Sampling Point: 66-W003-1W

				Dominance Test worksheet:	
	Abaaluta	Dominant	Indiactor	Number of Dominant Species	(A)
Tree Stratum (Plot size: 30 feet )	Absolute	Dominant	Indicator Status	That Are OBL, FACW, or FAC: 4	(A)
Tree Stratum (Plot size: <u>30 feet</u> ) 1.	% Cover	Species?	Status	Total Number of Dominant	
0					(D)
				Species Across All Strata: 4	(B)
				Demonst of Deminent Creation	
4				Percent of Dominant Species	
5				That Are OBL, FACW, or FAC: 100.0	(A/B)
6 7				Prevalence Index worksheet:	
7	0	= Total Cov	er	Total % Cover of: Multiply by:	
50% of total cover: 0		of total cover:		OBL species 0 x 1 = 0	-
Sapling/Shrub Stratum (Plot size: 15feet )	20700			FACW species 60 x 2 = 120	-
				FAC species 30 x 3 = 90	-
1				FACU species 0 x 4 = 0	-
2				UPL species $0 \times 5 = 0$	-
3				Column Totals: 90 (A) 210	(B)
					_ (=)
5				Prevalence Index = B/A = 2.33	
6					
7 8.				Hydrophytic Vegetation Indicators:	
				1 - Rapid Test for Hydrophytic Vegetation	
9		- Total Car		X 2 - Dominance Test is >50%	
FOO/ of total according to	0	= Total Cov		X 3 - Prevalence Index ≤3.0 <sup>1</sup>	
50% of total cover: <u>0</u>	20% 0	of total cover:	0	4 - Morphological Adaptations <sup>1</sup> (Provide supportin	ng
Herb Stratum (Plot size: 5 feet )	05	<b>M</b>	540	Problematic Hydrophytic Vegetation <sup>1</sup> (Explain )	
Symphyotrichum prenanthoides / Crooked-stem american-as     Substantia / Dreadth additional		Yes	FAC		
2. <u>Solidago gigantea / Smooth goldenrod</u>	20	Yes	FACW	<sup>1</sup> Indicators of hydric soil and wetland hydrology must	
3. <u>Carex / Sedge</u>	15	Yes	FACW	be present, unless disturbed or problematic.	
4. <i>Eutrochium maculatum /</i> Spotted trumpetweed	15	Yes	FACW		
5. Impatiens capensis / Spotted jewelweed		No	FACW	Definitions of Four Vegetation Strata	
6. <i>Toxicodendron radicans /</i> Eastern poison ivy	5	No	FAC		
7				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) of	
8				more in diameter at breast height (DBH), regardless o height.	f
9				neight.	
10					
11				Sapling/Shrub - Woody plants, excluding vines, less	
	90	= Total Cov		than 3 in. DBH and greater than or equal to 3.28 ft (1 tall.	m)
50% of total cover: 45	20% (	of total cover:	18		
Woody Vine Stratum (Plot size:)					
1				Herb - All herbaceous (non-woody) plants, regardless	of
2				size, and woody plants less than 3.28 ft tall.	
3					
4				Woody vines - All woody vines greater than 3.28 ft in	
5				height.	
	0	= Total Cov			
50% of total cover: 0	20% (	of total cover:	0	Hydrophytic	
				Vegetation	
				Present?         Yes         X         No	
Remarks: (Include photo numbers here or on a separate sheet.)				-	
international and a separate sheet.)					

inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-10	10YR 5/1	95	10YR 4/4	5	C	PL,M	Silty Clay	
ype: C=Cc	ncentration, D=Depletic	n, RM=Red	uced Matrix, MS=Mas	ked Sand G	rains.		2Location: Pl	=Pore Lining, M=Matrix.
Histoso Histic E Black H Hydrog Stratifie 2 cm M Deplete Thick D Sandy I	pipedon (A2) listic (A3) en Sulfide (A4) ed Layers (A5) uck (A10) <b>(LRR N)</b> ed Below Dark Surface (A Park Surface (A12) Mucky Mineral (S1)	A11)	Thin Dark 4 Loamy Gle X Depleted N Redox Dar Depleted D Redox Dep Iron-Manga	Below Surfac Surface (S9) eyed Matrix ( Matrix (F3) rk Surface (F Dark Surface pressions (F8 anese Masso	) <b>(MLRA 1</b> F2) (6) (F7) 8)	-		oblematic Hydric Soils <sup>3</sup> : ck (A10) (MLRA 147) airie Redox (A16) A 147, 148) Floodplain Soils (F19) A 136, 147) Ilow Dark Surface (TF12) plain in Remarks)
Sandy Sandy	I, <b>MLRA 147,148)</b> Gleyed Matrix (S4) Redox (S5) d Matrix (S6)		Piedmont I	I <b>LRA 136)</b> rface (F13) Floodplain S it Material (F	oils (F19) <b>(</b> I	MLRA 148)	wetland h	nydrophytic vegetation and ydrology must be present. sturbed or problematic.
Туре:	Layer (if observed):						Hydric Soil Present	? Yes X No

