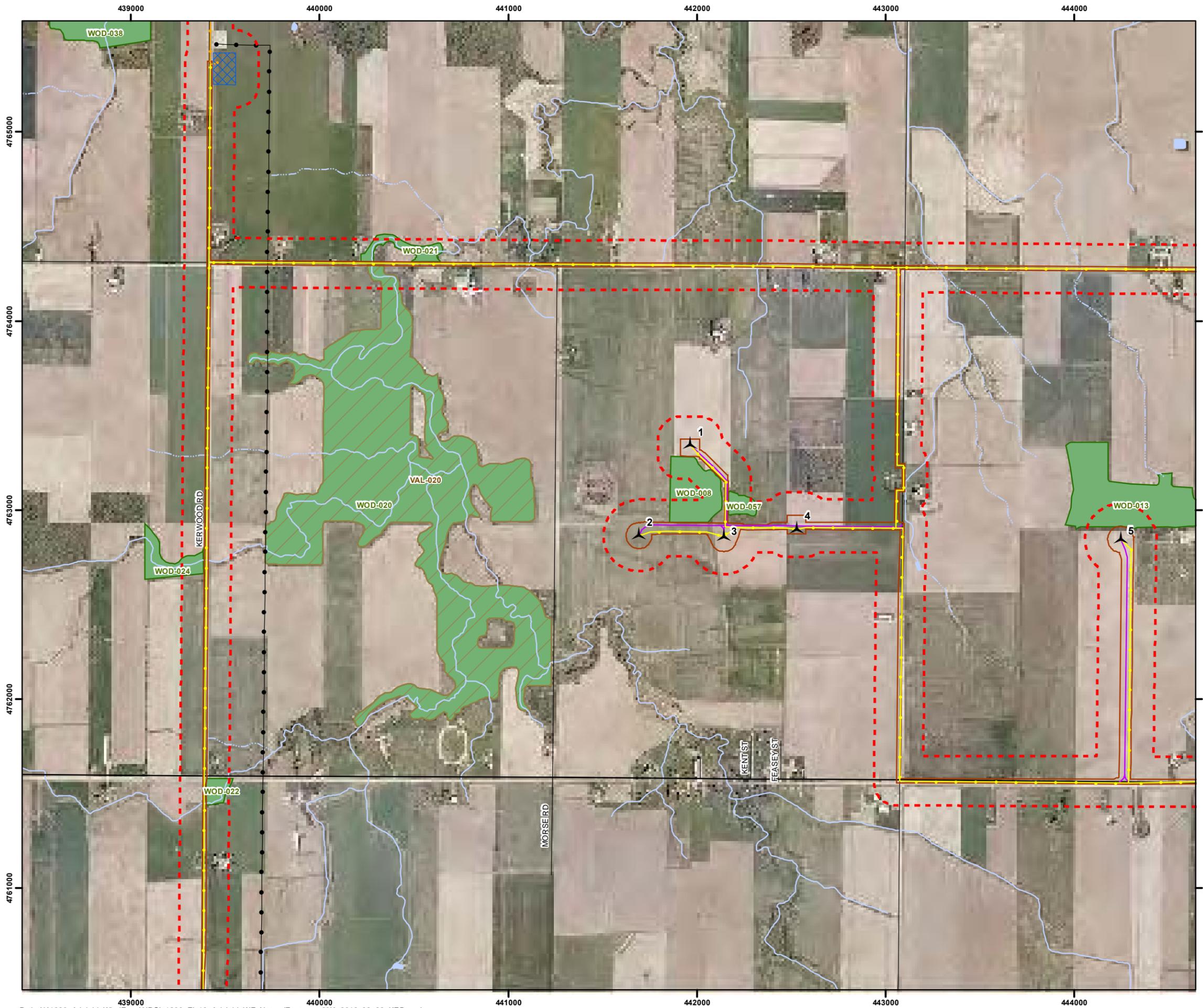


Figure 10

Adelaide Wind Energy Centre Natural Features - Northwest



Legend

- Project Area (120m Buffer)
- Project Location
- Turbine
- Point of Common Coupling (PCC)
- Access Road
- Collector System
- Transmission Line
- Staging Area
- Interconnection Facilities
- Substation
- Existing Transmission Line
- Railroad
- Highway
- Primary Road
- Secondary Road
- Permanent Watercourse
- Intermittent Watercourse
- Waterbody
- Woodlot (WOD)
- Wetland (WET)
- Valleyland (VAL)

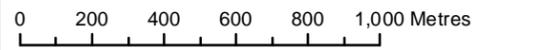


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Project: 1230 Date: January 6, 2012	NAD83 - UTM Zone 17 Scale: 1:20,000 (11x17")
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0 200 400 600 800 1,000 Metres



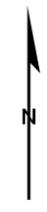
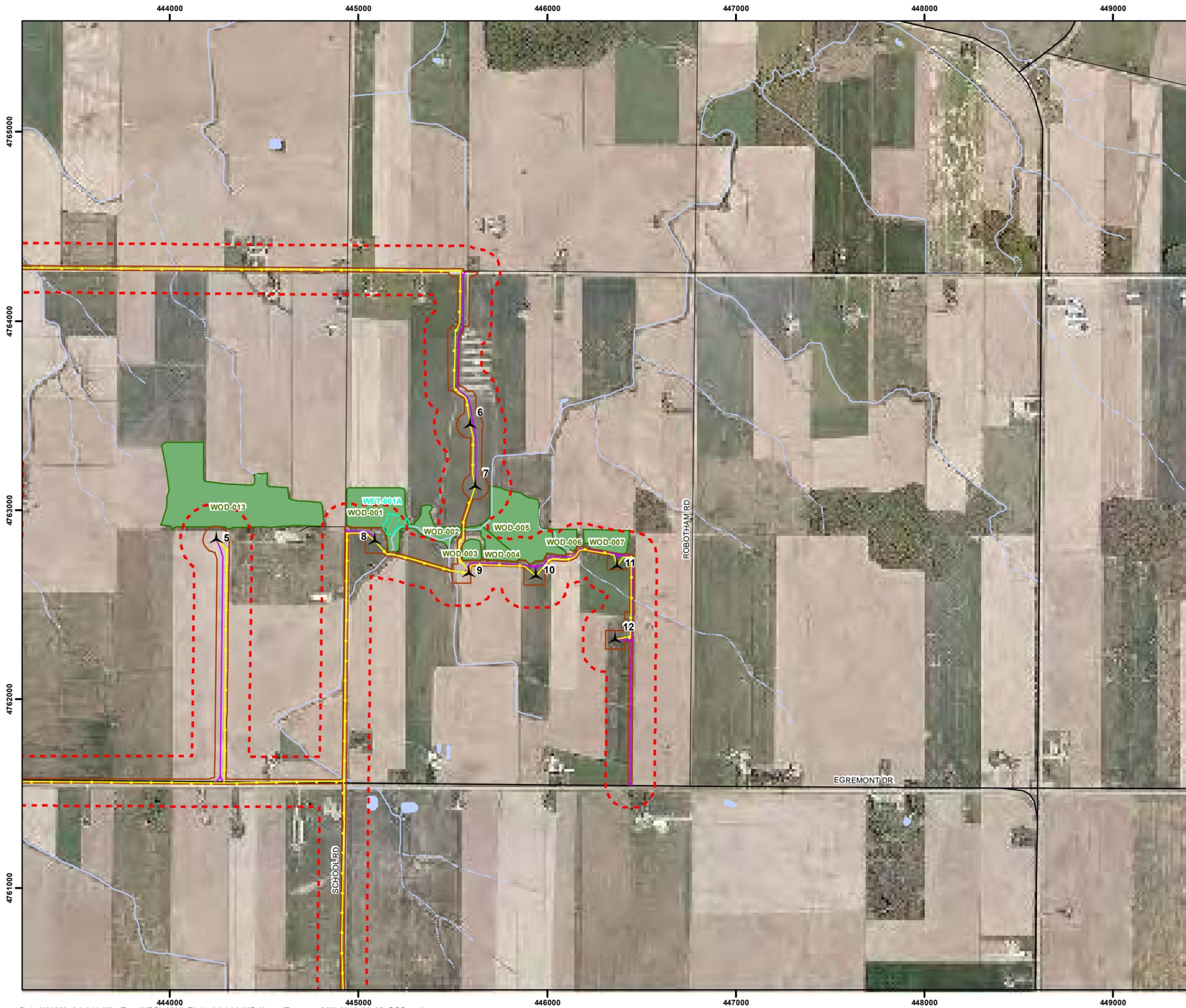


Figure 11

Adelaide Wind Energy Centre Natural Features - Northeast



- Legend**
- Project Area (120m Buffer)
 - Project Location
 - Turbine
 - Point of Common Coupling (PCC)
 - Access Road
 - Collector System
 - Transmission Line
 - Staging Area
 - Interconnection Facilities
 - Substation
 - Existing Transmission Line
 - Railroad
 - Highway
 - Primary Road
 - Secondary Road
 - Permanent Watercourse
 - Intermittent Watercourse
 - Waterbody
 - Woodlot (WOD)
 - Wetland (WET)
 - Valleyland (VAL)

