands that periodically lack indicators of wetland hydrology
Step 1: Verify indicators of hydrophytic vegetation and hydric soil are present or absent.
FIELD OBSERVATION FOR WETLAND PLOT: Hydrophytic vegetation and hydric soil are present.
Step 2: Verify area is in landscape position likely to collect or concentrate water.

FIELD OBSERVATION FOR WETLAND PLOT: Area is depression with a concave surface

Step 3: Site visits during the dry season

CONCLUSION: If the site visit occurred during the dry season on a site that contains hydric soils and hydrophytic vegetation and no significant hydrologic manipulation (e.g., no dams, levees, water diversions, land grading, etc., and the site is not within the zone of influence of any drainage ditches or subsurface drains), then consider the site to be a wetland.

Site visits occurred on August 14 and August 17, 2017. A backhoe was used to dig all the soil pits. The site has been farmed for more than 75 years so vegetation was considered less of a factor for determining wetland status. Fieldwork was guided by multiple information sources including recently flown, high-resolution orthophotography and LIDAR topographic data. Soil colors were recorded for moist soil. Digital georeferenced photographs were taken to document site conditions (Appendix C). More than 60 soil pits were dug and thirty-five (35) data plots are included to document the upland/wetland boundaries. Sample plots were completed for paired plots, depressions, suspect areas where micro-topography indicated the potential presence of wetland, and areas of possible saturation seen on early growing season aerials. The OHWM for the intermittent channel was located by identifying the top of the bank on each side of the channel.

The upland/wetland boundary and sample plot locations were mapped using a sub-meter resource grade GPS and a mobile GIS/GPS system that included a hand-held computer running ArcPad 10.0, linked by Bluetooth to the GPS receiver. All GPS mapping and field data were saved as ArcPad shape files, post-processed to ensure sub-meter accuracy, then downloaded to ArcGIS version 10.0 and MapInfo Professional version 12.5 GIS programs. All GPS data was post-processed using the Corvallis CORS station to sub-meter accuracy.

Field information including wetland/upland boundaries and accompanying figures meet the required DSL map precision standard of one meter precision for transferring boundaries of features on the ground to the maps included in this report. The GPS post-processing error estimate for the mapping precision is one meter.

E) Description of All Wetlands and Other Non-Wetland Waters

Two wetland areas were identified with a total of 43.42 acres of wetland. A 620-foot long section of Little Oak Creek flows through across the southwest corner of tax lot 2802. The study area is a mostly flat agriculture field with a single-family residence and two outbuildings present in the southeast corner of tax lot 2804. At the time of the site visit, the entire site had been mowed. Tax lot 2802 had been cultivated with annual rye grass and most of tax lot 2804 had not been cultivated but contained a mix of pasture grasses and weedy species. Fence rows around the property boundary and in the interior contained patches of blackberry thickets. The southeast corner is the highest elevation at 348 feet with the lowest elevation of 341 feet in the northwest corner, seven feet of gradient over more than 1,800 feet. Flat topography and poorly drained soils contribute to most of the site meeting wetland criteria. The study area covers approximately 56 acres with about 12 acres upland and the remainder wetland.

Wetland A is a 39.80-acre area on the north end of the study area. Four small isolated upland areas are present near the northern property boundary. The area around the residence, a narrow strip bordering the north side of the creek and a small area on the south side of the creek are the only other upland areas.

Wetland B is a 3.62-acre area that straddles a 620-foot long stretch of Little Oak Creek, a first order tributary to Oak Creek. The creek width to the top of bank varies from 4 feet to 20 feet. The intermittent creek is included in the wetland acreage because vegetation is present in the channel below the OHWM. The wetland is a seasonally saturated depressional feature with ponding persisting in small, deeper depressions.

Wetland extends off the site on the west, north and east side of Wetland A and wetland extends off the site on the west side of Wetland B. The intermittent creek enters the site at the south end from a culvert under Airport Drive.

Wetland Size	Wetland Category	Other Waters	Description
Wetland A: 39.80 acres	PEM		Farmed Wetland
Wetland B: 3.62 acres	PEM	620' section of Little Oak Ck.	
TOTAL: 43.42 acres wetland		**0.20 acres Waters (included in wetland acres)**	

Table 4: Summary of Wetland Areas

F) Deviation from LWI or NWI

The NWI does not identify wetland on the subject property but does identify Little Oak Creek as a R4SBC waterway. The current study identified Little Oak Creek as a vegetated intermittent channel in Wetland B.

G) Mapping Method

Mapping of the wetland boundary, sample plot locations and top of bank along Airport Industrial Creek was completed using a mobile GIS/GPS system that included a hand-held computer running ArcPad, linked by Bluetooth to a Geneq SXBlue II GNSS GPS receiver. All GPS mapping and field data was saved as ArcPad shapefiles, which were downloaded to ArcGIS and MapInfo Professional GIS programs. Field data was post-processed using the Corvallis CORS base station data and Effigis OnPoz EZSurv software to verify sub-meter horizontal accuracy.

Field information, including wetland/upland boundaries and sample plot locations on accompanying figures, meets the required DSL map precision standard of one-meter precision for transferring boundaries of features on the ground to the maps included in this report. The GPS post-processed horizontal mapping precision is sub-meter. Boundaries for the area investigated (shown on the delineation map) are based on GPS readings from visible property corners, and the Linn County GIS tax lot parcel database.

H) Additional Information

The study area is a farmed site so four early growing season aerials were reviewed. The high resolution 1998, 2005, and 2012 orthophotography (Figure 5A, 5C and 5D, 6 inch to 1 foot resolution) was provided by City of Lebanon GIS department. Linn County GIS Department provided the 2000 orthophoto (Figure 5B, 1 foot resolution). Aerial photography was useful to identify shading patterns that correlated with wetter areas. Shading indicative of wet areas was similar across the years, however, subtle differences exist between wet season aerials and the geometry and area of shaded patterns does not consistently correlate. Variability may be due to preceding rainfall, type of crop cover, height of vegetation, grass predation, plow patterns and location of seasonal drainage ditches.

The Willamette Valley Phase 1 LIDAR dataset was acquired from the Oregon Lidar Consortium and translated using ESRI ArcGIS and Spatial Analyst to produce a gridded dataset. The gridded data was used to generate 1-foot contour elevation lines (Figure 6A) and a bare earth 3-dimensional shaded relief raster image (Figure 5E).

A previous wetland delineation completed by SWCA in 2006 (WD06-0234) identified 46.45 acres. Information from that report was used in the course of completing the current delineation. In 2012, Pacific Habitat Services completed a delineation "lite" evaluation (WD2013-0397) of the site for the Oregon Cascades West Council of Governments and identified 43.03 acres of wetland on the site. The wetland areas in the 2012 delineation are similar to those identified in the current study.

I) Results and Conclusions

The current delineation examined approximately 56.34 acres of a farmed site referenced as Linn County tax lots 12S02W16 2802 and 2804. The site lies outside the City of Lebanon city limits on the west side of the urban growth boundary. A single-family residence is present on tax lot 2804 with an address of 36585 Airport Drive. The site has been farmed for over 70 years.

Two wetland areas were identified with a total of 43.42 acres of wetland delineated. The wetlands are broad, flat depressions located in the alluvial flood plain of the Willamette Valley. A 1st order tributary, Little Oak Creek flows across the southwest corner of tax lot 2802.

J) Disclaimer

This report documents the investigation, best professional judgment and conclusions of the investigator. It is correct and complete to the best of my knowledge. It should be considered a Preliminary Jurisdictional Determination of wetlands and other waters and used at your own risk unless it has been reviewed and approved in writing by the Oregon Department of State Lands in accordance with OAR 141-090-0005 through 141-090-0055.