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry County	Sampling Da	ate: 05/24/2023
Applicant/Owner:	Avangrid Renewables, L		State: Ke	entucky Sampling Po	oint: 66-W004-1U
Investigator(s):	JB SB	Section, Township, R	ange:	City of Hazard	
Landform (hillslope, terrace, etc	): Terrace	Local relief (concave,	convex, none):	concave	Slope (%): 0-5
Subregion (LRR or MLRA):	LRR N Lat:	37.29475	Long: -8	33.2531445	Datum: WGS 84
Soil Map Unit Name:	Shelocta-Cutshin-Gilpin complex, 20 to 7	75 percent slopes, very	stony NWI c	lassification:	
Are climatic / hydrologic condition	ons on the site typical for this time of year?	Yes X No	(If no, explain i	n Remarks.)	
Are Vegetation, Soil	, or Hydrologysignificant	ly disturbed?	Are "Normal Circumstance	es" present? Yes	X No
	, or Hydrologynaturally p		(If needed, explain any a		
SUMMARY OF FINDING	S - Attach site map showing san	npling point locat	ions, transects, imp	oortant features, e	etc.
Hydrophytic Vegetation Prese	ent? Yes <u>No X</u>	_			
Hydric Soil Present?	Yes NoX	Is the San	npled Area		
Wetland Hydrology Present?	Yes NoX	within a V	/etland? Ye	es No	X
	ntained residential property.				
HYDROLOGY					
Wetland Hydrology Indicato					
`	of one required: check all that apply)			dary Indicators (minimu	
Surface Water (A1)	—	Plants (B14)		urface Soil Cracks (B6)	
High Water Table (A2)		ulfide Odor (C1)		parsely Vegetated Conc	cave Surface (B8)
Saturation (A3) Water Marks (B1)		izospheres on Living Ro Reduced Iron (C4)		rainage Patterns (B10) oss Trim Lines (B16)	
Sediment Deposits (B2)		Reduction in Tilled Soils		y-Season Water Table	(C2)
Drift Deposits (B3)	Thin Muck St		· · ·	ayfish Burrows (C8)	(02)
Algal Mat or Crust (B4)		in in Remarks)		aturation Visible on Aer	ial Imagery (C9)
Iron Deposits (B5)				unted or Stressed Plan	
Inundation Visible on Ae	rial Imagery (B7)		Ge	eomorphic Position (D2	2)
Water-Stained Leaves (E	39)		Sh	nallow Aquitard (D3)	
Aquatic Fauna (B13)			Mi	icrotopographic Relief (	(D4)
			FA	AC-Neutral Test (D5)	
Field Observations:					
Surface Water Present?	Yes No X Depth (inch	165).			
Water Table Present?	Yes No X Depth (inch				
Saturation Present?	Yes No X Depth (inch	·	Wetland Hydrology P	resent? Yes	No X
(includes capillary fringe)		, <u> </u>			
Describe Recorded Data (stre	eam gauge, monitoring well, aerial photos, p	previous inspections), if	available:		
Remarks:					

	Sampling Point:	66-W004-1U

				Dominance Test worksheet:
				Number of Dominant Species
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC: 1 (A)
Tree Stratum (Plot size: 30 feet )	% Cover	Species?	Status	
1				Total Number of Dominant
2.				Species Across All Strata: 3 (B)
				Demonstrat Demois and One size
4.				Percent of Dominant Species
5				That Are OBL, FACW, or FAC: 33.3 (A/B)
6				
7				Prevalence Index worksheet:
	0	= Total Cove	r	Total % Cover of: Multiply by:
50% of total cover: 0	20% c	of total cover:	0	OBL species 0 x 1 = 0
Sapling/Shrub Stratum (Plot size: 15 feet )				FACW species 10 x 2 = 20
				FAC species 30 x 3 = 90
1				FACU species 70 x 4 = 280
2				UPL species $0 \times 5 = 0$
3				· · · · · · · · · · · · · · · · · · ·
4				Column Totals: <u>110</u> (A) <u>390</u> (B)
5				
6.				Prevalence Index = B/A = 3.55
7.				
8.				Hydrophytic Vegetation Indicators:
9.				1 - Rapid Test for Hydrophytic Vegetation
J	0	= Total Cove		2 - Dominance Test is >50%
				3 - Prevalence Index ≤3.0 <sup>1</sup>
50% of total cover: 0	20% c	of total cover:	0	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
Herb Stratum (Plot size: 5 feet )				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain )
1. Symphyotrichum prenanthoides / Crooked-stem american-as	30	Yes	FAC	
2. Rubus allegheniensis / Allegheny blackberry	25	Yes	FACU	Indiantary of hudric coll and watered hudrology much
3. Miscanthus sinensis / Chinese silvergrass	25	Yes	FACU	<sup>1</sup> Indicators of hydric soil and wetland hydrology must
4. Solidago canadensis / Canada goldenrod	20	No	FACU	be present, unless disturbed or problematic.
5. Solidago gigantea / Smooth goldenrod	10	No	FACW	Definitions of French Venetation Ofersta
			171011	Definitions of Four Vegetation Strata
6		·		
7				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) or
8				more in diameter at breast height (DBH), regardless of
9				height.
10				
11.				Sapling/Shrub - Woody plants, excluding vines, less
	110	= Total Cove	r	than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 55	20% (	of total cover:	22	tall.
Woody Vine Stratum (Plot size: )				
· · · · · · · · · · · · · · · · · · ·				
1				Herb - All herbaceous (non-woody) plants, regardless of
2				size, and woody plants less than 3.28 ft tall.
3				
4				Woody vines - All woody vines greater than 3.28 ft in
5				height.
	0	= Total Cove	r	
50% of total cover: 0	20% (	of total cover:	0	Hydrophytic
				Vegetation
				-
				Present?         Yes         No         X
Remarks: (Include photo numbers here or on a separate sheet.)	)			