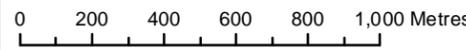


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Project: 1230 Date: January 6, 2012	NAD83 - UTM Zone 17 Scale: 1:20,000 (11x17")
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0 200 400 600 800 1,000 Metres



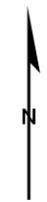
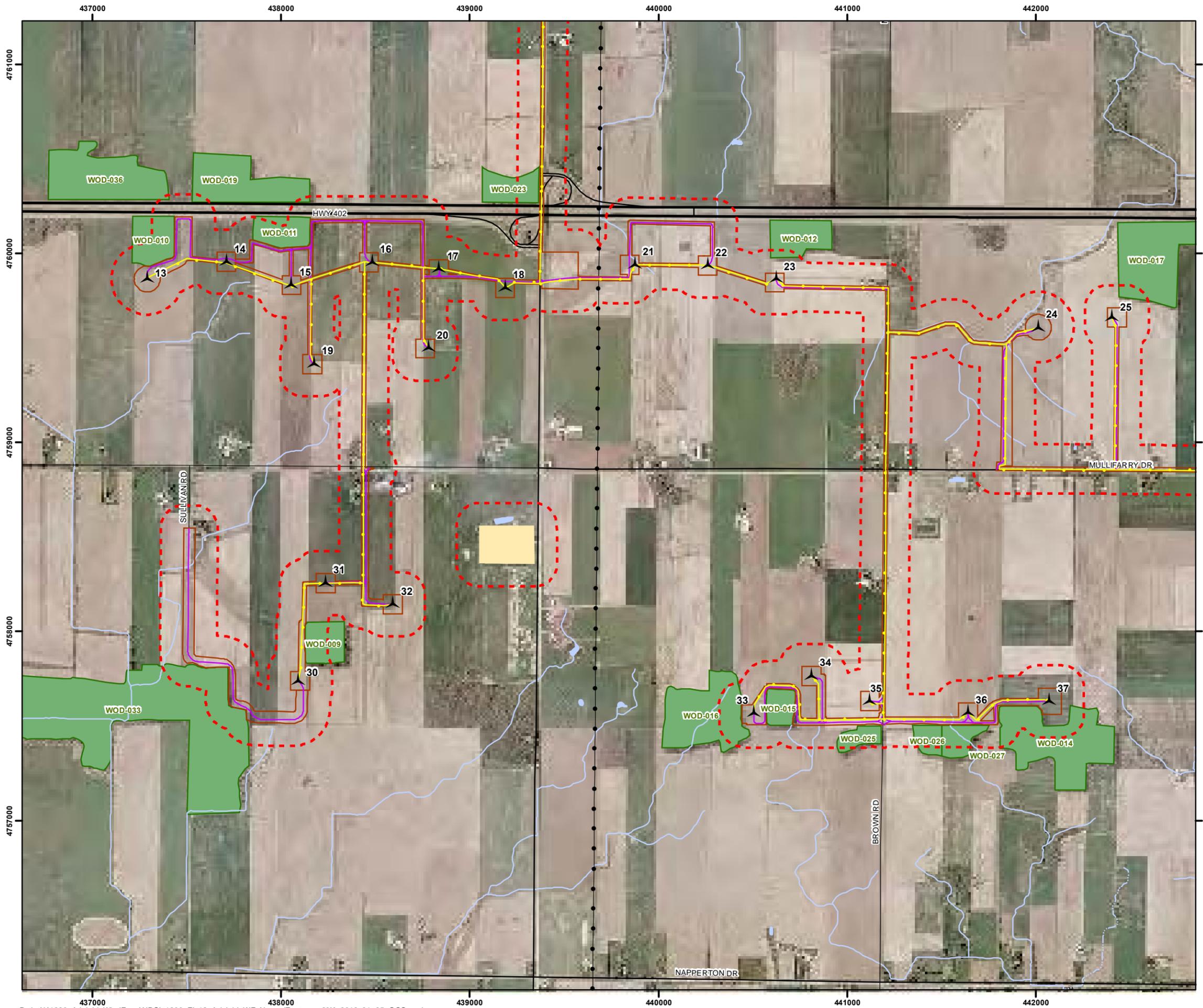


Figure 12

Adelaide Wind Energy Centre Natural Features - Southwest



- Legend**
- Project Area (120m Buffer)
 - Project Location
 - Turbine
 - Point of Common Coupling (PCC)
 - Access Road
 - Collector System
 - Transmission Line
 - Staging Area
 - Interconnection Facilities
 - Substation
 - Existing Transmission Line
 - Railroad
 - Highway
 - Primary Road
 - Secondary Road
 - Permanent Watercourse
 - Intermittent Watercourse
 - Waterbody
 - Woodlot (WOD)
 - Wetland (WET)
 - Valleyland (VAL)

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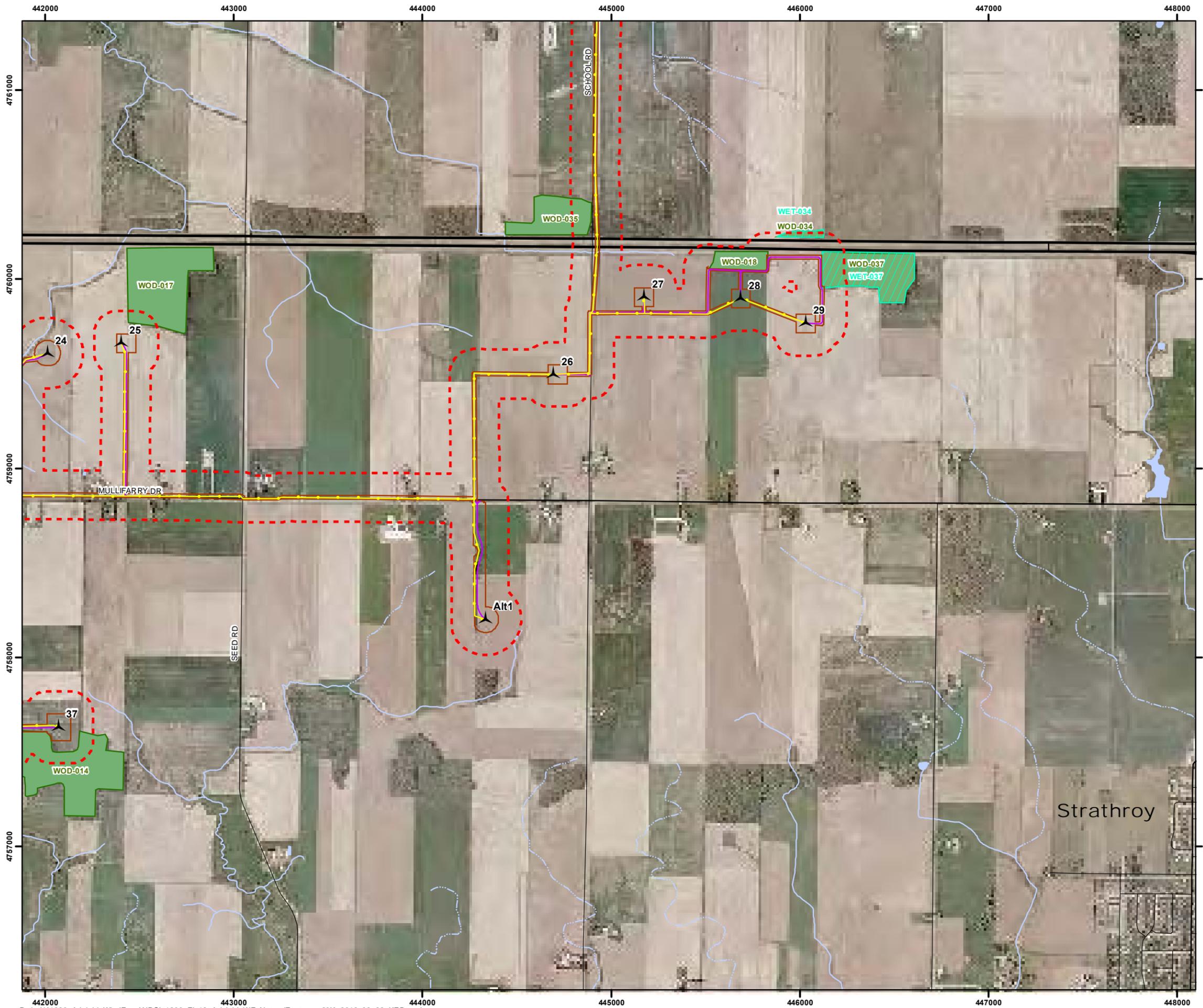
Project: 1230 Date: January 6, 2012	NAD83 - UTM Zone 17 Scale: 1:20,000 (11x17")
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0 200 400 600 800 1,000 Metres

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N

Figure 13

Adelaide Wind Energy Centre Natural Features - Southeast



Legend

- Project Area (120m Buffer)
- Project Location
- Turbine
- Point of Common Coupling (PCC)
- Access Road
- Collector System
- Transmission Line
- Staging Area
- Interconnection Facilities
- Substation
- Existing Transmission Line
- Railroad
- Highway
- Primary Road
- Secondary Road
- Permanent Watercourse
- Intermittent Watercourse
- Waterbody
- Woodlot (WOD)
- Wetland (WET)
- Valleyland (VAL)