Allen Martin, RG

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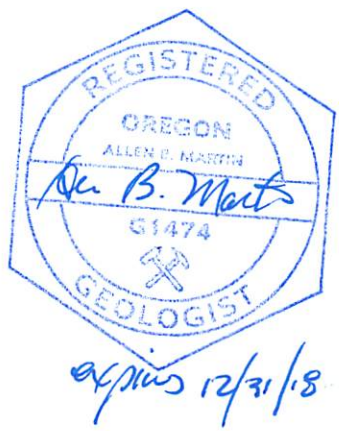
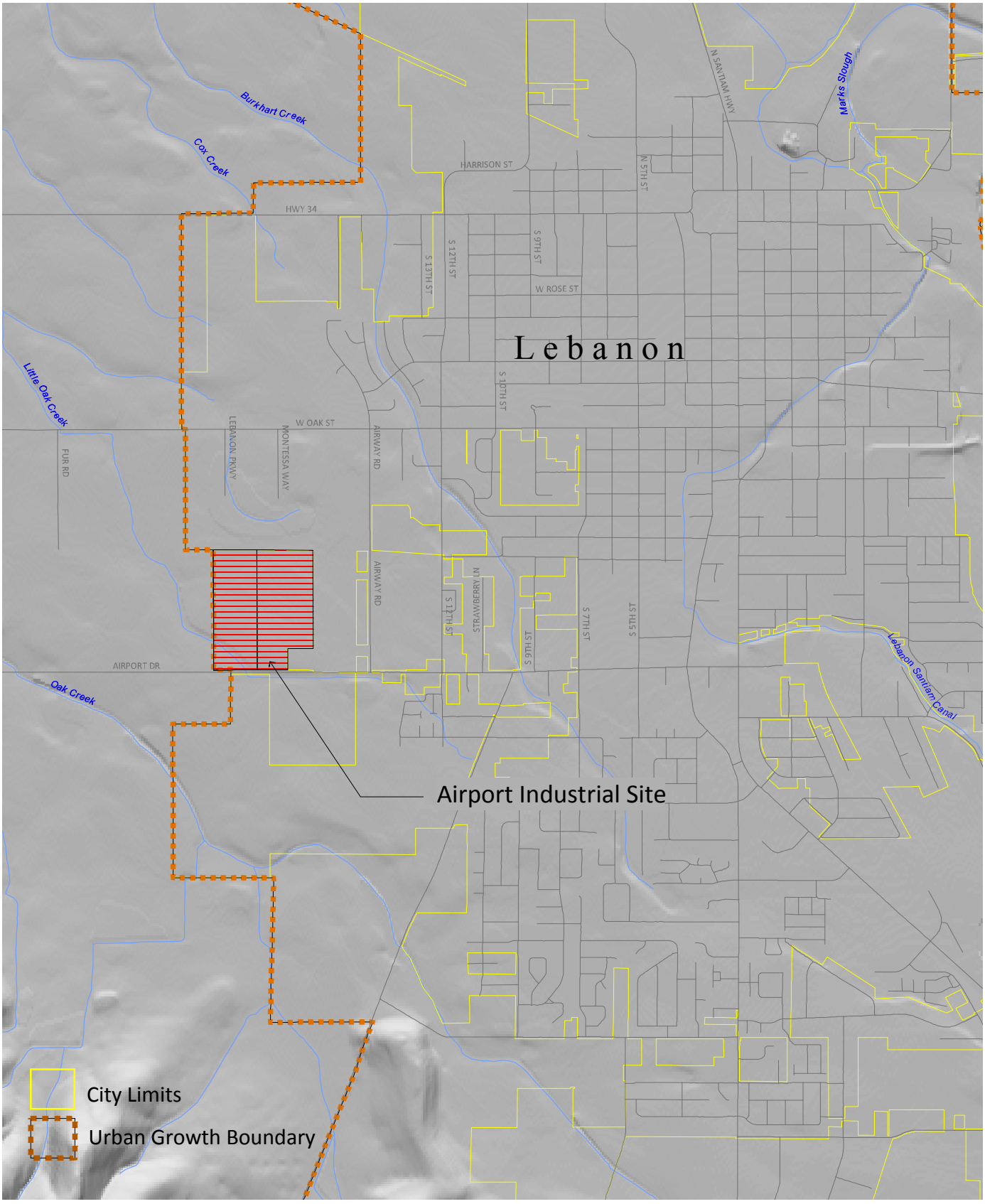




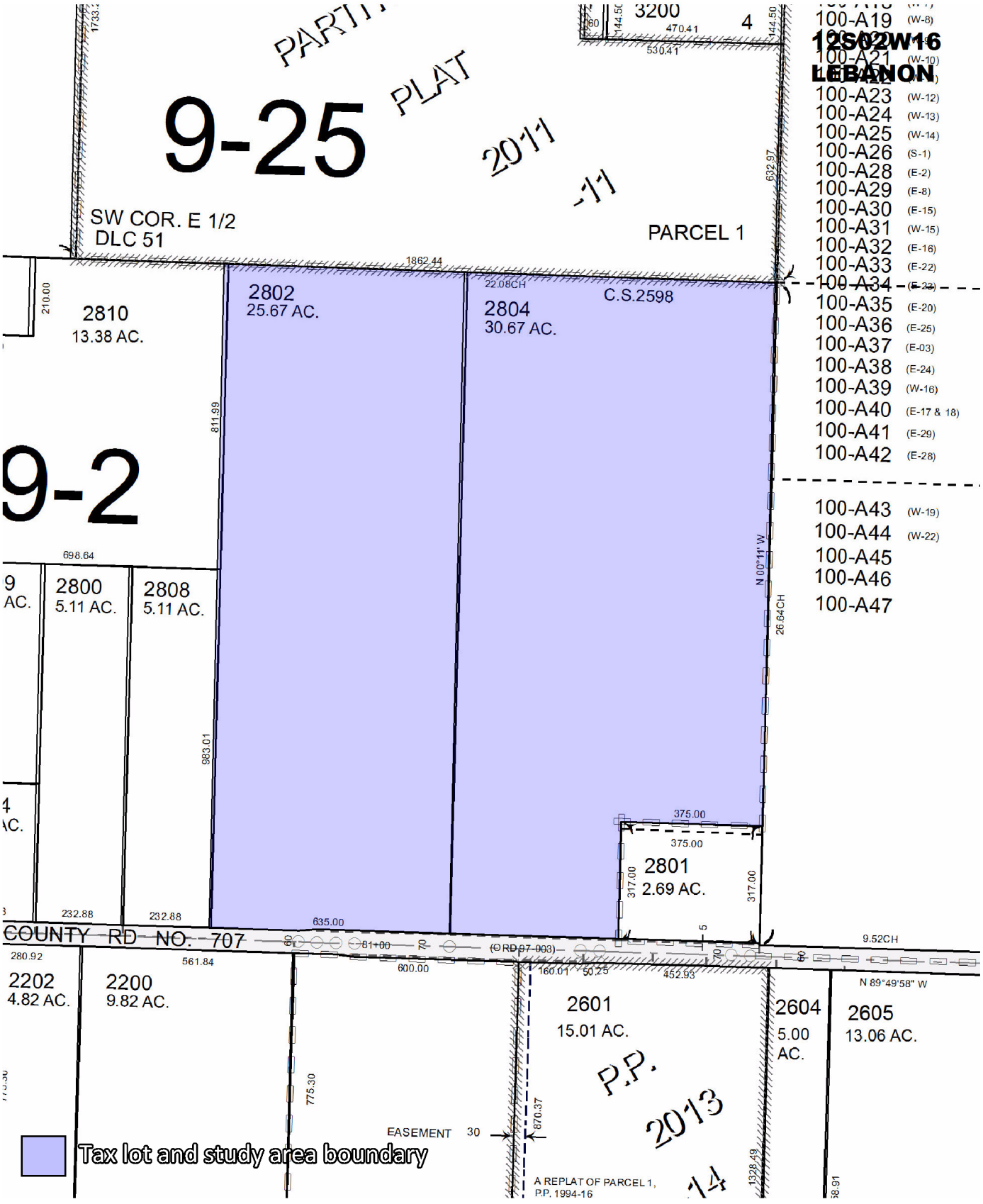
Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

1600 0 1600 3200
Feet
Scale: 1:24,000

Geo Resources LLC

FIGURE 1: LOCATION MAP
Scale: 1" = 2,000'
Source: MapInfo StreetPro, USGS 10 meter DEM
Drafted: 11/16/17

NORTH



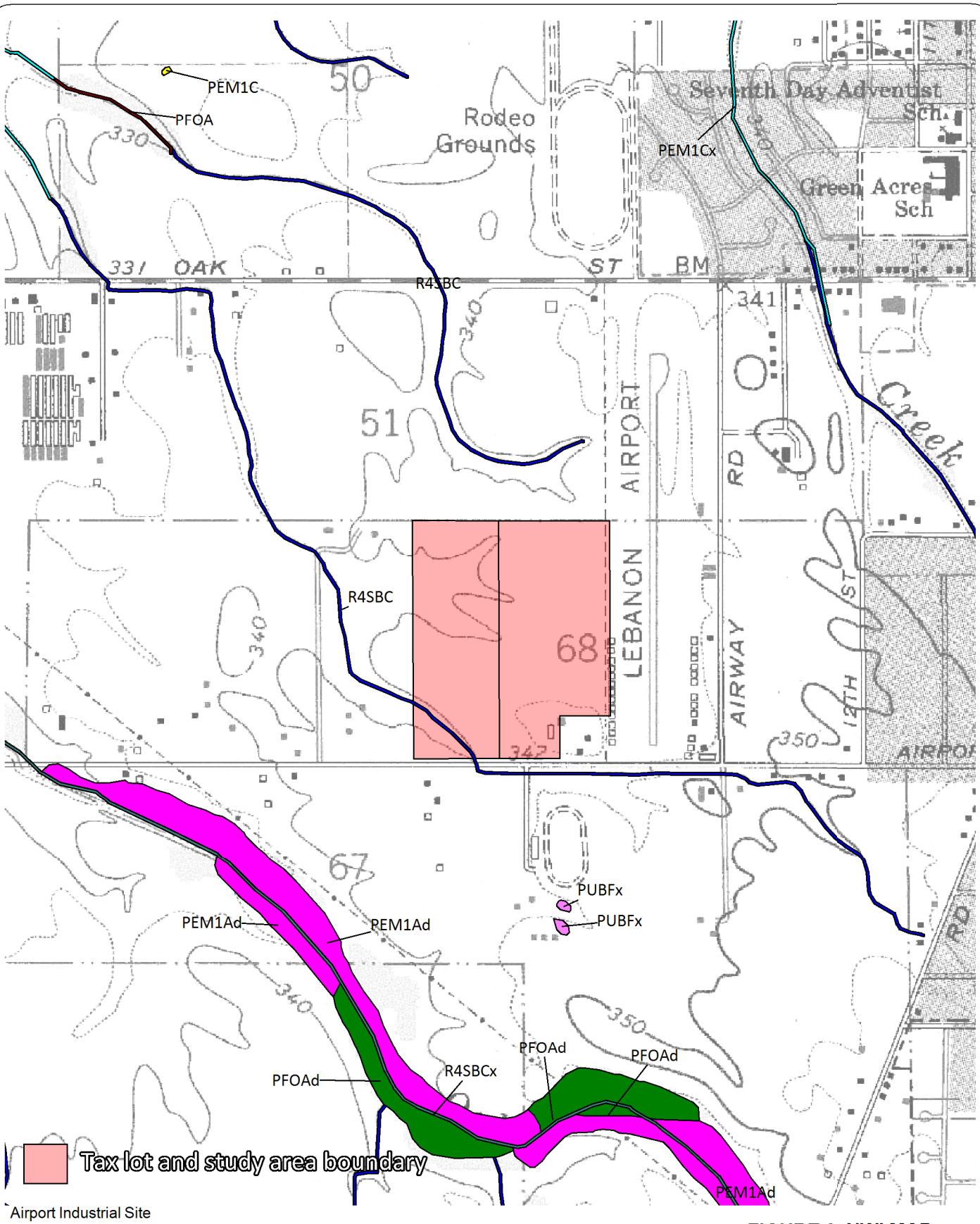
Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