US Army Corps of Engineers

J	v	ᄂ

Depth	Matrix			x Features					
nches) 0-3	Color (moist) 2.5Y 4/2	<u>%</u> 100	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture Loam	Remarks	S
pe: C=Cor	ncentration, D=Depletic	on, RM=Redu	uced Matrix, MS=Mas	ked Sand Gra	·		²Location: PL	=Pore Lining, M=	=Matrix.
	ndicators:						Indicators for Pro	-	
Histosol	· ,		Dark Surfa	. ,	(			(A10) <b>(MLRA</b>	•
	pipedon (A2)			Below Surface	• • •	-		irie Redox (A16)	1
	stic (A3)			Surface (S9)	•	7, 148)	•	. 147, 148)	
	en Sulfide (A4)		_ '	eyed Matrix (F	2)			Floodplain Soils	(F19)
Stratified	d Layers (A5)		Depleted N	/latrix (F3)				136, 147)	
2 cm Mu	ıck (A10) <b>(LRR N)</b>			k Surface (F6	,			ow Dark Surface	. ,
Depleted	d Below Dark Surface (A	A11)	Depleted D	Dark Surface (	F7)		Other (Exp	olain in Remarks	;)
Thick Da	ark Surface (A12)			pressions (F8)					
Sandy M	lucky Mineral (S1)		Iron-Manga	anese Masses	s (F12)				
(LRR N,	MLRA 147,148)		(LRR N, M	LRA 136)					
Sandy G	Bleyed Matrix (S4)		Umbric Su	rface (F13) <b>(</b> I	MLRA 136	, 122)	<sup>3</sup> Indicators of h	ydrophytic veget	tation and
Sandy R	Redox (S5)		Piedmont F	Floodplain Soi	ils (F19) <b>(N</b>	/ILRA 148)	wetland h	/drology must be	e present.
Stripped	Matrix (S6)		Red Paren	t Material (F2	1) <b>(MLRA</b>	. 127, 147)	unless dis	turbed or problei	matic.
estrictive L	ayer (if observed):								
Type:									
Depth (in	ches):						Hydric Soil Present?	Yes	NoX
emarks:	Gravel refusal.								

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry	County	Sampling Date:	05/24/2023
Applicant/Owner:	Avangrid Renewables, I			ate: Kentucky	Sampling Point:	66-W004-1W
Investigator(s):	JB SB	Section, Township, F	Range:	Cit	y of Hazard	
Landform (hillslope, terrace, etc	:): Hill seep	Local relief (concave	e, convex, none):	concav	e Slope	(%): 30-40
Subregion (LRR or MLRA):	LRR N Lat:	37.294718	Long:	-83.253162	2 Datum	n: WGS 84
Soil Map Unit Name:	Shelocta-Cutshin-Gilpin complex, 20 to 7	75 percent slopes, very	y stony	NWI classification	on:	
	ons on the site typical for this time of year?	Yes X N	o (lf no,	explain in Remark	s.)	
Are Vegetation , Soil	, or Hydrologysignificant	ly disturbed?	Are "Normal Circ	cumstances" prese	nt? Yes X	( No
	, or Hydrology naturally p		(If needed, expla	ain any answers in	Remarks.)	
SUMMARY OF FINDING	S - Attach site map showing san	npling point loca	tions, transec	ts, important	features, etc.	
Hydrophytic Vegetation Prese	ent? Yes X No					
Hydric Soil Present?	Yes X No		mpled Area			
Wetland Hydrology Present?			Wetland?	Yes X	No	
Remarks: Hill seep is cauç	ght in man made ditch that flows into an inte	ermittent stream.				
L HYDROLOGY						
Wetland Hydrology Indicato						
	of one required: check all that apply)			Secondary Indica	ators (minimum of t	wo required)
X Surface Water (A1)		Plants (B14)			Cracks (B6)	wo required)
X High Water Table (A2)		ulfide Odor (C1)			getated Concave S	Surface (B8)
X Saturation (A3)		izospheres on Living R	Roots (C3)		atterns (B10)	
Water Marks (B1)		Reduced Iron (C4)		Moss Trim L		
Sediment Deposits (B2)		Reduction in Tilled Soil	ls (C6)		Water Table (C2)	
Drift Deposits (B3)	Thin Muck S			Crayfish Bu	( )	
Algal Mat or Crust (B4)		in in Remarks)			isible on Aerial Ima	agery (C9)
Iron Deposits (B5)					Stressed Plants (D1	,
Inundation Visible on Ae	rial Imagery (B7)				Position (D2)	,
Water-Stained Leaves (				Shallow Aqu		
Aquatic Fauna (B13)				Microtopogr	aphic Relief (D4)	
				X FAC-Neutra	I Test (D5)	
			1			
Field Observations:		\				
Surface Water Present?	Yes X No Depth (inch					
Water Table Present?	Yes X No Depth (inch					N
Saturation Present?	Yes X No Depth (inch	nes): 0	Wetland Hydi	rology Present?	Yes X	No
(includes capillary fringe)						
Describe Recorded Data (stre	eam gauge, monitoring well, aerial photos, r	previous inspections),	if available:			
Remarks:						