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Project: 1230 Date: January 6, 2012	NAD83 - UTM Zone 17 Scale: 1:20,000 (11x17")
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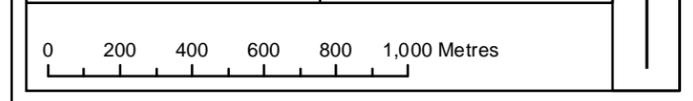
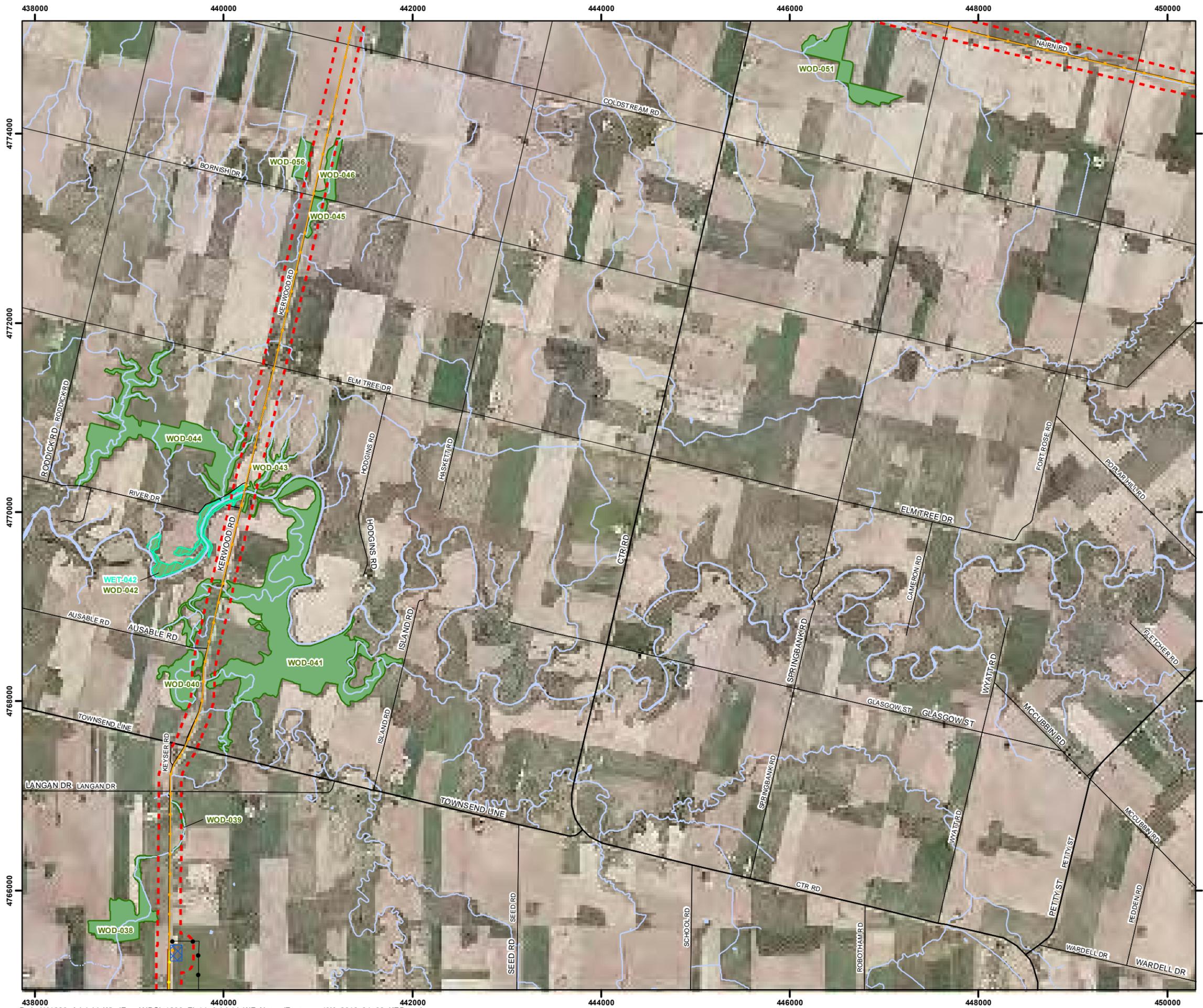


Figure 14

Adelaide Wind Energy Centre Natural Features - Kerwood T-Line



Legend

- Project Area (120m Buffer)
- Project Location
- Turbine
- Point of Common Coupling (PCC)
- Access Road
- Collector System
- Transmission Line
- Staging Area
- Interconnection Facilities
- Substation
- Existing Transmission Line
- Railroad
- Highway
- Primary Road
- Secondary Road
- Permanent Watercourse
- Intermittent Watercourse
- Waterbody
- Woodlot (WOD)
- Wetland (WET)
- Valleyland (VAL)



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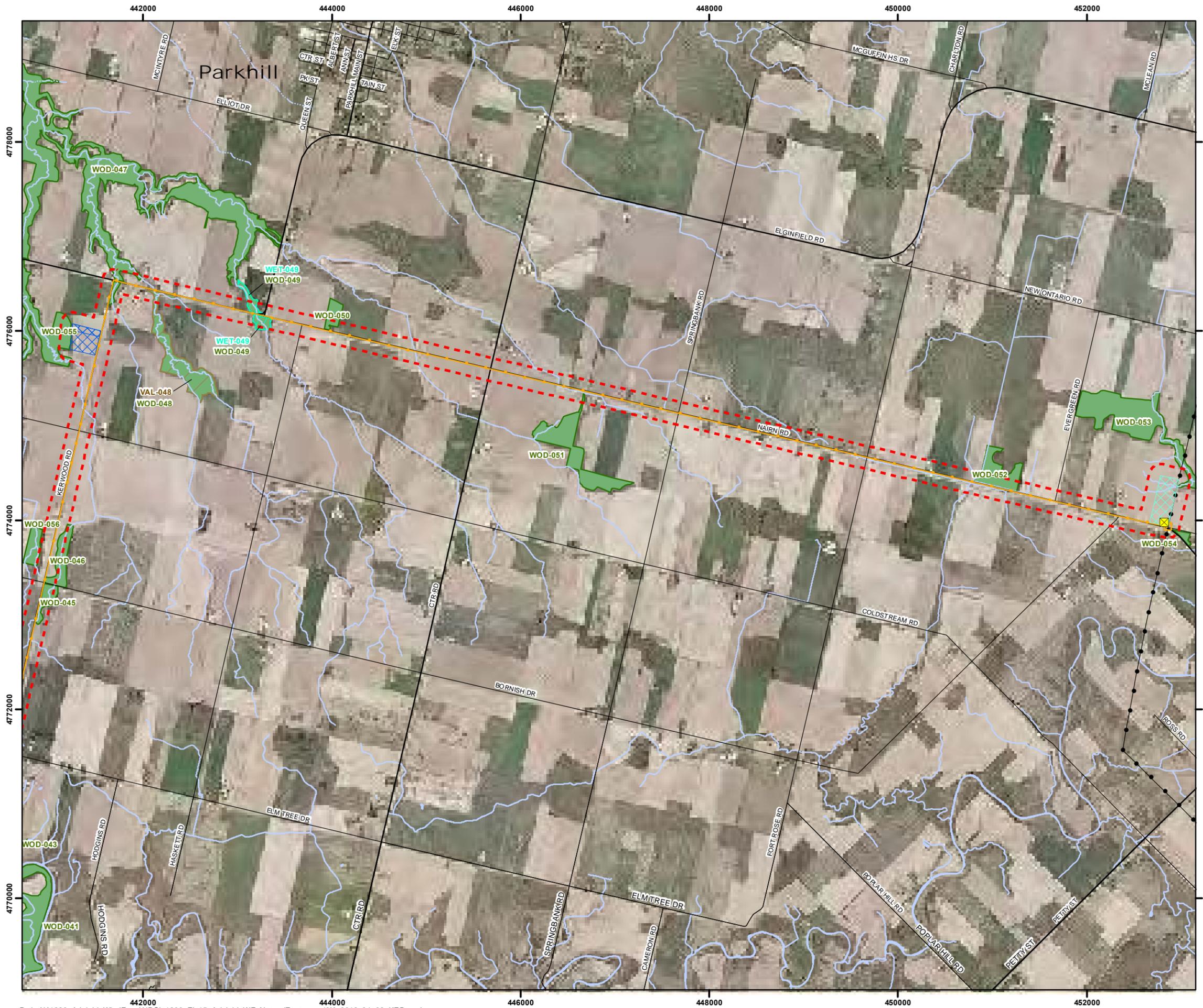
Project: 1230 Date: April 9, 2012	NAD83 - UTM Zone 17 Scale: 1:40,000 (11x17")
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0 500 1,000 1,500 2,000 Metres



Figure 15

Adelaide Wind Energy Centre Natural Features - Nairn T-Line



Legend

- Project Area (120m Buffer)
- Project Location
- Turbine
- Point of Common Coupling (PCC)
- Access Road
- Collector System
- Transmission Line
- Staging Area
- Interconnection Facilities
- Substation
- Existing Transmission Line
- Railroad
- Highway
- Primary Road
- Secondary Road
- Permanent Watercourse
- Intermittent Watercourse
- Waterbody
- Woodlot (WOD)
- Wetland (WET)
- Valleyland (VAL)