360 0 360 720
Feet
Scale: 1:4,400

Geo Resources LLC

FIGURE 2: TAX LOT MAP
Scale: 1" = 360'
Source: Linn County Tax Assessor
Drafted: 11/16/17

NORTH



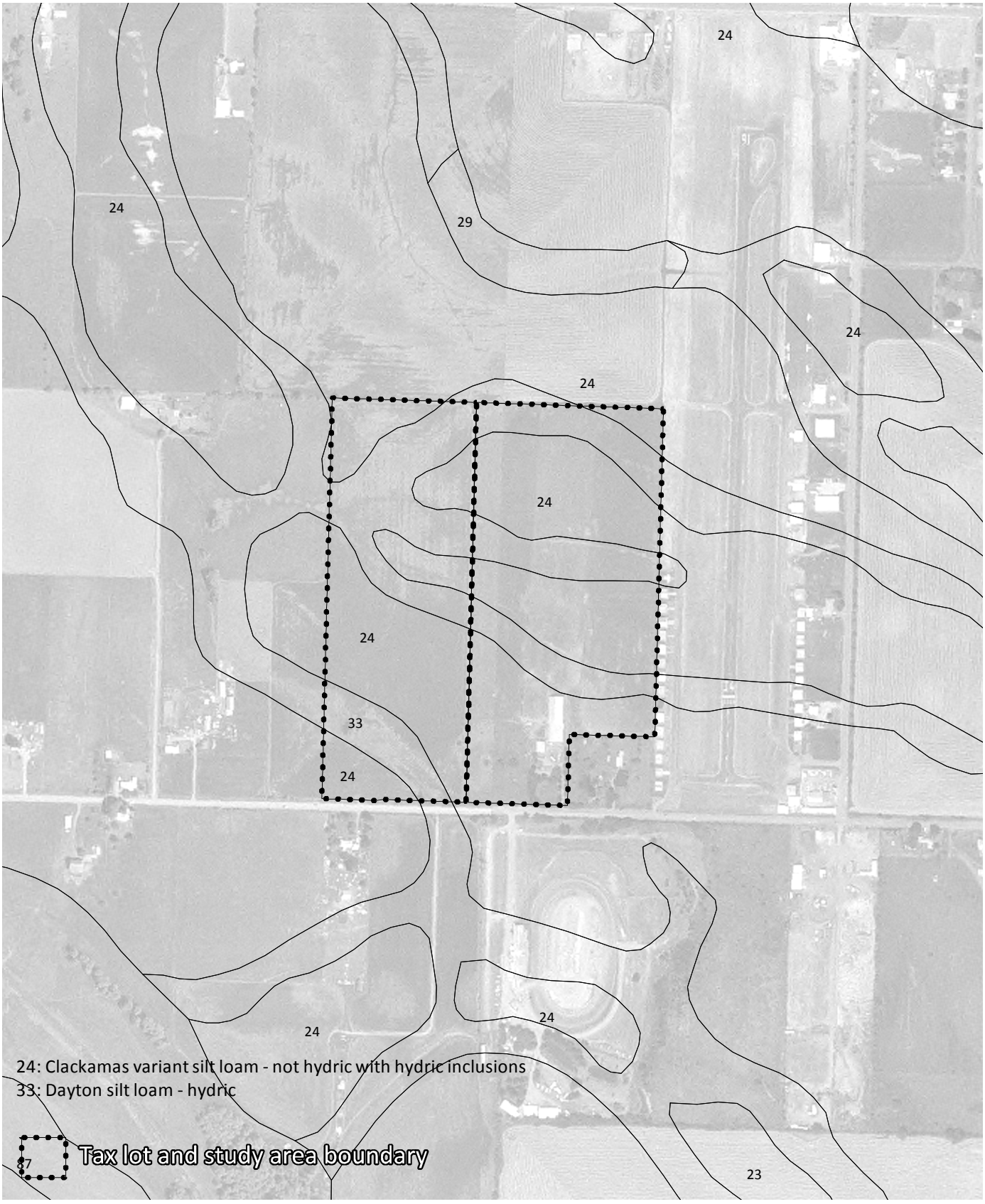
Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

1000 0 1000 2000
Feet
Scale: 1:12,000

FIGURE 3: NWI MAP
Scale: 1" = 1000'
Source: USFWS NWI Lebanon Quad
Drafted: 11/12/17

NORTH

Geo Resources LLC



Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

600 0 600 1200
Feet
Scale: 1:7,200

FIGURE 4: SOIL MAP
Scale: 1" = 600'
Source: USFWS NWI Lebanon Quad
Drafted: 11/18/17

NORTH

Geo Resources LLC

Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

360 0 360 720
Feet
Scale: 1:4,320

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FIGURE 5A: 1998 AERIAL
Scale: 1" = 360'
Source: City of Lebanon orthophoto
Flown: March 1998, 1 ft resolution
Drafted: 11/18/17

NORTH

Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

360 0 360 720
Feet
Scale: 1:4,320

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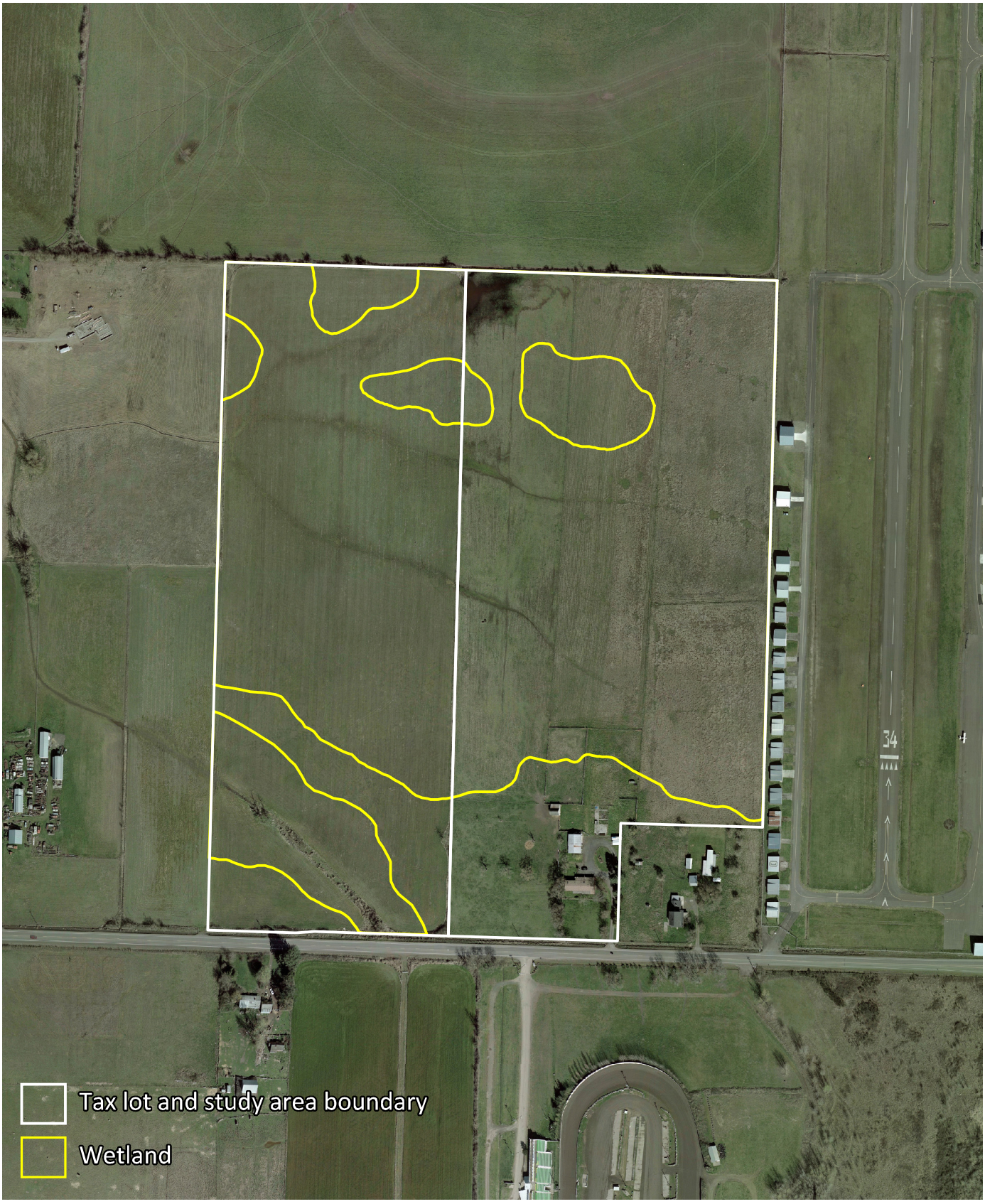
FIGURE 5B: 2000 AERIAL
Scale: 1" = 360'
Source: Linn County orthophoto
Flown: March, 2000, 1 ft resolution
Drafted: 11/18/17

NORTH



Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

360 0 360 720
Feet
Scale: 1:4,320

Geo Resources LLC

FIGURE 5C: 2005 AERIAL
Scale: 1" = 360'
Source: City of Lebanon orthophoto
Flown: March 8, 2005, 0.5 ft resolution
Drafted: 11/18/17