Sampling Point: 66-W004-1W

				Dominance Test worksheet:
				Number of Dominant Species
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC: <u>4</u> (A)
Tree Stratum (Plot size: 30 feet )	% Cover	Species?	Status	
1				Total Number of Dominant
2.				Species Across All Strata: 4 (B)
3.				
4.		-		Percent of Dominant Species
				That Are OBL, FACW, or FAC: 100.0 (A/B)
0				Prevalence Index worksheet:
/				Total % Cover of: Multiply by:
	0	= Total Cov		$\frac{1}{\text{OBL species}} \frac{1}{10} \text{ x } 1 = 10$
	20% (	of total cover:	0	· · · · · · · · · · · · · · · · · · ·
Sapling/Shrub Stratum (Plot size: 15 feet )				FACW species 80 x 2 = 160
1. <u>Salix / Willow</u>	10	Yes	FACW	FAC species 10 x 3 = 30
2				FACU species <u>3</u> x 4 = <u>12</u>
3				UPL species 0 x 5 = 0
4.				Column Totals: 103 (A) 212 (B)
5.				
6.				Prevalence Index = B/A = 2.06
0				
<i>1.</i>				Hydrophytic Vegetation Indicators:
8				X 1 - Rapid Test for Hydrophytic Vegetation
9				X 2 - Dominance Test is >50%
	10	= Total Cov	er	X 3 - Prevalence Index $\leq 3.0^{1}$
50% of total cover: 5	20% (	of total cover:	2	
Herb Stratum (Plot size: 5 feet )				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
1. Impatiens capensis / Spotted jewelweed	30	Yes	FACW	Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
2. Solidago gigantea / Smooth goldenrod	20	Yes	FACW	
3. Carex / Sedge	20	Yes	FACW	<sup>1</sup> Indicators of hydric soil and wetland hydrology must
	10			be present, unless disturbed or problematic.
4. <u>Scirpus atrovirens / Green bulrush</u>		No	OBL	
5. <u>Symphyotrichum prenanthoides / Crooked-stem american-as</u>		No	FAC	Definitions of Four Vegetation Strata
6. Trifolium pratense / Red clover	3	No	FACU	
7				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) or
8				more in diameter at breast height (DBH), regardless of
9				height.
10				
11.				Sapling/Shrub - Woody plants, excluding vines, less
	93	= Total Cov	er	than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 46		of total cover:		tall.
	20 /0 0		19	
Woody Vine Stratum (Plot size: 30 feet )				
1				Herb - All herbaceous (non-woody) plants, regardless of
2				size, and woody plants less than 3.28 ft tall.
3			<u> </u>	
4.				Woody vines - All woody vines greater than 3.28 ft in
5.				height.
	0	= Total Cov	er	
50% of total cover: 0		of total cover:		Hydrophytic
	20700			Vegetation
				Present? Yes X No
Remarks: (Include photo numbers here or on a separate sheet.)	)			

US Army Corps of Engineers

SOIL	J	Ο	I	L
------	---	---	---	---

epth	Matrix		Redox	Features				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-12	10YR 3/1	80	10YR 4/1	15	D	М	Silty Clay	
0-12			10YR 4/4	5	С	М	Silty Clay	
12-18	10YR 5/2	90	10YR 6/6	10	C	М	Clay	
ype: C=Cor	centration, D=Depletio	n, RM=Redu	ced Matrix, MS=Mask	ed Sand Gr	ains.		²Location:	PL=Pore Lining, M=Matrix.
ydric Soil lı	ndicators:						Indicators for	Problematic Hydric Soils <sup>3</sup> :
Histosol	(A1)		Dark Surfac	e (S7)			2 cm M	luck (A10) <b>(MLRA 147)</b>
Histic Ep	pipedon (A2)		Polyvalue B	elow Surfac	e (S8) (ML	.RA 147, 1	48) Coast F	Prairie Redox (A16)
Black His	stic (A3)		Thin Dark S	urface (S9)	(MLRA 14	7, 148)	(ML	RA 147, 148)
Hydroge	n Sulfide (A4)		Loamy Gley	ed Matrix (F	-2)		Piedmo	ont Floodplain Soils (F19)
Stratified	l Layers (A5)		Depleted Ma	atrix (F3)			(ML	RA 136, 147)
2 cm Mu	ck (A10) <b>(LRR N)</b>		X Redox Dark	Surface (F	6)		Very SI	nallow Dark Surface (TF12)
Depleted	Below Dark Surface (A	A11)	Depleted Da	ark Surface	(F7)		Other (	Explain in Remarks)
_ Thick Da	irk Surface (A12)		Redox Depr	essions (F8	5)			
<b>-</b>	lucky Mineral (S1)		Iron-Mangar	nese Masse	es (F12)			
Sandy M	MLRA 147,148)		(LRR N, ML	RA 136)				
- '	leyed Matrix (S4)		Umbric Surf	ace (F13)	(MLRA 136	, 122)	<sup>3</sup> Indicators o	of hydrophytic vegetation and
(LRR N,			Piedmont Fl	oodplain So	oils (F19) <b>(N</b>	ILRA 148)	wetland	hydrology must be present.
(LRR N, Sandy G	edox (S5)		<u> </u>	Matorial (F	21) <b>(MLRA</b>	, 127, 147)	unless	disturbed or problematic.
(LRR N, Sandy G Sandy R	•		Red Parent		, <b>.</b>			
(LRR N, Sandy G Sandy R Stripped estrictive L	edox (S5)		Red Parent		, ,			
(LRR N, Sandy G Sandy R Stripped	edox (S5) Matrix (S6) ayer (if observed):		Red Parent				Hydric Soil Prese	nt? Yes X No