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Project: 1230 Date: April 9, 2012	NAD83 - UTM Zone 17 Scale: 1:40,000 (11x17")
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0 500 1,000 1,500 2,000 Metres

Table 8. Summary of Woodlands within 120m of the Adelaide Wind Energy Centre

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
WOD-001 Woodland	6.9	FODM9-3	Fresh-moist bur oak deciduous forest composed of bur oak, red oak, white elm and basswood.	Provides interior habitat; in close proximity to other woodlands; acts as a linkage between potentially significant features; representative of woodland diversity; woodland size.	WT – 16 AR – 4 OL – >120 UL – 4 SI - >120	11	Yes
WOD-002 Woodland	1.4	FODM4-9	Dry-fresh basswood deciduous forest composed of basswood, bur oak, and white ash.	Positioned in close proximity to other woodlands; acts as a linkage between potentially significant features; representative of woodland diversity.	WT – >120 AR – >120 OL – >120 UL – Overlapping* SI - >120	11	Yes
WOD-003 Woodland	1.0	FODM4-9	Dry-fresh basswood deciduous forest composed of (basswood and (bur oak with fewer white elm and white ash.	Positioned in close proximity to other woodlands; acts as a linkage between potentially significant features; representative of woodland diversity.	WT – 21 AR – 4 OL – 16 UL – 4 SI - >120	11	Yes
WOD-004 Woodland	1.6	FODM4-2	Dry-fresh white ash – hardwood deciduous forest composed of white ash with fewer bur oak and Freeman’s maple.	Provides interior habitat (connected to WOD-005); in close proximity to other woodlands; acts as a linkage between potentially significant features.	WT – 100 AR – 4 OL – >120 UL – 4 SI - >120	11	Yes
WOD-005 Woodland	8.7	FODM4-2	Dry-fresh white ash – hardwood deciduous	Provides interior habitat (connected to WOD-004, -006); in close proximity to	WT – 19 AR – 4 OL – >120	11	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
			forest a canopy composed of white ash, bur oak, red oak and basswood.	other woodlands; acts as a linkage between potentially significant features; representative of woodland diversity; woodland size.	UL – 4 SI - >120		
WOD-006 Woodland	1.0	FODM4-2	Dry-fresh white ash – hardwood deciduous forest composed of bur oak and white ash.	Provides interior habitat (connected to WOD-005); in close proximity to other woodlands; acts as a linkage between potentially significant features.	WT – >120 AR – 4 OL – >120 UL – 4 SI - >120	11	Yes
WOD-007 Woodland	2.3	FODM4-2	Dry-fresh white ash - hardwood deciduous forest composed of white ash, bur oak, and to a lesser degree, white elm.	Positioned in close proximity to other woodlands; acts as a linkage between potentially significant features.	WT – 19 AR – 4 OL – >120 UL – 4 SI - >120	11	Yes
WOD-008 Woodland	7.1	FODM5-3	Dry-fresh sugar maple – oak deciduous forest composed of sugar maple, white ash, bur oak and red oak.	Provides interior habitat; representative of woodland diversity; woodland size.	WT – 21 AR – 10 OL – >120 UL – 10 SI - >120	10	Yes
WOD-009 Woodland	4.1	FODM2-4	Dry-fresh oak – hardwood deciduous forest, composed of bur oak, white ash, white elm, and shagbark hickory.	Provides interior habitat; representative of woodland diversity; woodland size.	WT – 63 AR – 108 OL – >120 UL – 4 SI - >120	12	Yes
WOD-010 Woodland	4.7	FODM6-4	Fresh-moist sugar maple – white elm deciduous forest composed of sugar	Provides interior habitat; representative of woodland diversity; woodland size.	WT – 51 AR – 4 OL – >120 UL – 4	12	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
			maple, white elm, and white ash.		SI - >120		
WOD-011 Woodland	4.4	WODM4-3	Dry-fresh sugar maple deciduous woodland composed of sugar maple, basswood, and white ash.	Representative of woodland diversity; woodland size.	WT - >120 AR - 4 OL - >120 UL - >120 SI - >120	12	Yes
WOD-012 Woodland	5.1	WODM4-3	Dry-fresh sugar maple deciduous woodland composed of sugar maple, basswood, white ash and hop hornbeam.	Provides interior habitat; representative of woodland diversity; woodland size.	WT - 65 AR - 100 OL - >120 UL - 100 SI - >120	12	Yes
WOD-013/028 Woodland	19.9	FODM5-8	Dry-fresh sugar maple – white ash deciduous forest dominated by sugar maple, white ash, and bur oak.	Provides interior habitat; in close proximity to other woodlands; acts as a linkage between potentially significant features; representative of woodland diversity.	WT - 23 AR - 78 OL - >120 UL - 78	11	Yes
WOD-014 Woodland	15.1	FODM5-6	Dry-fresh sugar maple – basswood deciduous forest dominated by sugar maple with fewer American basswood and white elm.	Provides interior habitat; representative of woodland diversity; woodland size.	WT - 22 AR - 4 OL - >120 UL - 4 SI - >120	12	Yes
WOD-015 Woodland	2.7	FODM5-6	Dry-fresh sugar maple – basswood deciduous forest composed of sugar maple with some basswood, and to a lesser	Representative of woodland diversity.	WT - 16 AR - 4 OL - >120 UL - 4 SI - >120	12	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
			degree, white elm and white ash.				
WOD-016 Woodland	12.9	FODM5-6	Dry-fresh sugar maple – basswood deciduous forest dominated by sugar maple, basswood, and white elm.	Provides interior habitat; representative of woodland diversity; woodland size.	WT – 21 AR – 54 OL – >120 UL – 54 SI – >120	12	Yes
WOD-017 Woodland	14.1	FODM6-5	Fresh-moist sugar maple – hardwood deciduous forest composed of sugar maple, basswood, and bur oak.	Provides interior habitat; representative of woodland diversity; woodland size.	WT – 77 AR – 115 OL – >120 UL – 115 SI – >120	12	Yes
WOD-018 Woodland	2.1	FODM6-1	Fresh-moist sugar maple – lowland ash deciduous forest composed of green ash and sugar maple with less basswood.	No known functions.	WT – 105 AR – 4 OL – >120 UL – >120 SI – >120	13	Yes
WOD-019 Woodland	9.8	FODM5-8	Dry-fresh sugar maple – white ash deciduous forest composed of sugar maple, white ash, basswood, with some American beech and white elm.	Representative of woodland diversity.	WT – >120 AR – 105 OL – >120 UL – >120 SI – >120	12	Yes
WOD-020 Woodland	106.5	FODM5-3	Fresh-moist Manitoba maple deciduous woodland composed of Manitoba maple, white	Acts as a linkage between potentially significant features.	WT – >120 AR – >120 OL – 4 UL – >120 SI – >120	10	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
			ash, as well as some willow species and silver maple.				
WOD-021 Woodland	1.8	WODM5	Fresh-moist deciduous woodland composed mostly of willow species with some silver maple.	No known functions.	WT - >120 AR - >120 OL - 7 UL - >120 SI - >120	10	Yes
WOD-022 Woodland	0.5	FOCM6	Naturalized coniferous plantation containing mostly white spruce and to a much lesser degree, black walnut, white pine, and white ash.	No known functions.	WT - >120 AR - >120 OL - 4 UL - >120 SI - >120	10	Yes
WOD-023 Woodland	3.3	WODM4-2	Dry-fresh white ash - deciduous woodland dominated by white ash, American beech, and sugar maple.	No known functions.	WT - >120 AR - >120 OL - 32 UL - >120 SI - >120	12	Yes
WOD-024 Woodland	3.2	TAGM2	Mixed plantation consisting of white spruce and black walnut.	No known functions.	WT - >120 AR - >120 OL - Overlapping UL - >120 SI - >120	10	Yes
WOD-025 Woodland	1.4	FODM4-2	Dry-fresh white ash hardwood deciduous forest dominated by white ash and basswood.	No known functions.	WT - 74 AR - 4 OL - >120 UL - 4 SI - >120	12	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
WOD-026 Woodland	2.2	WODM4	Dry-fresh deciduous woodland dominated by bitternut hickory, basswood, and white ash.	Positioned in close proximity to other woodlands; representative of woodland diversity.	WT – 97 AR – 4 OL – >120 UL – 4 SI - >120	12	Yes
WOD-027 Woodland	2.6	FODM5-2	Dry-fresh sugar maple – American beech forest dominated by sugar maple, American beech, and basswood.	Positioned in close proximity to other woodlands; acts as a linkage between potentially significant features; representative of woodland diversity.	WT – 18 AR – 4 OL – >120 UL – 4 SI - >120	12	Yes
WOD-033 Woodland	86.9	FODM7-2	Fresh-moist green ash hardwood lowland deciduous forest dominated by green ash and white ash as well as Freeman’s maple, basswood and shagbark hickory.	Provides interior habitat; woodland size; woodland diversity.	WT – >120 AR – 2 OL – >120 UL - >120 SI - >120	12	Yes
WOD-034 Woodland	0.5	FODM7-2	Fresh-moist green ash – hardwood lowland deciduous forest dominated by green ash and shagbark hickory.	No known functions.	WT – >120 AR – 97 OL – >120 UL – >120 SI - >120	13	Yes
WOD-035 Woodland	6.0	FODM4-2	Dry-fresh white ash – hardwood deciduous forest dominated by white ash, sugar maple and American beech.	No known functions.	WT – >120 AR – >120 OL – 22 UL – >120 SI - >120	13	Yes
WOD-036 Woodland	16.0	FODM5-8	Dry-fresh sugar maple – white ash deciduous	Provides interior habitat.	WT – >120 AR – 104	12	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
			forest dominated by sugar maple and white ash.		OL - >120 UL - >120 SI - >120		
WOD-037 Woodland	8.1	FODM7	Fresh-moist lowland deciduous forest dominated by Freeman's maple, green ash, and white elm.	Woodland size.	WT - >120 AR - 4 OL - >120 UL - >120 SI - >120	13	Yes
WOD-038 Woodland	22.9	FODM5-3	Dry-fresh sugar maple - oak deciduous forest dominated by sugar maple and oak species as well as white elm and white ash.	Woodland size; interior habitat; water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 92 UL - >120 SI - >120	14	Yes
WOD-039 Woodland	1.2	FODM7-4	Fresh-moist black walnut deciduous forest dominated by black walnut and to a lesser extent, hickory species.	Woodland water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 31 UL - >120 SI - >120	14	Yes
WOD-040 Woodland	16.8	FODM5-6	Dry-fresh sugar maple - basswood deciduous forest dominated by sugar maple with some basswood, black walnut, black cherry and white spruce.	Woodland size; proximity to other significant woodlands; interior habitat; representative of woodland diversity.	WT - >120 AR - >120 OL - 14 UL - >120 SI - >120	14	Yes
WOD-041 Woodland	137.2	FOM	Mixed Forest dominated by white spruce, sugar maple, red pine and Eastern white cedar.	Woodland size; Interior habitat; proximity to other significant woodlands; linkages; water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 21 UL - >120 SI - >120	14	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
WOD-042 Woodland	2.5	FODM7	Fresh-moist lowland deciduous forest dominated by Manitoba maple, sugar maple and black walnut with fewer red pine, oak species and Eastern white pine.	Proximity to other significant woodlands; linkages; water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 15 UL - >120 SI - >120	14	Yes
WOD-043 Woodland	7.7	FODM5	Dry-fresh sugar maple deciduous forest dominated by sugar maple, white ash and black walnut.	Woodland size; proximity to other significant woodlands; linkages; water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 83 UL - >120 SI - >120	14	Yes
WOD-044 Woodland	68.2	FODM5	Dry-fresh sugar maple deciduous forest dominated by sugar maple and white ash.	Woodland size; proximity to other significant woodlands; linkages; water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 29 UL - >120 SI - >120	14	Yes
WOD-045 Woodland	0.8	WOCM1	Dry-fresh coniferous woodland dominated by red pine with some white spruce, Eastern white pine and basswood.	Proximity to other significant woodlands; water protection.	WT - >120 AR - >120 OL - 18 UL - >120 SI - >120	14	Yes
WOD-046 Woodland	5.2	FOCM6	Naturalized coniferous plantation dominated by white spruce, red pine and Eastern white pine.	Woodland size; proximity to other significant woodlands; water protection; representative of woodland diversity.	WT - >120 AR - >120 OL - 21 UL - >120 SI - >120	14	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
WOD-047 Woodland	119.5	WODM3	Fresh-moist mixed woodland dominated by white ash and red pine.	Woodland size; proximity to other significant woodlands; interior habitat; water protection.	WT - >120 AR - >120 OL - 20 UL - >120 SI - >120	15	Yes
WOD-048 Woodland	15.6	WODM4-3	Dominated by sugar maple, white ash, green ash, red oak, willow sp. European buckthorn	Woodland size; interior habitat; water protection.	WT - >120 AR - >120 OL - 46 UL - >120 SI - >120	15	Yes
WOD-049 Woodland	1.6	WODM5	Fresh-moist deciduous woodland dominated by black locust with some silver poplar and red pine.	Proximity to other significant woodlands; water protection.	WT - >120 AR - >120 OL - 20 UL - >120 SI - >120	15	Yes
WOD-050 Woodland	4.4	FODM5-6	Dry-fresh sugar maple – basswood deciduous dominated by sugar maple and basswood with fewer bur oak and silver maple.	Woodland size; representative of woodland diversity.	WT - >120 AR - >120 OL - 12 UL - >120 SI - >120	15	Yes
WOD-051 Woodland	21.0	FODM4-2	Dry-fresh white ash hardwood deciduous forest dominated by white ash and sugar maple.	Woodland size; interior habitat; proximity to other significant woodlands; representative of woodland diversity; water protection.	WT - >120 AR - >120 OL - 7 UL - >120 SI - >120	15	Yes
WOD-052 Woodland	10.6	FOCM6	Naturalized coniferous plantation dominated by white spruce.	Woodland size; interior habitat.	WT - >120 AR - >120 OL - 17 UL - >120 SI - >120	15	Yes
WOD-053 Woodland	25.0	FODM4-2	Dry-fresh white ash – hardwood deciduous forest dominated by	Woodland size; interior habitat; representative of woodland	WT - >120 AR - >120 OL - >120	15	Yes