NORTH

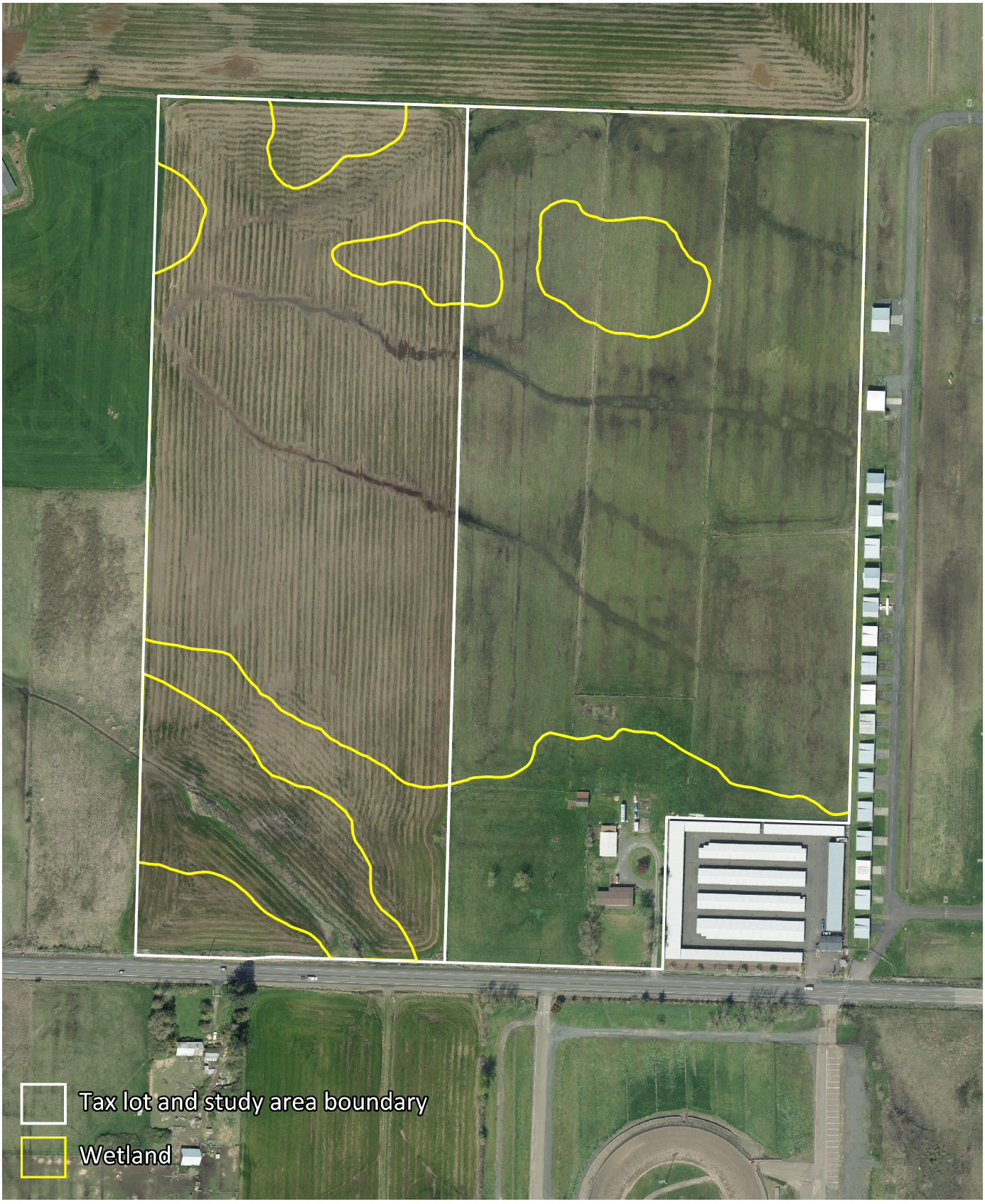
Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

360 0 360 720
Feet
Scale: 1:4,320

Geo Resources LLC

FIGURE 5D: 2012 AERIAL
Scale: 1" = 360'
Source: City of Lebanon orthophoto
Flown: March 7, 2012, 3" resolution
Drafted: 11/18/17

NORTH



Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

280 0 280 560
Feet
Scale: 1:3,360

Geo Resources LLC

FIGURE 5E: 2017 AERIAL

Scale: 1" = 280'
Source: City of Lebanon orthophoto
Flown: April 2, 2017 with 3" resolution
Drafted: 11/18/17

NORTH

Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

300 0 300 600
Feet
Scale: 1:3,600

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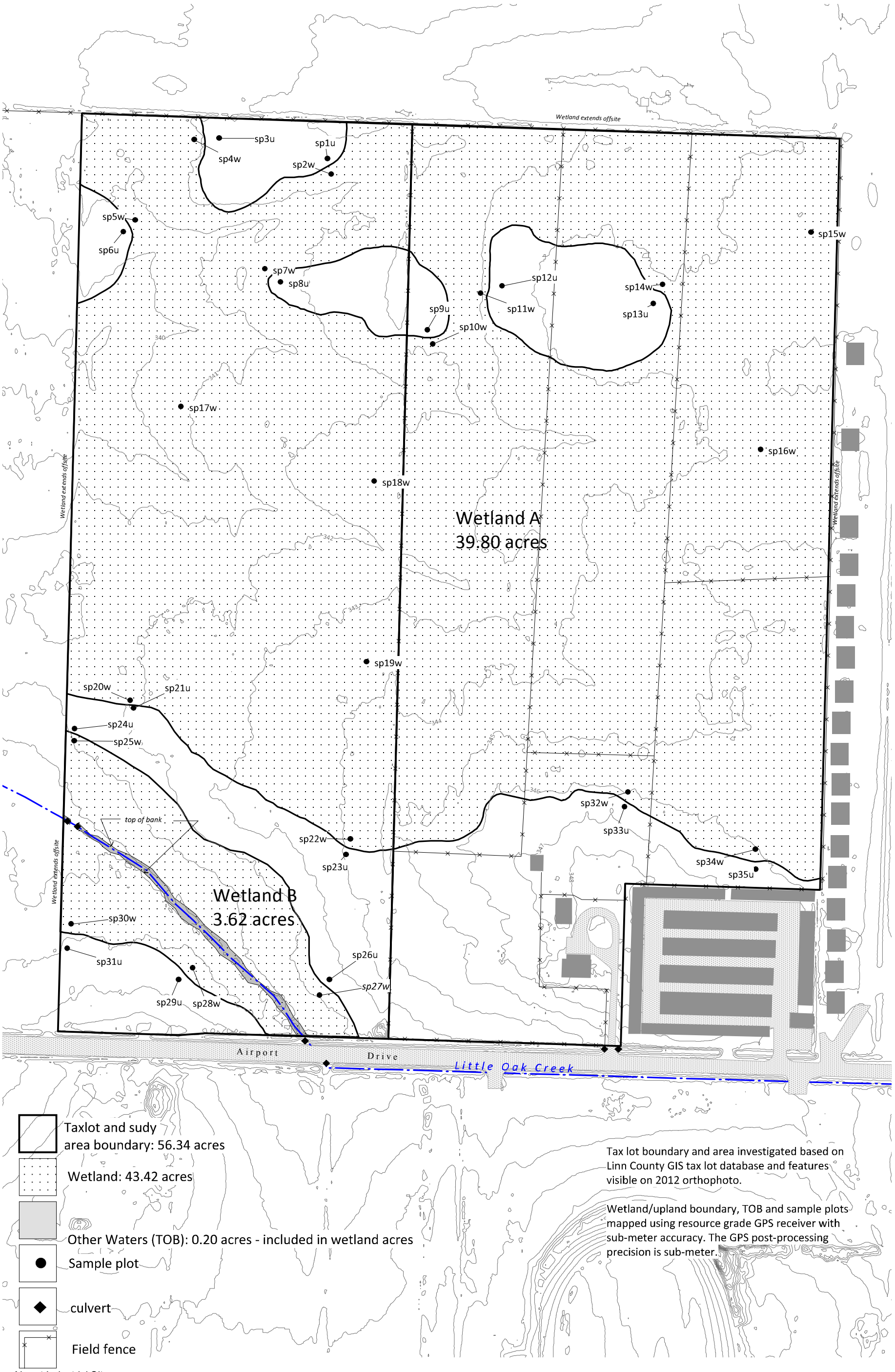
FIGURE 5F: SHADED RELIEF MAP
Scale: 1" = 300'
Source: OR Lidar Consortium
Flown: Spring 2009
Drafted: 11/18/17