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Cour	nty	Sampling Date:	04/12/2022
Applicant/Owner:	Avangrid Renewables, L		· · · ·		Sampling Point: 1	14-W001/
Investigator(s):	CM, RMS, JK	Section, Township, R			of Hazard	05-W001-1U
Landform (hillslope, terrace, etc):	Terrace	Local relief (concave,		concave		(%): 2-5
Subregion (LRR or MLRA):	LRR N Lat:	37.290537		-83.3100725		. ,
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 per			NI classificatio	n:	
Are climatic / hydrologic condition	s on the site typical for this time of year?			ain in Remarks	5.)	
	, or Hydrology significant		Are "Normal Circums			X No
Are Vegetation , Soil			(If needed, explain ar	ny answers in I	Remarks.)	
	- Attach site map showing san		ions, transects, i	important f	eatures, etc.	
Hydrophytic Vegetation Present	t? Yes No X	· · · ·	i	•		
Hydric Soil Present?	Yes No X	— Is the Sar	npled Area			
Wetland Hydrology Present?	Yes No X		•	Yes	No X	
Remarks:		<u> </u>				
L HYDROLOGY						
Wetland Hydrology Indicators						]
	•. f one required: check all that apply)		Sec	condary Indica	tors (minimum of t	wo required)
Surface Water (A1)		Plants (B14)		Surface Soil		no roquirou)
High Water Table (A2)		ulfide Odor (C1)		•	getated Concave S	Surface (B8)
Saturation (A3)		izospheres on Living Ro	oots (C3)	Drainage Pa		
Water Marks (B1)		Reduced Iron (C4)		Moss Trim Li		
Sediment Deposits (B2)	Recent Iron F	Reduction in Tilled Soils	s (C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck St	urface (C7)		Crayfish Bur	rows (C8)	
Algal Mat or Crust (B4)	Other (Expla	in in Remarks)		Saturation V	isible on Aerial Ima	agery (C9)
Iron Deposits (B5)				Stunted or S	tressed Plants (D1	1)
Inundation Visible on Aeria	al Imagery (B7)		_	Geomorphic	Position (D2)	
Water-Stained Leaves (B9	))		_	Shallow Aqu	itard (D3)	
Aquatic Fauna (B13)			_	Microtopogra	aphic Relief (D4)	
				FAC-Neutral	Test (D5)	
Field Observations:						
Surface Water Present?	Yes No X Depth (inch	ies):				
Water Table Present?	Yes No X Depth (inch	·				
Saturation Present?	Yes No X Depth (inch	,	Wetland Hydrolog	y Present?	Yes	No X
(includes capillary fringe)		,				
Describe Recorded Data (strea	m gauge, monitoring well, aerial photos, p	previous inspections), if	available:			
Remarks:						

Sampling Point: 14-W001/05-W001-1U

	Absolute	Dominant	Indicator	Dominance Test worksheet:           Number of Dominant Species           That Are OBL, FACW, or FAC:         0         (A)
Tree Stratum (Plot size: 30)	<u>% Cover</u>	Species?	Status	That Are OBL, FACW, or FAC: (A)
1. Fagus / Beech	5	Yes	NI	Total Number of Dominant
2. Juniperus / Juniper	2	Yes	NI	Species Across All Strata: 4 (B)
3				
4				Percent of Dominant Species
5.				That Are OBL, FACW, or FAC: 0.0 (A/B)
6.				
7.		-		Prevalence Index worksheet:
	7	= Total Cove	er	Total % Cover of: Multiply by:
50% of total cover: 3	-	of total cover:		OBL species 0 x 1 = 0
Sapling/Shrub Stratum (Plot size: 15 )			<u> </u>	FACW species 0 x 2 = 0
1. Rosa multiflora / Multiflora rose, Multiflora rosa	30	Yes	FACU	FAC species 0 x 3 = 0
2. Alnus / Alder	10	Yes	NI	FACU species 30 x 4 = 120
				UPL species 17 x 5 = 85
3				Column Totals: 47 (A) 205 (B)
4				
5 6				Prevalence Index = B/A =4.36
7				Hudranhutia Varatatian Indiastara
8				Hydrophytic Vegetation Indicators:
9.				1 - Rapid Test for Hydrophytic Vegetation
	40	= Total Cov	ər	2 - Dominance Test is >50%
50% of total cover: 20		of total cover:		3 - Prevalence Index ≤3.0 <sup>1</sup>
Herb Stratum (Plot size: 5 )				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
1		-		
2				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
3		-		be present, unless disturbed or problematic.
4				
5 6				Definitions of Four Vegetation Strata
7				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) or
8				more in diameter at breast height (DBH), regardless of
9				height.
10				
11.		_		Sapling/Shrub - Woody plants, excluding vines, less
	0	= Total Cov	ər	than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 0		of total cover:		tall.
	20 /0 0		0	
Woody Vine Stratum (Plot size: 30 )				
1				Herb - All herbaceous (non-woody) plants, regardless of
2			·	size, and woody plants less than 3.28 ft tall.
3				
4				Woody vines - All woody vines greater than 3.28 ft in
5				height.
	0	= Total Cove	er	
50% of total cover: 0	20% (	of total cover:		Hydrophytic
			· · · · · ·	Vegetation
				Present? Yes No X
Remarks: (Include photo numbers here or on a separate sheet.	.)			