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
			white ash, sugar maple and white elm.	diversity.	UL - >120 SI - 11.5		
WOD-054 Woodland	1.0	FOCM6	Naturalized coniferous plantation dominated by white spruce and Eastern white cedar.	No known functions.	WT - >120 AR - >120 OL - Overlapping UL - >120 SI - 16	15	Yes
WOD-055 Woodland	11.1	FODM5-5	Dry-fresh sugar maple – hickory deciduous forest dominated by sugar maple and contains shagbark hickory and American beech.	Woodland size; water protection; woodland diversity representation	WT - >120 AR - >120 OL - >120 UL - >120 SI - 16	14, 15	Yes
WOD-056 Woodland	3.0	FOCM6-1	Fresh white pine naturalized coniferous plantation contains only Eastern white pine.	Water protection	WT - >120 AR - >120 OL - 116 UL - >120 SI - >120	14	Yes
WOD-057 Woodland	1.2	FODM5	Dry-fresh sugar maple deciduous forest dominated by sugar maple, white ash and contains American basswood.	Representative woodland diversity	WT - 78 AR - 4 OL - 4 UL - >120 SI - >120	10	Yes

*In instances where underground cabling overlaps with wooded features, the cabling will be horizontally directionally drilled beneath the feature.

In determining the woodland functions, the Ontario Ministry of Natural Resources' *Natural Heritage Assessment* Guide (2010) was consulted and a threshold value of 12.3% was used for the percentage woodland cover in the region, as reported by the Upper Thames River Conservation Authority (2003).

Legend

WT: Wind Turbine
AR: Access Road
OL: Overhead Line
UL: Underground Line
SI: Supporting Infrastructure (i.e. substation, laydown area, interconnection)

7.0 Wetlands

During the Adelaide Wind Energy Centre site investigation, 5 wetland communities were found in natural features that are within 120m of the project location. These wetlands were delineated during site-specific field visits, along with the aid of detailed aerial photography interpretation where site access was not available. The 5 wetlands range in size (0.5-8.1ha), and represent 3 distinct habitat types. Detailed mapping of these wetlands can be seen in Figures 10 to 15. Each of the wetland communities are described in detail below and have been summarized in Table 9.

WET-001a Silver Maple Mineral Deciduous Swamp (SWDM3-2)

This wetland was found to be an inclusion within woodland WOD-001, which was classified as fresh-moist bur oak deciduous forest (FODM9-3). This wetland is 0.9ha in size and is located 40m from proposed wind turbine #T8. Dominant species in this wetland are Freeman's maple, silver maple and bur oak along with wild black currant (*Ribes americanum*), poison ivy and purple stem aster (*Symphotrichum puniceum*).

WET-034 Fresh-Moist Green Ash – Hardwood Lowland Deciduous Forest (FODM7-2)

This 0.5ha mid-age woodland was identified as a fresh-moist green ash – hardwood lowland deciduous forest and is located 97m from a proposed access road. The dominant species in the canopy of this woodland are green ash and shagbark hickory. The sub-canopy is dominated by green ash, Freeman's maple, and shagbark hickory, while the groundcover was not visible from the survey location. This woodland was surveyed roadside on highway 402 due to restricted site access.

WET-037 Fresh-Moist Lowland Deciduous Forest (FODM7)

This 8.1ha woodland was identified as a fresh-moist lowland deciduous forest with a canopy dominated by Freeman's maple, green ash, and white elm. The sub-canopy and understorey are also dominated by Freeman's maple, green ash, and white elm. The dominant groundcover species in this woodland are asters, goldenrods, and common reed grass (*Calamagrostis deschampsoides*). This woodland is located 4m from proposed access roads associated with this project. This woodland was examined from a roadside location on highway 402 due to restricted site access. Due to lack of right-of-entry, substrate sampling could not be conducted; therefore, this woodland is presumed to also be a wetland.

WET-042 Fresh-Moist Lowland Deciduous Forest (FODM7)

This 2.5 ha forest was surveyed from Kerwood Road due to restricted site access. This woodland is located 15m from overhead cabling associated with the project. The canopy is dominated by Manitoba maple (*Acer negundo*), sugar maple, black walnut as well as red pine, oak species, and eastern white pine. The sub-canopy includes Manitoba maple and sugar maple, while the understory consists of eastern red cedar (*Juniperus virginiana*). The groundcover was not discernible from the roadside location. Since right-of-entry was not granted for this property, the substrate could not be sampled; therefore, this woodland is also presumed to be a wetland.