NORTH



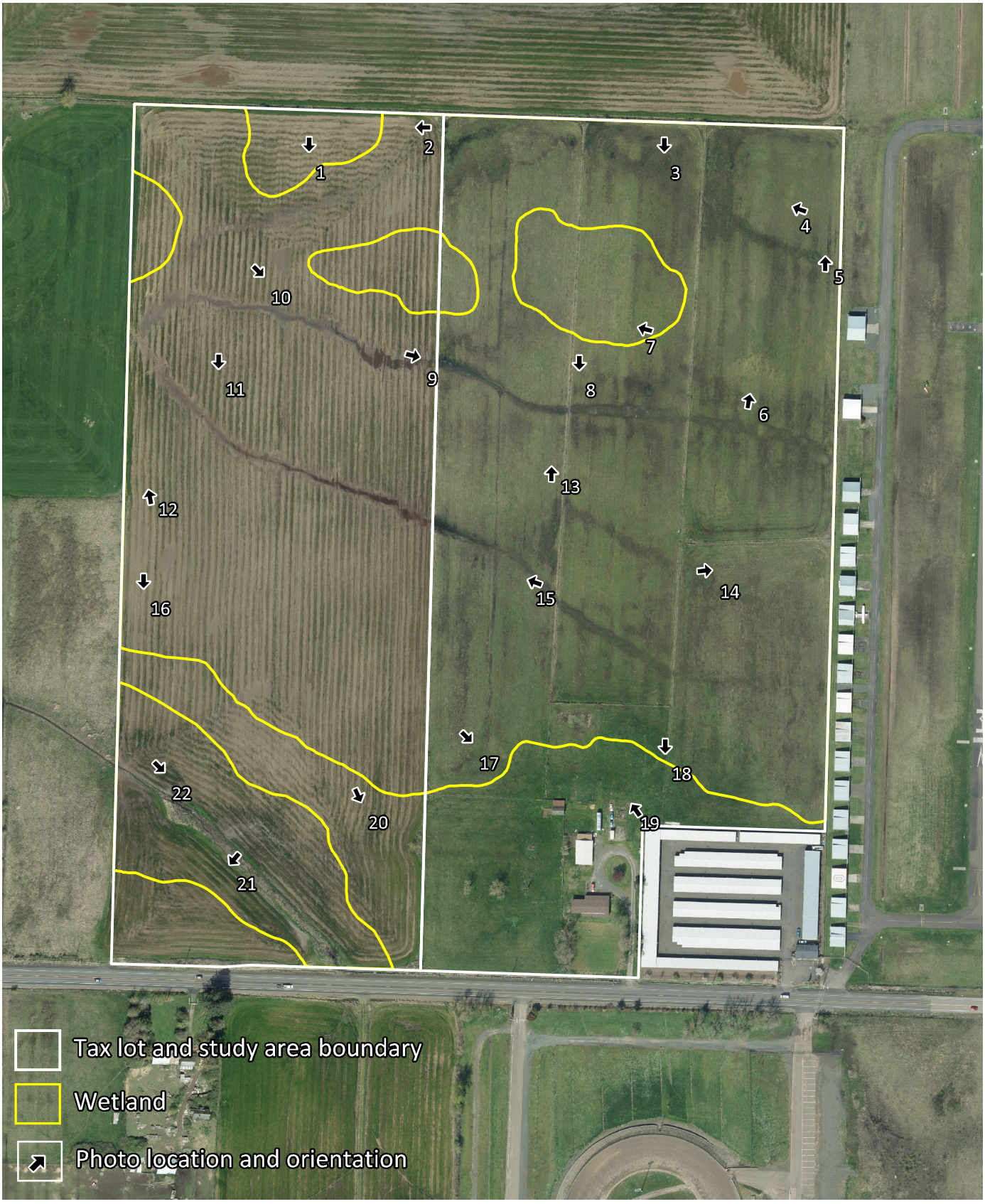
Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

180 0 180 360
Feet
Scale: 1:2,160

FIGURE 6A: WETLAND MAP
Scale: 1" = 180'
Source: Linn County GIS, OR DOGAMI Lidar
Vertical datum: NAVD 88
Drafted: 12/18/17

NORTH

Geo Resources, LLC



Airport Industrial Site
Linn County Assessor Map Map 12S02W16
Lots 2802 & 2804
36585 Airport Drive
Lebanon, OR 97355

280 0 280 560
Feet
Scale: 1:3,360

Geo Resources LLC

FIGURE 6B: PHOTO LOCATIONS

Scale: 1" = 280'
Source: City of Lebanon orthophoto
Flown: April 2, 2017, 3" resolution
Drafted: 11/18/17

NORTH

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-1

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.Y21° W Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes x	No	
Hydric Soil Present?	Yes	No x	**Is the Sampled Area within a Wetland?**
Wetland Hydrology Present?	Yes	No x	Yes No x

Remarks: Plot located in slightly crowned terrace at north end of TL 2802. Field cultivated for annual rye

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: 30 ft dia)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	80%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	80% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum 20

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No

Remarks:

Sampling Point: SP-1

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth	Matrix		Redox Features					
(Inches)	Color (moist)	%	Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-9	10YR 3/2	100					sicl	
9-11	10YR 3/2	98%	10YR 4/4	2	C	M	sicl	
11-14	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
14-21	10YR 4/2	95%	10YR 4/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ___ Histosol (A1)
- ___ Histic Epipedon (A2)
- ___ Black Histic (A3)
- ___ Hydrogen Sulfide (A4)
- ___ Depleted Below Dark Surface (A11)
- ___ Thick Dark Surface (A12)
- ___ Sandy Mucky Mineral (S1)
- ___ Sandy Gleyed Matrix (S4)
- ___ Sandy Redox (S5)
- ___ Stripped Matrix (S6)
- ___ Loamy Mucky Mineral (F1) (except MLRA 1)
- ___ Loamy Gleyed Matrix (F2)
- ___ Depleted Matrix (F3)
- ___ Redox Dark Surface (F6)
- ___ Depleted Dark Surface (F7)
- ___ Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- ___ 2 cm Muck (A10)
- ___ Red Parent Material (TF2)
- ___ Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type: ___

Depth (inches): ___

Hydric Soil Present? Yes ___ No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- ___ Surface Water (A1)
- ___ High Water Table (A2)
- ___ Saturation (A3)
- ___ Water Marks (B1)
- ___ Sediment Deposits (B2)
- ___ Drift Deposits (B3)
- ___ Algal Mat or Crust (B4)
- ___ Iron Deposits (B5)
- ___ Surface Soil Cracks (B6)
- ___ Inundation Visible on Aerial imagery (B7)
- ___ Sparsely Vegetated Concave Surface (B8)
- ___ Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- ___ Salt Crust (B11)
- ___ Aquatic Invertebrates (B13)
- ___ Hydrogen Sulfide Odor (C1)
- ___ Oxidized Rhizospheres along Living Roots (C3)
- ___ Presence of Reduced Iron (C4)
- ___ Recent iron Reduction in Tilled Soils (C6)
- ___ Stunted or Stressed Plants (D1) (LRR A)
- ___ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- ___ Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- ___ Drainage Patterns (B10)
- ___ Dry-Season Water Table (C2)
- ___ Saturation Visible on Aerial Imagery (C9)
- ___ Geomorphic Position (D2)
- ___ Shallow Aquitard (D3)
- ___ FAC-Neutral Test (D5)
- ___ Raised Ant Mounds (D6) (LRR A)
- ___ Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes ___ No x Depth (inches): ___

Water Table Present? Yes ___ No x Depth (inches): ___

Saturation Present? (includes capillary fringe) Yes ___ No x Depth (inches): ___

Wetland Hydrology Present? Yes ___ No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-2

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (terrace, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located on edge of terrace on north end of TL 2802.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	80%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	80%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 20

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-2

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-7	10YR 3/2	100					sicl	
7-11	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
11-20	10YR 4/2	95%	10YR 5/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-3

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: plot located on west end of small terrace bordering north end of TL 2802

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: 30 ft dia)			
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- 1 Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-3

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-14	10YR 3/2	98%	10YR 3/4	2	C	M	sicl	
14-21	10YR 4/2	95%	10YR 5/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- _____ Histosol (A1)
- _____ Histic Epipedon (A2)
- _____ Black Histic (A3)
- _____ Hydrogen Sulfide (A4)
- _____ Depleted Below Dark Surface (A11)
- _____ Thick Dark Surface (A12)
- _____ Sandy Mucky Mineral (S1)
- _____ Sandy Gleyed Matrix (S4)
- _____ Sandy Redox (S5)
- _____ Stripped Matrix (S6)
- _____ Loamy Mucky Mineral (F1) (except MLRA 1)
- _____ Loamy Gleyed Matrix (F2)
- _____ Depleted Matrix (F3)
- _____ Redox Dark Surface (F6)
- _____ Depleted Dark Surface (F7)
- _____ Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- _____ 2 cm Muck (A10)
- _____ Red Parent Material (TF2)
- _____ Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- _____ Surface Water (A1)
- _____ High Water Table (A2)
- _____ Saturation (A3)
- _____ Water Marks (B1)
- _____ Sediment Deposits (B2)
- _____ Drift Deposits (B3)
- _____ Algal Mat or Crust (B4)
- _____ Iron Deposits (B5)
- _____ Surface Soil Cracks (B6)
- _____ Inundation Visible on Aerial imagery (B7)
- _____ Sparsely Vegetated Concave Surface (B8)
- _____ Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- _____ Salt Crust (B11)
- _____ Aquatic Invertebrates (B13)
- _____ Hydrogen Sulfide Odor (C1)
- _____ Oxidized Rhizospheres along Living Roots (C3)
- _____ Presence of Reduced Iron (C4)
- _____ Recent iron Reduction in Tilled Soils (C6)
- _____ Stunted or Stressed Plants (D1) (LRR A)
- _____ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- _____ Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- _____ Drainage Patterns (B10)
- _____ Dry-Season Water Table (C2)
- _____ Saturation Visible on Aerial Imagery (C9)
- _____ Geomorphic Position (D2)
- _____ Shallow Aquitard (D3)
- _____ FAC-Neutral Test (D5)
- _____ Raised Ant Mounds (D6) (LRR A)
- _____ Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes _____ No x Depth (inches): _____

Water Table Present? Yes _____ No x Depth (inches): _____

Saturation Present? (includes capillary fringe) Yes _____ No x Depth (inches): _____

Wetland Hydrology Present? Yes _____ No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-4

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (terrace, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot paired with SP3 at north end of TL 2802

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: 30 ft dia)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	F
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-4

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-8	10YR 3/2	98	10YR 4/4	2	C	PL	sicl	2% OR
8-11	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
11-20	10YR 4/2	90%	10YR 4/6	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)	x	Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-5

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located adjacent to small terrace near northwest end of TL 2802

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: 30 ft dia)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	80%	yes	F
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	80% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum 20

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-5

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-6	10YR 3/2	100					sicl	
6-12	10YR 3/2	95%	10YR 4/6	5	C	M	sicl	
12-22	10YR 4/2	90%	10YR 5/4	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)
	Saturation (A3)		Aquatic Invertebrates (B13)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)
	Inundation Visible on Aerial imagery (B7)		
	Sparsely Vegetated Concave Surface (B8)		

Secondary Indicators (2 or more required)

	Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	Drainage Patterns (B10)
	Dry-Season Water Table (C2)
x	Saturation Visible on Aerial Imagery (C9)
x	Geomorphic Position (D2)
	Shallow Aquitard (D3)
	FAC-Neutral Test (D5)
	Raised Ant Mounds (D6) (LRR A)
	Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-6

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot in slightly higher terrace near northwest corner of TL 2802

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90% = Total Cover		
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-6

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-9	10YR 3/2	100					sicl	
9-14	10YR 3/2	94%	10YR 4/4	6	C	M	sicl	
14-20	10YR 4/2	90%	10YR 4/6	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-7

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in wetland adjacent to terrace that straddles fenceline between two parcels

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	85%	yes	F
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	85%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 15

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-7

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-5	10YR 3/2	100					sicl	
5-11	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	2% OR
11-20	10YR 3/2	90%	10YR 4/4	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)				
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)	x	Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-8

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot located on small terrace that straddles fenceline between two parcels.