Depth	Matrix		Redox	Features							
inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture		Remark	s	
0-18	10YR 5/3	80	7.5YR 5/8	20	<u> </u>	M	Slty Clay Loam	Gravel, fil	l material		
					·						
				·	·						
pe: C=Cor	centration, D=Depletion	n, RM=Redu	iced Matrix, MS=Mask	ed Sand Gr	ains.		²Loca	tion: PL=P	ore Lining, M:	=Matrix.	
dric Soil I	ndicators:						Indicators	for Probl	ematic Hydri	c Soils³:	
Histosol	(A1)		Dark Surface	ce (S7)			20	cm Muck (/	A10) <b>(MLRA</b>	147)	
Histic Ep	vipedon (A2)		Polyvalue E	Below Surfa	ce (S8) (MI	LRA 147, 1	148) Co	oast Prairie	Redox (A16)	)	
Black Hi	stic (A3)		Thin Dark S	Surface (S9)	(MLRA 14	47, 148)		(MLRA 14	47, 148)		
Hydroge	n Sulfide (A4)		Loamy Gle	yed Matrix (	F2)		Pie	edmont Flo	odplain Soils	(F19)	
Stratified	l Layers (A5)		Depleted N	latrix (F3)				(MLRA 1	36, 147)		
2 cm Mu	ck (A10) <b>(LRR N)</b>		Redox Dar	< Surface (F	6)		Ve	ery Shallow	Dark Surface	e (TF12)	
Depleted	Below Dark Surface (A	A11)	Depleted D	ark Surface	(F7)		Ot	her (Expla	in in Remarks	3)	
Thick Da	rk Surface (A12)		Redox Dep	ressions (Fa	3)						
Sandy M	lucky Mineral (S1)		Iron-Manga	inese Masse	es (F12)						
LRR N,	MLRA 147,148)		(LRR N, M	LRA 136)							
Sandy G	leyed Matrix (S4)		Umbric Sur	face (F13)	(MLRA 136	5, 122)	<sup>3</sup> Indicat	ors of hydi	ophytic veget	tation and	
-	edox (S5)		Piedmont F	loodplain S	oils (F19) <b>(I</b>	MLRA 148		-	ology must be		
- '	Matrix (S6)			Material (F	• • •		•	•	bed or proble	•	
strictive L	ayer (if observed):										
Type:											

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry	County	Sampling Date:	04/12/2022
Applicant/Owner:	Avangrid Renewables, I			ate: Kentucky	Sampling Point:	14-W001-1W
Investigator(s):	CS RMS	Section, Township, Ra			y of Hazard	
Landform (hillslope, terrace, etc	): Terrace	Local relief (concave,		concave		(%): 0-2
Subregion (LRR or MLRA):	LRR N Lat:	37.2913775		-83.3089686		
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe			NWI classification		
Are climatic / hydrologic condition	ons on the site typical for this time of year?			explain in Remark	s.)	
	, or Hydrologysignificant			cumstances" prese		No
	, or Hydrology naturally p		(If needed, expla	ain any answers in	Remarks.)	
	S - Attach site map showing san		ons, transec	ts, important	features, etc.	
Hydrophytic Vegetation Prese				· •	,	
Hydric Soil Present?	Yes X No	Is the Sam	nled Area			
Wetland Hydrology Present?	Yes X No	within a W	-	Yes X	No	
						•
Remarks:						
HYDROLOGY						
Wetland Hydrology Indicato	ors:					
Primary Indicators (minimum	of one required: check all that apply)			Secondary Indica	ators (minimum of tv	vo required)
X Surface Water (A1)		c Plants (B14)		Surface Soil	Cracks (B6)	
High Water Table (A2)	Hydrogen Su	ulfide Odor (C1)		Sparsely Ve	getated Concave S	urface (B8)
Saturation (A3)	Oxidized Rh	izospheres on Living Ro	ots (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)	Presence of	Reduced Iron (C4)		Moss Trim L	ines (B16)	
Sediment Deposits (B2)	Recent Iron	Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck S	urface (C7)		Crayfish Bu	rrows (C8)	
Algal Mat or Crust (B4)	Other (Expla	ain in Remarks)		Saturation V	isible on Aerial Ima	gery (C9)
Iron Deposits (B5)				Stunted or S	Stressed Plants (D1)	)
Inundation Visible on Ae	rial Imagery (B7)			Geomorphic	Position (D2)	
Water-Stained Leaves (E	39)			Shallow Aqu	uitard (D3)	
Aquatic Fauna (B13)				Microtopogr	aphic Relief (D4)	
				X FAC-Neutra	l Test (D5)	
Field Observations:						
Surface Water Present?	Yes X No Depth (inch	nes): 2				
Water Table Present?	Yes No X Depth (inch					
Saturation Present?	Yes No X Depth (incl	·	Wetland Hyd	rology Present?	Yes X	No
(includes capillary fringe)			Wettand Hydi	lology i resent:		<u> </u>
(molades capillary imige)						
Describe Recorded Data (stre	eam gauge, monitoring well, aerial photos,	previous inspections), if	available:			
Remarks:						

Sampling Point: 14-W001-1W Dominance Test worksheet:

				Number of Dominant Species
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC: 2 (A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status	
<u>1.</u>				Total Number of Dominant
0				Species Across All Strata: 2 (B)
3.				
4				Percent of Dominant Species
5				That Are OBL, FACW, or FAC: 100.0 (A/B)
6.				
7				Prevalence Index worksheet:
	0	= Total Cove	er	Total % Cover of: Multiply by:
50% of total cover: 0	20%	of total cover:	0	OBL species 0 x 1 = 0
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 90 x 2 = 180
				FAC species 15 x 3 = 45
1				FACU species 0 x 4 = 0
2				UPL species $10 \times 5 = 50$
3.				Column Totals: 115 (A) 275 (B)
4				
5				Dravalance Index D/A 0.00
6				Prevalence Index = B/A = 2.39
7				I hadre when the Manus testion in the stands
8.				Hydrophytic Vegetation Indicators:
9.				X 1 - Rapid Test for Hydrophytic Vegetation
	0	= Total Cove		X 2 - Dominance Test is >50%
50% of total cover:0		of total cover:		X 3 - Prevalence Index ≤3.0 <sup>1</sup>
Herb Stratum (Plot size: 5 )	2070	or total cover.		4 - Morphological Adaptations <sup>1</sup> (Provide supporting
	<u> </u>	Vee		Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
1. Juncus effusus / Common bog rush, Soft or lamp rush	60	Yes	FACW	
2. Scirpus cyperinus / Woolgrass	30	Yes	FACW	<sup>1</sup> Indicators of hydric soil and wetland hydrology must
3. Dichanthelium clandestinum / Deer-tongue rosette grass	15	No	FAC	be present, unless disturbed or problematic.
4. Aster / Aster	10	No	NI	
5				Definitions of Four Vegetation Strata
6				
7.				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) or
0				more in diameter at breast height (DBH), regardless of
0				height.
10				
11				Sapling/Shrub - Woody plants, excluding vines, less
	115	-		than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 57	20%	of total cover:	23	tall.
Woody Vine Stratum (Plot size: 30 )				
1				Herb - All herbaceous (non-woody) plants, regardless of
2.				size, and woody plants less than 3.28 ft tall.
3.				
4.				Weedward All weedwards are to the O.O.C.
5.				Woody vines - All woody vines greater than 3.28 ft in
U	0	= Total Cove		height.
		-		Headware lead's
50% of total cover: 0	20%	of total cover:	0	Hydrophytic
				Vegetation
				Present?         Yes         X         No
Demender (Include all the number 1	``			1
Remarks: (Include photo numbers here or on a separate sheet.	.)			