WET-049 – Fresh-Moist Deciduous Woodland (WODM5)

No site access was granted for this site, and based on the plant species observed at this location there is the potential for wetland habitat within this polygon. This 1.6 ha wetland was surveyed from Elginfield Road due to restricted site access. The canopy and sub-canopy are dominated by black locust (*Robinia pseudo-acacia*) and contains silver poplar (*Populus alba*) and red pine. The understory consists of red pine, eastern red cedar and common buckthorn, while the groundcover is dominated by cattail species (*Typha sp.*), goldenrods and grasses. This woodland is located 20m from overhead cabling associated with the project.

Table 9. Summary of Wetlands within 120m of the Adelaide Wind Energy Centre

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location (m)	Figure	EOS Required (Y/N)
WET-001a Wetland	0.9	(SWDM3-2)	Dominant species in this wetland are Freeman’s maple, silver maple and bur oak along with wild black currant, poison ivy and purple stem aster. Wetland type is palustrine.	Short-term water quality improvement.	WT – 40 AR – 65 OL – >120 UL – 65	11	Yes
WET-034 Wetland	0.5	FODM7-2	Dominant species in this wetland are green ash and shagbark hickory with Freeman’s maple. Further species composition could not be discerned due to restricted site access.	Unconfirmed due to restricted site access. Possible short-term water quality improvement.	WT – >120 AR – 97 OL – >120 UL – >120 SI - >120	13	Yes
WET-037 Wetland	8.1	FODM7	Dominant species in this wetland are Freeman’s maple, green ash, and white elm. The dominant groundcover species are asters, goldenrods, and common reed grass. Further species composition could not be discerned due to restricted site access.	Unconfirmed due to restricted site access. Possible high flood attenuation and short-term water quality improvement.	WT – >120 AR – 4 OL – >120 UL – >120 SI - >120	13	Yes
WET-042 Wetland	2.5	FODM7	Dominant species in this wetland are Manitoba maple, sugar maple, black walnut as well as red pine, oak species, and eastern white pine. Further species composition could not be discerned due to restricted site access.	Unconfirmed due to restricted site access. Possible short-term water quality improvement.	WT – >120 AR – >120 OL – 15 UL - >120 SI - >120	14	Yes
WET-049 Wetland	1.6	WODM5	Dominant species in this wetland are black locust and contains silver poplar and red pine. The understory consists of red pine, eastern red cedar and common buckthorn, while the groundcover is dominated by cattail species, goldenrods and grasses.	Unconfirmed due to restricted site access. Possible short-term water quality improvement.	WT – >120 AR – >120 OL – 20 UL - >120 SI - >120	15	Yes

Legend

WT: Wind Turbine
AR: Access Road
OL: Overhead Line

UL: Underground Line
SI: Supporting Infrastructure

8.0 Valleylands

Valleylands are natural areas that occur in a valley or other landform depression that has water flowing through or standing for some period of the year (OMNR 2010).

Valleylands serve as natural drainage systems for watersheds and the significance of these features have been assessed within the context of the overall watershed. The identification of valleylands is largely based on geomorphology and aquatic resources. The St. Clair Region Conservation Authority and Ausable Bayfield Conservation Authority were consulted during the records review phase of the project to determine whether valleylands are present within 120m of the project location.

The Conservation Authorities did not identify any known valleylands within 120m of the project location. Nonetheless, the presence of valleylands was examined during the site investigation phase in order to confirm their absence from within 120m of the project location.

NRSI biologists identified 2 candidate significant valleylands within 120m of the Adelaide project area. Each of these features has been mapped on Figures 10 to 15, and has been summarized in Table 10 below.

VAL-020 – Valleyland

This valleyland was identified to be a fresh-moist Manitoba maple deciduous woodland featuring valley slope topography with a watercourse extending north-south through the woodland. The valleyland also has patches of forb meadow in upland areas. This woodland was examined from a roadside location on Cuddy Drive due to restricted site access. This natural feature is 106.5ha; however, only on a fraction was readily visible from the roadside location, the remainder was examined through aerial photography interpretation. This natural feature is only within 120m of roadside transmission line along Cuddy Drive and it was from this location (WOD-020) where the valleyland was surveyed (see Figure 10). This valleyland is located 4m from underground cabling.

From the survey vantage point, the valley bank gradients were variable, ranging from steep to moderate and the valley was approximately 25m wide. The vegetation in this valleyland community is represented by a canopy dominated by Manitoba maple, white ash, and some willow and silver maple. The sub-canopy is also dominated by Manitoba maple and willow species with some crabapple species and silver maple. Dominant understorey plants in this woodland are Canada goldenrod and other goldenrod species as well as New England aster and other aster species. The dominant groundcover in this community is riverbank

grape. This valleyland will be carried forward to the evaluation of significance phase of this project.

VAL-048 – Valleyland

This valleyland features a stream that runs through the base valleyland with vegetated slopes. The slope gradient is variable throughout the site, ranging from steep to gentle slopes. Additionally, the valley width is variable, spanning between 4m to > 20m. The vegetation in this 15.6ha valleyland is composed of a canopy dominated by green ash and white ash and containing sugar maple, red oak and willow. The sub-canopy contains common buckthorn, green ash, white ash, hawthorn species, American beech and white elm. The understory is made up of common buckthorn, goldenrods, asters and white ash, while the groundcover consists of garlic mustard, aster species, poison ivy, and white ash. This natural area contains three complexes, including a buckthorn deciduous shrub thicket (THDM2-6), a dry-fresh sugar maple-white ash deciduous forest (FODM5-8) and a dry-fresh forb meadow (MEFM1) ecosite. This valleyland is located 46m from overhead cabling. This valleyland will be carried forward to the evaluation of significance phase of this project.

Table 10. Summary of Valleylands within 120m of the Adelaide Wind Energy Centre

Feature ID	Size (ha)	Composition	Attributes	Functions	Closest Distance to Project Location	Figure	EOS Required (Y/N)
VAL-020 Valleyland	106.5	FODM5-3	Fresh-moist Manitoba maple deciduous woodland composed of <i>Acer negundo</i> (Manitoba maple), <i>Fraxinus americana</i> (white ash), as well as some <i>Populus</i> species (willow) and <i>Acer saccharinum</i> (silver maple).	Surface water functions, natural vegetation, linkage function	WT – >120 AR – >120 OL – 4 UL – >120	10	Yes
VAL-048 Valleyland	15.6	WODM4-3	Dominated by sugar maple, white ash, green ash, red oak, willow sp. European buckthorn	Surface water functions, natural vegetation	WT – >120 AR – >120 OL – 46 UL – >120	14	Yes

Legend

WT: Wind Turbine
 AR: Access Road
 OL: Overhead Line
 UL: Underground Line

9.0 Wildlife Habitat

Wildlife habitat as outlined by the SWHTG was examined during the site investigation and is categorized into the following four groups: seasonal concentration areas, rare vegetation communities and specialized wildlife habitat, habitat of species of conservation concern and animal movement corridors. These categories are outlined below and all candidate significant wildlife habitats have been summarized in Table 15 and have been mapped in Figures 16 to 21. Wildlife habitats that were determined to be generalized candidate significant wildlife habitats, according the Appendix D of the Significant Wildlife Habitat Technical Guide (OMNR 2000), are included in Table 15 and have been mapped in Figures 22-27.

9.1 Seasonal Concentration Areas

The Adelaide Wind Energy Centre site investigation involved a thorough assessment of natural areas for seasonal concentration areas for wildlife habitat. Potential habitat for 10 seasonal concentration areas was examined during the site investigation phase of the project. Seasonal concentration areas that did not have any candidate significant wildlife habitat are outlined in Table 11 below, and will not be carried forward to the evaluation of significance phase of this project. Seasonal concentration areas for which there were candidate significant wildlife habitat, are further discussed in Table 14. All candidate significant wildlife habitats have been mapped in Figures 16 to 20.