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-8

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-20	10YR 3/2	94%	10YR 4/3	6	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: Airport Industrial State: OR Sampling Point: SP-9

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes x	No	
Hydric Soil Present?	Yes	No x	**Is the Sampled Area within a Wetland?**
Wetland Hydrology Present?	Yes	No x	Yes No x

Remarks: Plot located near north end of TL 2804 in small upland terrace.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size:)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	75%	yes	FAC
2. *Anthoxanthum odoratum*	15		FACU
3. *Holcus lanatus*	10		FAC
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No

Remarks:

Sampling Point: SP-9

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-9	10YR 3/2	99	10YR 4/4	1	C	PL	sicl	1% OR
9-14	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
14-21	10YR 4/2	95%	10YR 5/4	5	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-10

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (terrace, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in wetland adjacent to small terrace on north end of TL 2804

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: 30 ft dia)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	75%	yes	FAC
2. *Anthoxanthum odoratum*	15		FACU
3. *Hypochaeris radicata*	10		FACU
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-10

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-7	10YR 3/2	100					sicl	
7-12	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
12-20	10YR 4/2	94%	10YR 4/4	6	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)				
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-11

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (terrace, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: OR State Plane N HARN NAD 83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ Is the Sampled Area within a Wetland?

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located on west side of small upland terrace at north end of TL2804.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	70%	yes	FAC
2. *Schedonourus arundinaceus*	30	yes	FAC
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-11

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-6	10YR 3/2	100					sicl	
6-11	10YR 3/2	95%	10YR 4/6	5	C	M	sicl	
11-19	10YR 3/2	90%	10YR 4/6	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-12

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes x	No	
Hydric Soil Present?	Yes	No x	**Is the Sampled Area within a Wetland?**
Wetland Hydrology Present?	Yes	No x	Yes No x

Remarks: Plot located in small upland terrace at north end of TL 2804

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size:)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	65%	yes	FAC
2. *Schedonorus arundinaceus*	25	yes	FAC
3. *Hypochaeris radicata*	5		FACU
4. *Daucus carota*	5		FACU
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species		x 1 =
FACW species		x 2 =
FAC species		x 3 =
FACU species		x 4 =
UPL species		x 5 =
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-12

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-9	10YR 3/2	100					sicl	
9-14	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
14-20	10YR 3/2	90%	10YR 4/4	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-13

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot located on east side of small terrace in central field. Variety of non-native pasture grasses with weedy patches.

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Schedonorus arundinaceus*	40%	yes	FAC
2. *Agrostic capillaris*	40	yes	FAC
3. *Anthoxanthum odoratum*	20	yes	FACU
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 3 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 66 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____ x 1 =	____
FACW species	____ x 2 =	____
FAC species	____ x 3 =	____
FACU species	____ x 4 =	____
UPL species	____ x 5 =	____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-13

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-20	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- ____ Histosol (A1)
- ____ Histic Epipedon (A2)
- ____ Black Histic (A3)
- ____ Hydrogen Sulfide (A4)
- ____ Depleted Below Dark Surface (A11)
- ____ Thick Dark Surface (A12)
- ____ Sandy Mucky Mineral (S1)
- ____ Sandy Gleyed Matrix (S4)
- ____ Sandy Redox (S5)
- ____ Stripped Matrix (S6)
- ____ Loamy Mucky Mineral (F1) (except MLRA 1)
- ____ Loamy Gleyed Matrix (F2)
- ____ Depleted Matrix (F3)
- ____ Redox Dark Surface (F6)
- ____ Depleted Dark Surface (F7)
- ____ Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- ____ 2 cm Muck (A10)
- ____ Red Parent Material (TF2)
- ____ Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type: ____

Depth (inches): ____

Hydric Soil Present? Yes ____ No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- ____ Surface Water (A1)
- ____ High Water Table (A2)
- ____ Saturation (A3)
- ____ Water Marks (B1)
- ____ Sediment Deposits (B2)
- ____ Drift Deposits (B3)
- ____ Algal Mat or Crust (B4)
- ____ Iron Deposits (B5)
- ____ Surface Soil Cracks (B6)
- ____ Inundation Visible on Aerial imagery (B7)
- ____ Sparsely Vegetated Concave Surface (B8)
- ____ Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- ____ Salt Crust (B11)
- ____ Aquatic Invertebrates (B13)
- ____ Hydrogen Sulfide Odor (C1)
- ____ Oxidized Rhizospheres along Living Roots (C3)
- ____ Presence of Reduced Iron (C4)
- ____ Recent iron Reduction in Tilled Soils (C6)
- ____ Stunted or Stressed Plants (D1) (LRR A)
- ____ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- ____ Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- ____ Drainage Patterns (B10)
- ____ Dry-Season Water Table (C2)
- ____ Saturation Visible on Aerial Imagery (C9)
- ____ Geomorphic Position (D2)
- ____ Shallow Aquitard (D3)
- ____ FAC-Neutral Test (D5)
- ____ Raised Ant Mounds (D6) (LRR A)
- ____ Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes ____ No x Depth (inches): ____

Water Table Present? Yes ____ No x Depth (inches): ____

Saturation Present? (includes capillary fringe) Yes ____ No x Depth (inches): ____

Wetland Hydrology Present? Yes ____ No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-14

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located on east side of small upland terrace near north end of TL 2804

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: 10 ft dia)			
1.			
2.			
3.			
4.			
5.			
	10%	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Schedonorus arundinaceus*	40%	yes	FAC
2. *Agrostis capillaris*	40	yes	FAC
3. *Holcus lanatus*	10		FAC
4. *Anthoxanthum odoratum*	10		FACU
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-14

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-6	10YR 3/2	100					sicl	
6-15	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
15-20	10YR 3/1	95%	10YR 3/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-15

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located on east side of TL 2804

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: 30 ft dia)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: 10 ft dia)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	60%	yes	FAC
2. *Schedonorus arundinaceus*	40	yes	FAC
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size:)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-15

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-5	10YR 3/2	100					sicl	
5-10	10YR 3/2	90%	10YR 4/6	10	C	M	sicl	
10-20	10YR 4/1	90%	5YR 4/4	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)	x	Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-16

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in east field to test slightly crowned area.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	50%	yes	FAC
2. *Schedonorus arundinaceus*	25	yes	FAC
3. *Anthoxanthum odoratum*	15		FACU
4. *Hypochaeris radicata*	10		FACU
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____ x 1 =	____
FACW species	____ x 2 =	____
FAC species	____ x 3 =	____
FACU species	____ x 4 =	____
UPL species	____	____
Column Totals:	____	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

____ Rapid Test for Hydrophytic Vegetation

x Dominance Test is >50%

____ Prevalence Index is <3.0[1]

____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)

____ Wetland Non-Vascular Plants[1]

____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-16

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-8	10YR 3/2	100					sicl	
8-11	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
11-21	10YR 4/2	90%	10YR 5/4	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1) (except MLRA 1)
	Hydrogen Sulfide (A4)		Loamy Gleyed Matrix (F2)
x	Depleted Below Dark Surface (A11)		Depleted Matrix (F3)
	Thick Dark Surface (A12)	x	Redox Dark Surface (F6)
	Sandy Mucky Mineral (S1)		Depleted Dark Surface (F7)
	Sandy Gleyed Matrix (S4)		Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-17

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in cultivated rye grass field

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 90

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-17

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-5	10YR 3/2	100					sicl	
5-11	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
11-19	10YR 4/2	90%	10YR 4/6	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-18

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in cultivated annual rye grass field

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	95%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	95%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 5

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-18

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-8	10YR 3/2	100					sicl	
8-12	10YR 3/2	93%	10YR 4/4	7	C	M	sicl	
12-20	10YR 4/2	85%	10YR 4/4	15	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-19

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in rye grass field

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	85%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	85%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 15

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-19

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-7	10YR 3/2	100					sicl	
7-13	10YR 3/2	95%	10YR 4/6	5	C	M	sicl	
13-19	10YR 3/1	90%	10YR 3/4	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-20

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located at south end of TL 2802 in depression on north side of elevated berm on north side of creek

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-20

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-6	10YR 3/2	100					sicl	
6-10	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
10-12	10YR 3/2	85%	10YR 4/4	15	C	M	sicl	
12-20	10YR 4/2	90%	10YR 4/6	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
x	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)				
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/14/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-21

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x

Wetland Hydrology Present? Yes ____ No x

Is the Sampled Area within a Wetland? Yes ____ No x

Remarks: Plot located on elevated berm on north side of creek

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	100%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-21