e p эp [.) (

SOIL	S	Ο	II	
------	---	---	----	--

Depth	Matrix		Redox	Features				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-16	10YR 4/1	90	7.5YR 5/8	10	С	М	Clay Loam	
16-18	10YR 4/1	95					Clay Loam	
16-18	10YR 6/4	5					Loamy Sand	
Type: C=Co	ncentration, D=Depletio	n, RM=Redu	uced Matrix, MS=Mask	ked Sand Gra	ains.			_=Pore Lining, M=Matrix.
Histosol			Dark Surfa	ce (S7)				ck (A10) <b>(MLRA 147)</b>
Histic E	pipedon (A2)		Polyvalue E	Below Surfac	e (S8) (MI	<b>.RA 147</b> , 1	148) Coast Pra	airie Redox (A16)
Black H	istic (A3)			Surface (S9)				A 147, 148)
Hydroge	en Sulfide (A4)		Loamy Gle	yed Matrix (F	-2)		Piedmont	Floodplain Soils (F19)
i i yai ogo			X Depleted M	latrix (F3)			(MLR	A 136, 147)
	d Layers (A5)							
Stratifie	• • • •			k Surface (F	6)		Very Sha	llow Dark Surface (TF12)
Stratifie 2 cm Mu	uck (A10) (LRR N)	A11)	Redox Dar	k Surface (Fe ark Surface	,			llow Dark Surface (TF12) plain in Remarks)
Stratifie 2 cm Mu Deplete	uck (A10) <b>(LRR N)</b> d Below Dark Surface (A	A11)	Redox Dar Depleted D	ark Surface	(F7)			llow Dark Surface (TF12) plain in Remarks)
Stratifie 2 cm Mu Deplete Thick D	uck (A10) <b>(LRR N)</b> d Below Dark Surface (, ark Surface (A12)	A11)	Redox Dar Depleted D Redox Dep	ark Surface ressions (F8	(F7) 6)			· · · ·
Stratifie 2 cm Mu Deplete Thick D Sandy M	uck (A10) <b>(LRR N)</b> d Below Dark Surface (J ark Surface (A12) Jucky Mineral (S1)	A11)	Redox Dar Depleted D Redox Dep Iron-Manga	ark Surface ressions (F8 anese Masse	(F7) 6)			· · · ·
Stratifie 2 cm Mu Deplete Thick D Sandy M (LRR N	uck (A10) <b>(LRR N)</b> d Below Dark Surface (J ark Surface (A12) Jucky Mineral (S1) , <b>MLRA 147,148)</b>	A11)	Redox Dar Depleted D Redox Dep Iron-Manga	ark Surface ressions (F8 nese Masse L <b>RA 136)</b>	(F7) 3) es (F12)	i. 122)	Other (Ex	plain in Remarks)
Stratifie 2 cm Mu Deplete Thick D Sandy M (LRR N Sandy C	uck (A10) <b>(LRR N)</b> d Below Dark Surface (A ark Surface (A12) Mucky Mineral (S1) , <b>MLRA 147,148)</b> Gleyed Matrix (S4)	A11)	Redox Dar Depleted D Redox Dep Iron-Manga (LRR N, M	ark Surface ressions (F8 anese Masse L <b>RA 136)</b> face (F13)	(F7) 3) 95 (F12) ( <b>MLRA 136</b>		Other (Ex 3Indicators of I	plain in Remarks)
Stratifie 2 cm Mu Deplete Thick D Sandy M (LRR N Sandy C Sandy F	uck (A10) <b>(LRR N)</b> d Below Dark Surface (A ark Surface (A12) Mucky Mineral (S1) , <b>MLRA 147,148)</b> Gleyed Matrix (S4) Redox (S5)	A11)	Redox Dar Depleted D Redox Dep Iron-Manga (LRR N, M Dumbric Sur Piedmont F	ark Surface ressions (F8 anese Masse L <b>RA 136)</b> face (F13) ( floodplain Sc	(F7) 3) 25 (F12) (MLRA 136 0ils (F19) (N	/LRA 148	Other (Ex <sup>3</sup> Indicators of I ) wetland h	plain in Remarks) hydrophytic vegetation and hydrology must be present.
Stratifie 2 cm Mi Deplete Thick D Sandy N (LRR N Sandy C Sandy F Stripped	uck (A10) <b>(LRR N)</b> d Below Dark Surface (A ark Surface (A12) Aucky Mineral (S1) , <b>MLRA 147,148)</b> Gleyed Matrix (S4) Redox (S5) I Matrix (S6)	A11)	Redox Dar Depleted D Redox Dep Iron-Manga (LRR N, M Dumbric Sur Piedmont F	ark Surface ressions (F8 anese Masse L <b>RA 136)</b> face (F13)	(F7) 3) 25 (F12) (MLRA 136 0ils (F19) (N	/LRA 148	Other (Ex <sup>3</sup> Indicators of I ) wetland h	plain in Remarks)
Stratifie 2 cm Mi Deplete Thick D Sandy N (LRR N Sandy C Sandy F Strippec	uck (A10) <b>(LRR N)</b> d Below Dark Surface (A ark Surface (A12) Mucky Mineral (S1) , <b>MLRA 147,148)</b> Gleyed Matrix (S4) Redox (S5)	A11)	Redox Dar Depleted D Redox Dep Iron-Manga (LRR N, M Dumbric Sur Piedmont F	ark Surface ressions (F8 anese Masse L <b>RA 136)</b> face (F13) ( floodplain Sc	(F7) 3) 25 (F12) (MLRA 136 0ils (F19) (N	/LRA 148	Other (Ex <sup>3</sup> Indicators of I ) wetland h	plain in Remarks) hydrophytic vegetation and hydrology must be present.
Stratifie 2 cm Mi Deplete Thick D Sandy N (LRR N Sandy C Sandy F Stripped	uck (A10) <b>(LRR N)</b> d Below Dark Surface (A ark Surface (A12) Mucky Mineral (S1) , <b>MLRA 147,148)</b> Gleyed Matrix (S4) Redox (S5) I Matrix (S6) -ayer (if observed):	A11)	Redox Dar Depleted D Redox Dep Iron-Manga (LRR N, M Dumbric Sur Piedmont F	ark Surface ressions (F8 anese Masse L <b>RA 136)</b> face (F13) ( floodplain Sc	(F7) 3) 25 (F12) (MLRA 136 0ils (F19) (N	/LRA 148	Other (Ex <sup>3</sup> Indicators of I ) wetland h	plain in Remarks) hydrophytic vegetation and hydrology must be present. sturbed or problematic.