Table 11. Summary of Seasonal Concentration Areas Not Identified Near the Adelaide Wind Energy Centre

Seasonal Concentration Areas	Present in or within 120m of Project Location	Rationale	Carried Forward to Summary and EOS (Y/N)
Colonial-Nesting Bird Breeding Habitat (swallows)	No	There were no meadow, thicket, savannah, bluff or cliff communities within 120m of the project location that also had banks, steep hills, pits, steep slopes, rock faces or rock piles.	No
Colonial-Nesting Bird Breeding Habitat (tree/shrub)	Yes	Woodlands containing deciduous treed swamp inclusions are present within 120m of the project location; however, none of these sites had nests to demonstrate this habitat is used by colonial-nesting birds.	No
Colonial-Nesting Bird Breeding Habitat (ground)	No	There are no lakes or large rivers providing shoreline habitat or containing rocky island or peninsula features within 120m of the project location.	No
Waterfowl Stopover and Staging Areas (terrestrial)	Yes	Thickets and meadows with significant spring melt water flooding do not exist within 120m of the project location. Data from the Strathroy Area Birding Club indicates that no significant concentrations of waterfowl are known from this area. More suitable stopover habitat exists outside of the project area. This will not be carried forward to the EOS.	No
Waterfowl Stopover and Staging Areas (aquatic)	No	A single meadow marsh, less than 1ha in size, is present within the project area and will not support significant waterfowl numbers. This small area of open water does not provide sufficient foraging habitat in the form of aquatic invertebrates or vegetation. This will not be carried forward to the EOS..	No

Seasonal Concentration Areas	Present in or within 120m of Project Location	Rationale	Carried Forward to Summary and EOS (Y/N)
Waterfowl Nesting Habitat	Yes	There are 4 upland communities associated with wetland communities/open aquatic ponds; however these wetlands and ponds have insufficient open water (<0.5ha) to support significant waterfowl populations and will not be carried forward as candidate significant wildlife habitat.	No
Bat Hibernacula	No	There are no caves, abandoned mine shafts, underground foundations, or crevice/cave communities within 120m of the project location.	No

9.2 Rare Vegetation Communities and Specialized Wildlife Habitat

The Adelaide Wind Energy Centre site investigation involved a thorough assessment of natural areas for rare vegetation communities and specialized wildlife habitat. The general results of this investigation are provided in Tables 12 and 15 below. Table 12 outlines rare vegetation communities and specialized wildlife habitats that were not present during site investigation and will not be carried forward to the evaluation of significance phase of this project. Table 15 provides the results for candidate rare vegetation communities and specialized wildlife habitats that were identified during the site investigation. All potentially significant wildlife habitats have been mapped in Figures 16 to 20.

Table 12. Summary of Rare Vegetation Communities and Specialized Wildlife Habitat Not Identified Near the Adelaide Wind Energy Centre

Wildlife Habitat	Present in or within 120m of Project Location	Rationale	Carried Forward to Summary and EOS (Y/N)
Alvars	No	No level, unfractured, or partially fractured limestone occurs; no patchy mosaics of bare rock pavement, or shallow substrate over limestone bedrock is present within 120m of the project location.	No
Tall-grass Prairies	No	No communities with groundcover dominated by prairie grasses or open tall grass prairie habitat are present within 120m of the project location.	No
Savannahs	No	No tall-grass prairies with 25-60% tree cover occur within 120m of the project location.	No
Talus Slopes	No	No cliffs with rock rubble occur within 120m of the project location.	No
Rock Barrens	No	No sites with exposed bedrock and very shallow soils were present within 120m of the project location.	No
Sand Barrens	No	No exposed sand habitats with sparse vegetation and protruding rock occur within 120m of the project location.	No
Old-growth or Mature Forest Stands	No	No forests that are relatively undisturbed, structurally complex and contain a wide variety of trees and shrubs in various age classes are present within 120m of the project location.	No
Turtle Nesting Habitat	No	There are no areas with sand or fine gravel substrate close to water within 120m of the project location.	No
Turtle-Over-wintering Habitat	No	There are no areas with permanent water bodies, large wetlands, bogs or fens containing adequate dissolved oxygen within 120m of the project location.	No

Wildlife Habitat	Present in or within 120m of Project Location	Rationale	Carried Forward to Summary and EOS (Y/N)
Osprey Nesting and Bald Eagle, Foraging, and Perching Habitat	No	No shorelines on productive water bodies or wetlands close to productive fishing waters are present within 120m of the project location. No nests were found during site investigation.	No
Mink Denning Sites	Yes	Mink habitat is present within 120m of the project location in the form of stream banks and forested wetlands; however, these habitats are disturbed by agricultural activities and the associated water bodies do not support sufficient fish populations. Consequently, there are no mink denning sites that will be carried forward to the EOS.	No
Seeps and Springs	No	No locations where groundwater comes to surface level; no seeps or springs from headwater locations are present within 120m of the project location.	No
Amphibian Breeding Habitat (wetland)	No	No isolated wetland communities (>120m from woodlands) were observed within 120m of the project area	No

¹ Rare forest types were determined by referencing the Ontario Ministry of Natural Resource's *Significant Wildlife Habitat Technical Guide* (2000) Appendix J.

9.3 Habitat of Species of Conservation Concern

Species of conservation concern are often sensitive to a variety of ecological parameters and usually have specialized habitat requirements (OMNR 2000). The identification of habitat of species of conservation concern is important for maintaining the population densities of these species (OMNR 2000). Through the site investigation phase of the Adelaide Wind Energy Centre, NRSI biologists examined natural features for the presence of habitat of species of conservation concern. Habitats of species of conservation concern that were not encountered during site investigation are summarized in Table 13 and will not be carried forward to the evaluation of significance phase of this project. Habitats of species of conservation concern that are present within 120m of the project location are outlined in Table 15.

Table 13. Summary of Habitats of Species of Conservation Concern Not Identified Near the Adelaide Wind Energy Centre

Wildlife Habitat	Present Within 120m of Project Location	Rationale	Carried Forward to Summary and EOS (Y/N)
Marsh Bird Breeding Habitat	No	A single marsh community is present within the Adelaide project area, but it is 0.6ha within limited open water (8%) and cannot support the species associations that would warrant significant consideration.	No
Woodland Area Sensitive Breeding Birds	No	No large, mature forests with interior habitat $\geq 200\text{m}$ from edge with $>4\text{ha}$ of interior habitat within 120m of the project location.	No
Open Country Breeding Bird Habitat	No	No undisturbed meadows or grassland areas $>30\text{ha}$ are present within 120m of the project location.	No
Shrub/Early Successional Bird Breeding Habitat	No	No $>10\text{ha}$ natural field areas succeeding to shrub and thicket habitats are present within 120m of the project location.	No

In conjunction with habitat for species of conservation concern, NRSI biologists have also reviewed the specific habitat considerations of several species of conservation concern that are known to occur within the vicinity of the Adelaide Wind Energy Centre. Species of conservation concern include all species that have been designated as a species of Special Concern according to the Species At Risk in Ontario (SARO) or have been given a provincial S-Rank of S1-S3, but have not been designated as either Endangered or Threatened within Ontario. Species At Risk (provincially Threatened or Endangered) will be addressed separately in an *Approval and Permitting Requirements Document* to address the *Endangered Species Act (2007)*. Many special concern species, S1-S3, and SH species and communities were identified during the records review as potentially being present within 120m of a project location. Habitat searches for these species were conducted as part of the site investigation for the Adelaide Wind Energy Centre. The results of the site investigation relating to these species-specific habitats have been summarized in Table 14.

Table 14. Summary of Special Concern Species, S1-S3 and SH Species and Communities

Species	Habitat Present Within 120m of Project Location	Rationale	Carried Forward to EOS (Y/N)
<i>Asio flammeus</i> (short-eared owl)	Yes	Habitat is present within 120m of the project location in the form of grasslands, open areas and meadows that are grassy or bushy. Four candidate significant raptor wintering areas have been identified within 120m of the project location. Since candidate significant habitat for this species will be carried forward to the EOS, this individual species will not be carried forward or receive separate consideration.	No
<i>Clangula hyemalis</i> (long-tailed duck)	No	Subarctic and arctic wetlands, coastal marine waters and large freshwater lakes. This habitat does not exist within the project location.	No
<i>Seiurus motacilla</i> (Louisiana waterthrush)	No	Steep, forested ravines with fast-flowing streams, woodland swamps or large tracts of deciduous or mixed forests. Habitat does not exist within project location.	No
<i>Allium tricoccum</i> var. <i>burdickii</i> (narrow-leaved wild leek)	Yes	Habitat is present within 120m of the project location in the form of rich woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (June through early August) and this species is also readily identified outside of the flowering period based on other characteristics (see Table 6 for details).	No
<i>Aplectrum hyemale</i> (puttyroot)	Yes	Habitat for this species is present within 120m of the project location in the form of moist deciduous forest; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred after the appropriate flowering period (May to mid-June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Arisaema dracontium</i> (green dragon)	Yes	Habitat for this species occurs within 120m of the project location in the form of wet bottomlands along creeks; however, this species was	No

Species	Habitat Present Within 120m of Project Location	Rationale	Carried Forward to EOS (Y/N)
		not observed in candidate habitat within 120m of the project location during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (May to June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	
<i>Aristida longespica</i> var. <i>longespica</i> (slim-spiked three-awned grass)	No	No dry to moist sandy fields have been identified within 120m of the Adelaide project location.	No
<i>Astragalus neglectus</i> (Cooper's milk-vetch)	Yes	Habitat for this species is present within 120m of the project location in the form of open woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Carex trichocarpa</i> (hairy-fruited sedge)	Yes	Habitat is present within 120m of the project location in the form of riverbanks; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (June to August).	No
<i>Conioselinum chinense</i> Chinese Hemlock Parsley	Yes	Habitat is present within 120m of the project location in the form of wet borders of streams and damp roadsides; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (August to September).	No
<i>Coreopsis tripteris</i> (tall tickweed)	Yes	Habitat for this species exists in the form of thickets and open woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (July to September).	No