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-13	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
13-19	10YR 4/2	90%	10YR 4/6	10	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- _____ Histosol (A1)
- _____ Histic Epipedon (A2)
- _____ Black Histic (A3)
- _____ Hydrogen Sulfide (A4)
- _____ Depleted Below Dark Surface (A11)
- _____ Thick Dark Surface (A12)
- _____ Sandy Mucky Mineral (S1)
- _____ Sandy Gleyed Matrix (S4)
- _____ Sandy Redox (S5)
- _____ Stripped Matrix (S6)
- _____ Loamy Mucky Mineral (F1) (except MLRA 1)
- _____ Loamy Gleyed Matrix (F2)
- _____ Depleted Matrix (F3)
- _____ Redox Dark Surface (F6)
- _____ Depleted Dark Surface (F7)
- _____ Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- _____ 2 cm Muck (A10)
- _____ Red Parent Material (TF2)
- _____ Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- _____ Surface Water (A1)
- _____ High Water Table (A2)
- _____ Saturation (A3)
- _____ Water Marks (B1)
- _____ Sediment Deposits (B2)
- _____ Drift Deposits (B3)
- _____ Algal Mat or Crust (B4)
- _____ Iron Deposits (B5)
- _____ Surface Soil Cracks (B6)
- _____ Inundation Visible on Aerial imagery (B7)
- _____ Sparsely Vegetated Concave Surface (B8)
- _____ Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- _____ Salt Crust (B11)
- _____ Aquatic Invertebrates (B13)
- _____ Hydrogen Sulfide Odor (C1)
- _____ Oxidized Rhizospheres along Living Roots (C3)
- _____ Presence of Reduced Iron (C4)
- _____ Recent iron Reduction in Tilled Soils (C6)
- _____ Stunted or Stressed Plants (D1) (LRR A)
- _____ Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- _____ Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- _____ Drainage Patterns (B10)
- _____ Dry-Season Water Table (C2)
- _____ Saturation Visible on Aerial Imagery (C9)
- _____ Geomorphic Position (D2)
- _____ Shallow Aquitard (D3)
- _____ FAC-Neutral Test (D5)
- _____ Raised Ant Mounds (D6) (LRR A)
- _____ Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes _____ No x Depth (inches): _____

Water Table Present? Yes _____ No x Depth (inches): _____

Saturation Present? (includes capillary fringe) Yes _____ No x Depth (inches): _____

Wetland Hydrology Present? Yes _____ No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-22

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in wetland near south end of TL 2802

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-22

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-8	10YR 3/2	100					sicl	
8-12	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
12-20	10YR 3/2	90%	10YR 4/4	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-23

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x

Wetland Hydrology Present? Yes ____ No x

Is the Sampled Area within a Wetland? Yes ____ No x

Remarks: Plot located on elevated berm on north side of creek

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____	= Total Cover	
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90%	= Total Cover	
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-23

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-16	10YR 3/2	95%	10YR 4/6	5	C	M	sicl	
16-20	10YR 3/2	90%	10YR 4/6	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-24

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot located on north side of wetland corridor that straddles creek.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size:)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	100%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species		x 1 =	
FACW species		x 2 =	
FAC species		x 3 =	
FACU species		x 4 =	
UPL species		x 5 =	
Column Totals:	(A)		(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-24

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-11	10YR 3/2	100					sicl	
11-14	10YR 3/2	97%	10YR 3/4	3	C	M	sicl	
14-20	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-25

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 6%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in wetland bordering north side of creek

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size:)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	100%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species		x 1 =
FACW species		x 2 =
FAC species		x 3 =
FACU species		x 4 =
UPL species		x 5 =
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-25

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-8	10YR 3/2	100					sicl	
8-14	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
14-20	10YR 3/2	90%	10YR 4/4	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-26

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 5%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot located at south end of TL 2802 on north side of creek in upland

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	100%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-26

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-9	10YR 3/2	100					sicl	
9-20	10YR 3/2	95%	10YR 3/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-27

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes x No ____

Remarks: Plot located in wetland area on north side of creek.

VEGETATION - Use scientific names of plants.

	Absolute % Cover	Dominant Species?	Indicator Status
Tree Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
	____ = Total Cover		
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____ = Total Cover		
Herb Stratum (Plot size: 5 ft dia.)			
1. *Lolium multiflorum*	95%		
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	95% = Total Cover		
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____ = Total Cover		

% Bare Ground in Herb Stratum 5

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____ x 1 =	____
FACW species	____ x 2 =	____
FAC species	____ x 3 =	____
FACU species	____ x 4 =	____
UPL species	____ x 5 =	____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-27

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-5	10YR 3/2	98	10YR 4/4	2	C	PL	sicl	2% OR
5-10	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
10-16	10YR 3/2	90%	10YR 4/4	10	C	M	sicl	
16-20	10YR 4/2	95%	10YR 5/4	5	C	M	cl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)	x	Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: City of Lebanon City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: Airport Industrial State: OR Sampling Point: SP-28

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): concave Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located on south side of creek

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	80%	yes	FAC
2. *Schedonorus arundinaceus*	20	yes	FAC
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species	____	x 1 =	____
FACW species	____	x 2 =	____
FAC species	____	x 3 =	____
FACU species	____	x 4 =	____
UPL species	____	x 5 =	____
Column Totals:	____ (A)		____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-28

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-4	10YR 3/2	100					sicl	
4-8	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
8-18	10YR 3/2	90%	10YR 4/6	10	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-29

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes x	No		
Hydric Soil Present?	Yes	No x	**Is the Sampled Area within a Wetland?**	
Wetland Hydrology Present?	Yes	No x	Yes	No x

Remarks: Plot located on slightly elevated terrace on south side of creek

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size:)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		

Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		

Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	70%	yes	FAC
2. *Schedonorus arundinaceus*	30	yes	FAC
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		

Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-29

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-9	10YR 3/2	100					sicl	
9-17	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes ____ No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes ____ No x Depth (inches): ____

Water Table Present? Yes ____ No x Depth (inches): ____

Saturation Present? (includes capillary fringe) Yes ____ No x Depth (inches): ____

Wetland Hydrology Present? Yes ____ No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-30

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upland

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in wetland depression on south side of creek near site entrance.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	90%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	90%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum 10

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-30

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-7	10YR 3/2	100					sicl	
7-11	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	
11-18	10YR 3/2	95%	10YR 4/6	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA		Water Stained Leaves (B9) (MLRA 1,2,
	High Water Table (A2)		1,2,4A, and 4B)		4A, and 4B)
	Saturation (A3)		Salt Crust (B11)		Drainage Patterns (B10)
	Water Marks (B1)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Sediment Deposits (B2)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Drift Deposits (B3)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Algal Mat or Crust (B4)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Iron Deposits (B5)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Surface Soil Cracks (B6)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Inundation Visible on Aerial imagery (B7)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-31

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upl

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot located on slightly elevated terrace on south side of creek

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Lolium multiflorum*	100%	yes	FAC
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-31

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-18	10YR 3/2	95%	10YR 3/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-32

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 2%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Dayton silt loam NWI classification: PSSA

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located on east side of SA in east field

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	60%	yes	FAC
2. *Holcus lanatus*	20	yes	FAC
3. *Schedonorus arundinaceus*	20	yes	FAC
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 3 (A)

Total Number of Dominant Species Across All Strata: 3 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:	
OBL species	____	x 1 =	____
FACW species	____	x 2 =	____
FAC species	____	x 3 =	____
FACU species	____	x 4 =	____
UPL species	____	x 5 =	____
Column Totals:	____ (A)		____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[(1)]
- ____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[(1)]
- ____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-32

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-8	10YR 3/2	100					sicl	
8-20	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date: 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-33

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: PSSA

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes x	No		
Hydric Soil Present?	Yes	No x	**Is the Sampled Area within a Wetland?**	
Wetland Hydrology Present?	Yes	No x	Yes	No x

Remarks:

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size:)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size:)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Schedonorus arundinaceus*	70%	yes	FAC
2. *Agrostis capillaris*	30	yes	FAC
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		
Woody Vine Stratum (Plot size:)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 2 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-33

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-19	10YR 3/2	95%	10YR 3/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes _____ No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes _____ No x Depth (inches): _____

Water Table Present? Yes _____ No x Depth (inches): _____

Saturation Present? (includes capillary fringe) Yes _____ No x Depth (inches): _____

Wetland Hydrology Present? Yes _____ No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-34

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 0%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: PSSA

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes x No ____ **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes x No ____ Yes x No ____

Remarks: Plot located in lower terrace at southeast corner of TL 2804

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	____	= Total Cover	

Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	____	= Total Cover	

Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	80%	yes	FAC
2. *Holcus lanatus*	10		FAC
3. *Hypochaeris radicata*	5		FACU
4. *Daucus carota*	5		FACU
5.			
6.			
7.			
8.			
9.			
10.			
11.			
	100%	= Total Cover	

Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	____	= Total Cover	

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 1 (A)

Total Number of Dominant Species Across All Strata: 1 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 100 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	____	x 1 = ____
FACW species	____	x 2 = ____
FAC species	____	x 3 = ____
FACU species	____	x 4 = ____
UPL species	____	x 5 = ____
Column Totals:	____ (A)	____ (B)

Prevalence Index = B/A = ____

Hydrophytic Vegetation Indicators:

____ Rapid Test for Hydrophytic Vegetation

x Dominance Test is >50%

____ Prevalence Index is <3.0[(1)]

____ Morphological Adaptations[(1)] (Provide supporting data in Remarks or on a separate sheet)

____ Wetland Non-Vascular Plants[(1)]

____ Problematic Hydrophytic Vegetation[(1)] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-34

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-6	10YR 3/2	100					sicl	
6-8	10YR 3/2	98%	10YR 4/4	2	C	PL	sicl	2% OR
8-18	10YR 3/2	95%	10YR 4/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

	Histosol (A1)		Sandy Redox (S5)
	Histic Epipedon (A2)		Stripped Matrix (S6)
	Black Histic (A3)		Loamy Mucky Mineral (F1)
	Hydrogen Sulfide (A4)		(except MLRA 1)
	Depleted Below Dark Surface (A11)		Loamy Gleyed Matrix (F2)
	Thick Dark Surface (A12)		Depleted Matrix (F3)
	Sandy Mucky Mineral (S1)	x	Redox Dark Surface (F6)
	Sandy Gleyed Matrix (S4)		Depleted Dark Surface (F7)
			Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

	2 cm Muck (A10)
	Red Parent Material (TF2)
	Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes x No

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

	Surface Water (A1)		Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)		Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
	High Water Table (A2)		Salt Crust (B11)		Drainage Patterns (B10)
	Saturation (A3)		Aquatic Invertebrates (B13)		Dry-Season Water Table (C2)
	Water Marks (B1)		Hydrogen Sulfide Odor (C1)	x	Saturation Visible on Aerial Imagery (C9)
	Sediment Deposits (B2)		Oxidized Rhizospheres along Living Roots (C3)	x	Geomorphic Position (D2)
	Drift Deposits (B3)		Presence of Reduced Iron (C4)		Shallow Aquitard (D3)
	Algal Mat or Crust (B4)		Recent iron Reduction in Tilled Soils (C6)		FAC-Neutral Test (D5)
	Iron Deposits (B5)		Stunted or Stressed Plants (D1) (LRR A)		Raised Ant Mounds (D6) (LRR A)
	Surface Soil Cracks (B6)		Other (Explain in Remarks)		Frost-Heave Hummocks (D7)
	Inundation Visible on Aerial imagery (B7)				
	Sparsely Vegetated Concave Surface (B8)				

Secondary Indicators (2 or more required)

Field Observations:

Surface Water Present?	Yes		No x	Depth (inches):	
Water Table Present?	Yes		No x	Depth (inches):	
Saturation Present? (includes capillary fringe)	Yes		No x	Depth (inches):	

Wetland Hydrology Present? Yes x No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

WETLAND DETERMINATION DATA FORM - Western Mountain, Valleys, and Coast Region

Project/Site: Airport Industrial City/County: Lebanon/Linn Sampling Date : 8/17/2017

Applicant/Owner: City of Lebanon State: OR Sampling Point: SP-35

Investigator(s): A. Martin Section, Township, Range: 16, T12S, R02W

Landform (hillslope, terrace, etc.): terrace Local relief (concave, convex, none): none Slope (%): 6%

Subregion (LRR): LRR A Lat: 44.529142° N Long: -123.933778° W Datum: HARN NAD83

Soil Map Unit Name: Clackamas variant silt loam NWI classification: upl

Are Climatic / hydrologic conditions on the site typical for this time of year? Yes: x No: (If no explain in remarks)

Are Vegetation ____ Soil ____ or Hydrology ____ Significantly disturbed? Are"Normal Circumstances" present? Yes x No ____

Are Vegetation ____ Soil ____ or Hydrology ____ Naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes x No ____

Hydric Soil Present? Yes ____ No x **Is the Sampled Area within a Wetland?**

Wetland Hydrology Present? Yes ____ No x Yes ____ No x

Remarks: Plot located on slightly higher terrace in southeast corner of study area.

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: ____)	Absolute % Cover	Dominant Species?	Indicator Status
1.			
2.			
3.			
4.			
	= Total Cover		
Sapling/Shrub Stratum (Plot size: ____)			
1.			
2.			
3.			
4.			
5.			
	= Total Cover		
Herb Stratum (Plot size: 5 ft dia)			
1. *Agrostis capillaris*	50%	yes	FAC
2. *Schedonorus arundinaceus*	20	yes	FAC
3. *Anthoxanthum odoratum*	20	yes	FACU
4. *Daucus carota*	5		FACU
5. *Hypochaeris radicata*	5		FACU
6.			
7.			
8.			
9.			
10.			
11.			
	100% = Total Cover		
Woody Vine Stratum (Plot size: ____)			
1.			
2.			
	= Total Cover		

% Bare Ground in Herb Stratum ____

Dominance Test Worksheet:

Number of Dominant Species That are OBL, FACW, or FAC: 2 (A)

Total Number of Dominant Species Across All Strata: 3 (B)

Percent of Dominant Species That are OBL, FACW, or FAC: 67 (A/B)

Prevalence Index worksheet:

Total % Cover of:		Multiply by:
OBL species	x 1 =	
FACW species	x 2 =	
FAC species	x 3 =	
FACU species	x 4 =	
UPL species	x 5 =	
Column Totals:	(A)	(B)

Prevalence Index = B/A =

Hydrophytic Vegetation Indicators:

- ____ Rapid Test for Hydrophytic Vegetation
- x Dominance Test is >50%
- ____ Prevalence Index is <3.0[1]
- ____ Morphological Adaptations[1] (Provide supporting data in Remarks or on a separate sheet)
- ____ Wetland Non-Vascular Plants[1]
- ____ Problematic Hydrophytic Vegetation[1] (Explain)

(1) Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.

Hydrophytic Vegetation Present? Yes x No ____

Remarks:

Sampling Point: SP-35

SOIL

Profile Description: (Describe to the depth needed to document the indicator of confirm the absence of indicators.)

Depth (Inches)	Matrix Color (moist)	%	Redox Features Color (moist)	%	Type (1)	Loc (2)	Texture	Remarks
0-10	10YR 3/2	100					sicl	
10-18	10YR 3/2	95%	10YR 3/4	5	C	M	sicl	

(1)Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered of Coated Sand Grains. (2)Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

- Histosol (A1)
- Histic Epipedon (A2)
- Black Histic (A3)
- Hydrogen Sulfide (A4)
- Depleted Below Dark Surface (A11)
- Thick Dark Surface (A12)
- Sandy Mucky Mineral (S1)
- Sandy Gleyed Matrix (S4)
- Sandy Redox (S5)
- Stripped Matrix (S6)
- Loamy Mucky Mineral (F1) (except MLRA 1)
- Loamy Gleyed Matrix (F2)
- Depleted Matrix (F3)
- Redox Dark Surface (F6)
- Depleted Dark Surface (F7)
- Redox Depressions (F8)

Indicators of Problematic Hydric Soils(3).

- 2 cm Muck (A10)
- Red Parent Material (TF2)
- Other (Explain in Remarks)

(3) indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive layer (if present):

Type:

Depth (inches):

Hydric Soil Present? Yes No x

Remarks:

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required: (check all that apply)

- Surface Water (A1)
- High Water Table (A2)
- Saturation (A3)
- Water Marks (B1)
- Sediment Deposits (B2)
- Drift Deposits (B3)
- Algal Mat or Crust (B4)
- Iron Deposits (B5)
- Surface Soil Cracks (B6)
- Inundation Visible on Aerial imagery (B7)
- Sparsely Vegetated Concave Surface (B8)
- Water Stained Leaves (B9) (except MLRA 1,2,4A, and 4B)
- Salt Crust (B11)
- Aquatic Invertebrates (B13)
- Hydrogen Sulfide Odor (C1)
- Oxidized Rhizospheres along Living Roots (C3)
- Presence of Reduced Iron (C4)
- Recent iron Reduction in Tilled Soils (C6)
- Stunted or Stressed Plants (D1) (LRR A)
- Other (Explain in Remarks)

Secondary Indicators (2 or more required)

- Water Stained Leaves (B9) (MLRA 1,2, 4A, and 4B)
- Drainage Patterns (B10)
- Dry-Season Water Table (C2)
- Saturation Visible on Aerial Imagery (C9)
- Geomorphic Position (D2)
- Shallow Aquitard (D3)
- FAC-Neutral Test (D5)
- Raised Ant Mounds (D6) (LRR A)
- Frost-Heave Hummocks (D7)

Field Observations:

Surface Water Present? Yes No x Depth (inches):

Water Table Present? Yes No x Depth (inches):

Saturation Present? (includes capillary fringe) Yes No x Depth (inches):

Wetland Hydrology Present? Yes No x

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Photo 1: View looking south from north end of TL 2802 (8/14/17).

Photo 2: North end of TL 2802 looking west (8/14/17).

Photo 3: Looking south from north end of TL 2804 (8/17/17).

Photo 4: View of north end of TL 2804 looking west (8/17/17).

Photo 5: Looking north along east side of TL 2804 (8/17/17).

Photo 6: North end of TL 2804 (8/17/17).

Photo 7: Looking west across upland in north end of study area (8/17/17).

Photo 8: View looking south in weedy mowed field in TL 2804 (8/17/17).

Photo 9: View looking southeast at wetland swale near center of study area (8/17/17).

Photo 10: View of backhoe pits on north end of TL 2802 (8/14/17).

Photo 11: Looking south at wetland covering rye grass field on TL 2802 (8/14/17).

Photo 12: Wetland on west side of TL 2802 looking north (8/14/17).

Photo 13: Looking north in Tax Lot 2402 along fence line separating the two tax lots (8/17/17).

Photo 14: View of east side of TL 2404 looking to the east with airport buildings in the distance (8/17/17).

Photo 15: Looking west at wetland swale in TL 2402. (8/17/17).

Photo 16: View from west side of TL 2402 looking south (8/14/17).

Photo 17: View looking southeast at horse pasture, barn and residence in southeast corner of TL 2404 (8/17/17).

Photo 18: View of south end of TL 2404 with storage buildings on adjacent property in distance (8/17/17).

Photo 19: View looking north across upland area in small pasture north of residence (8/17/17).

Photo 20: View of upland in southeast corner of TL 2402 (8/17/17).

Photo 21: Looking across line of backhoe pits in southwest corner of TL 2404 (8/17/17).

Photo 22: Looking toward southeast corner of TL 2802 with intermittent tributary on photo right (8/14/17).

APPENDIX E: Literature Citations

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