Species	Habitat Present Within 120m of Project Location	Rationale	Carried Forward to EOS (Y/N)
<i>Diarrhena obovata</i> (ovate beak grass)	Yes	Habitat is present within 120m of the project location in the form of riparian woodlands; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (June to October).	No
<i>Erigenia bulbosa</i> (harbinger-of-spring)	Yes	Habitat is present within 120m of the project location in the form of rich, moist deciduous woods and stream banks; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (March to May). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Euonymus atropurpureus</i> (burning bush)	Yes	Habitat is present within 120m of the project location in the form of dry to moist thickets and woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Fraxinus profunda</i> (pumpkin ash)	Yes	Habitat is present within 120m of the project location in the form of moist woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (April to May). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Gentianella quinquefolia</i> (stiff gentian)	Yes	Habitat is present within 120m of the project location in the form of moist roadsides, stream banks and edges of woods; however, this species was not observed in candidate habitat within 120m of the project location	No

Species	Habitat Present Within 120m of Project Location	Rationale	Carried Forward to EOS (Y/N)
		during ELC area searches. Surveys for this species occurred during the appropriate flowering period (August to October).	
<i>Hypericum prolificum</i> (shrubby St. John's-wort)	Yes	Habitat is present within 120m of the project location in the form of old fields, meadows, and open forested habitats; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (July to September).	No
<i>Liatris aspera</i> (tall blazing star)	Yes	Habitat is present within 120m of the project location in the form of dry roadsides; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (August to October).	No
<i>Lithospermum latifolium</i> (American gromwell)	Yes	Habitat is present within 120m of the project location in the form of open areas near edges of woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (May to June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Lythrum alatum</i> (winged loosestrife)	Yes	Habitat is present within 120m of the project location in the form of wet meadows and open woods; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (July to September).	No
<i>Muhlenbergia tenuiflora</i> (slim-flowered muhly)	Yes	Habitat is present within 120m of the project location in the form of rich, deciduous forests; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (fall).	No

Species	Habitat Present Within 120m of Project Location	Rationale	Carried Forward to EOS (Y/N)
<i>Phlox subulata</i> (moss phlox)	No	Dry sandy and rocky woods do not occur within 120m of the project location.	No
<i>Pycnanthemum tenuifolium</i> (slender mountain-mint)	Yes	Habitat is present within 120m of the project location in the form of dry open areas; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (July to September).	No
<i>Solidago riddellii</i> (Riddell's goldenrod)	Yes	Habitat occurs within 120m of the project location in the form of old fields; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (August to October).	No
<i>Triosteum perfoliatum</i> (perfoliate tinkersweed)	No	Dry sandy and rocky woods are not present within 120m of the project location. Surveys for this species occurred after the appropriate flowering period (May to June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No
<i>Vernonia gigantean</i> (giant ironweed)	Yes	Habitat is present within 120m of the project location in the form of thickets, moist woods, roadsides and grassy meadows; however, this species was not observed in candidate habitat within 120m of the project location during ELC area searches. Surveys for this species occurred during the appropriate flowering period (August to September).	No
<i>Viola striata</i> (striped cream violet)	Yes	Rich, floodplain forests and low, wet woods are present within 120m of the project location; however, this species was not observed in candidate habitat during ELC area searches. At many locations, surveys for this species occurred after the appropriate flowering period (April to June). However, the distinctive structure of this species makes it readily identifiable after blooming occurs (see Table 6 for details).	No

Species	Habitat Present Within 120m of Project Location	Rationale	Carried Forward to EOS (Y/N)
<i>Microtus pinetorum</i> (woodland vole)	Yes	Habitat is present within 120m of the project location in the form of mid-age to mature deciduous forest, grasslands and meadows; however, this species was not observed during any candidate habitat surveys conducted within 120m of the project location.	No
<i>Asterocampa clyton</i> (tawny emperor)	No	No open woodlands and roadsides where hackberry occurs are present within 120m of the project location.	No

Provincial Rank (S-Rank)

S1: Critically Imperiled
S2: Imperiled
S3: Vulnerable
S4: Apparently Secure
SH: Historic

COSEWIC and SARO Status

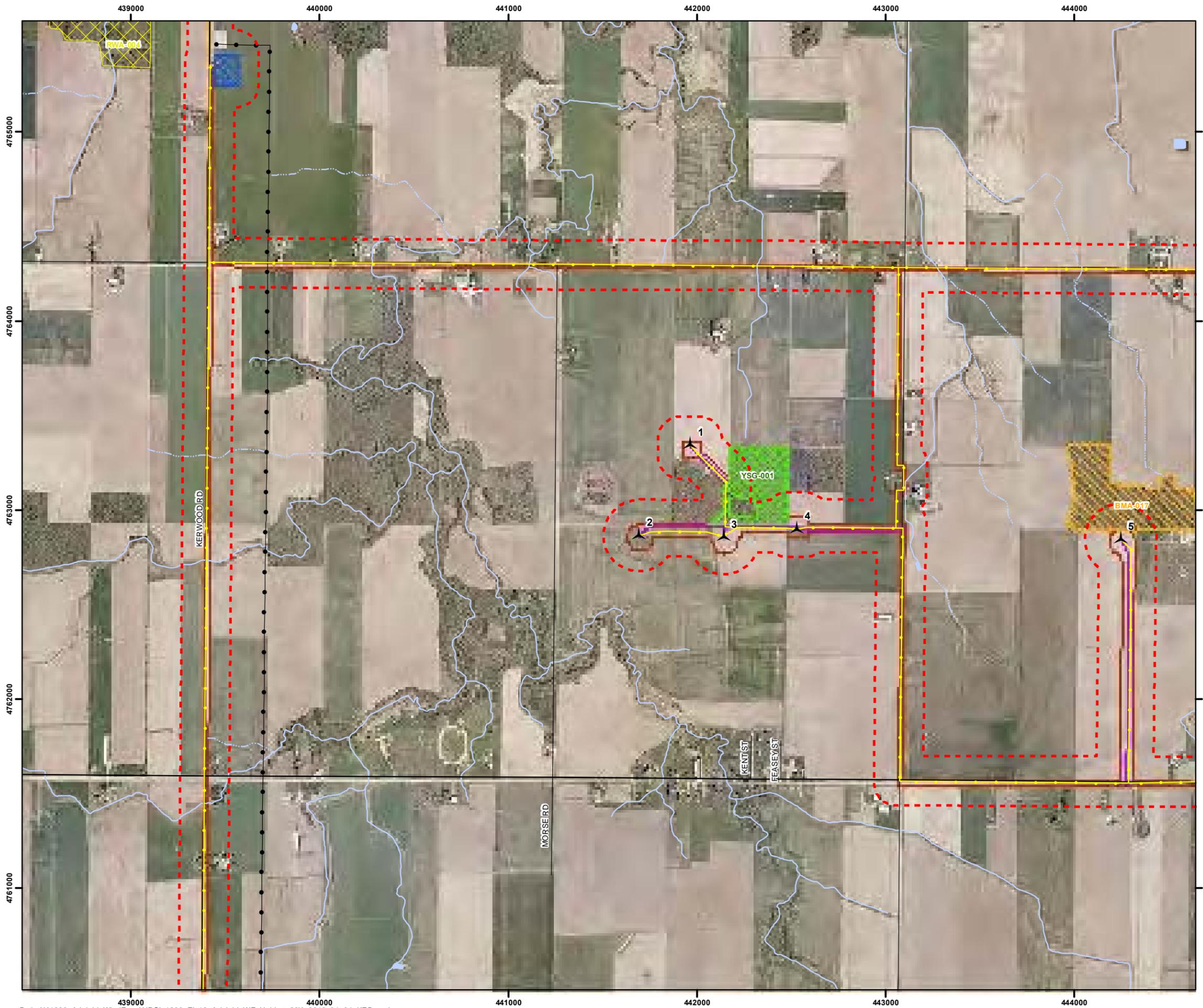
END: Endangered
THR: Threatened
SC: Special Concern
NAR: Not at Risk

9.4 Animal Movement Corridors

The records review process did not reveal any known animal movement corridors within 120m of the project location. The detailed site investigation confirmed the presence of several linear features, including treed fencerows and naturalized drains, within 120m of the project location, which have the potential to act as animal movement corridors. These features were examined during the site investigation and compared with the other appropriate wildlife habitats that may suggest the presence of animal movement corridors. Specifically, NRSI biologists examined potential amphibian breeding habitats for potential corridors as per the criteria outlined in Ontario Ministry of Natural Resources' *Significant Wildlife Habitat Technical Guide* (2000) and the *2011 Addendum* (OMNR 2011c). No candidate suitable corridors were found during site investigation due to the interruption of habitat in the landscape by agricultural fields and roads; however, if significant amphibian breeding habitat is found to occur within 120m of the project location, the presence of amphibian movement corridors will be re-examined.

Figure 16

Adelaide Wind Energy Centre Wildlife Habitat - Northwest



- Legend**
- Project Area (120m)
 - Project Location
 - Turbine
 - Point of Common Coupling (PCC)
 - Access Road
 - Collector System
 - Transmission Line
 - Staging Area
 - Interconnection Facilities
 - Substation
 - Existing Transmission Line
 - Railroad
 - Highway
 - Primary Road
 - Secondary Road
 - Permanent Watercourse
 - Intermittent Watercourse
 - Waterbody
 - Bat Maternity Colony (BMA)
 - Raptor Wintering Area (RWA)
 - Yellow Stargrass (YSG)



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Project: 1230 Date: April 4, 2012	NAD83 - UTM Zone 17 Scale: 1:20,000 (11x17")
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