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Co	ounty	Sampling Date:	04/13/2022
Applicant/Owner:	Avangrid Renewables, L		· · · · · · · · · · · · · · · · · · ·		Sampling Point:	14-W002-1W
Investigator(s):	CM, RMS, JK	Section, Township, Ra		<u>`</u>	of Hazard	
Landform (hillslope, terrace, etc)	): Bowl shaped depression	Local relief (concave,		concave		%): 2-5
Subregion (LRR or MLRA):	LRR N Lat:	37.28827517	Long:	-83.2910481		-
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 per			NWI classification		
	ons on the site typical for this time of year?			plain in Remarks	s.)	
	X , or Hydrology significant		Are "Normal Circun			No
	X , or Hydrology naturally p		(If needed, explain	any answers in F	Remarks.)	
	S - Attach site map showing san		ons. transects	. important f	eatures. etc.	
Hydrophytic Vegetation Prese			,	, ,	····, ···,	
Hydric Soil Present?	Yes X No	Is the Sam	nled Area			
Wetland Hydrology Present?	Yes X No		-	Yes X	No	
Remarks:						
Recently mowed	I, reclaimed coal mine soil,					
HYDROLOGY						
Wetland Hydrology Indicato						
	of one required: check all that apply)		S	econdary Indicat	tors (minimum of tw	o required)
X Surface Water (A1)	· · · · · · · · · · · · · · · · · · ·	Plants (B14)	3	Surface Soil		o lequiled)
X High Water Table (A2)		Ifide Odor (C1)	_		getated Concave Su	urface (P.9)
X Saturation (A3)		zospheres on Living Ro		Drainage Pat		inace (DO)
Water Marks (B1)		Reduced Iron (C4)		Moss Trim Li	. ,	
Sediment Deposits (B2)		Reduction in Tilled Soils	(C6)		Water Table (C2)	
Drift Deposits (B3)	Thin Muck St		(00)	Crayfish Buri		
Algal Mat or Crust (B4)		in in Remarks)	_	-	isible on Aerial Imag	
		in in Remarks)	_			Jery (C9)
Iron Deposits (B5)	riel Imagan (PZ)		_	_	tressed Plants (D1)	
Inundation Visible on Aer			_		Position (D2)	
Water-Stained Leaves (E Aquatic Fauna (B13)	(5)		-	Shallow Aqui	aphic Relief (D4)	
			<del>,</del>	X FAC-Neutral		
					lest (D3)	
Field Observations:						
Surface Water Present?	Yes X No Depth (inch	ies): 6				
Water Table Present?	Yes X No Depth (inch	ies): 0				
Saturation Present?	Yes X No Depth (inch	nes): 0	Wetland Hydrol	ogy Present?	Yes X	No
(includes capillary fringe)						
Describe Recorded Data (stre	eam gauge, monitoring well, aerial photos, p	previous inspections), if	available:			
Remarks:						
i tomanto.						

VEGETATION (Four Strata) - Use scientific names	s of plant	S.		Sam	pling Poi	nt: <u>14-</u> V	V002-1W
				Dominance Test worksheet:			
				Number of Dominant Species			
	Absolute	Dominant	Indicator	·		4	(A)
				That Are OBL, FACW, or FAC:		1	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status				
1				Total Number of Dominant			
2.				Species Across All Strata:		1	(B)
3.							
				Demont of Demoister of Oracia			
4				Percent of Dominant Species			
5				That Are OBL, FACW, or FAC:		100.0	(A/B)
6							
7				Prevalence Index worksheet:			
	0	= Total Cov	er	Total % Cover of:	М	lultiply by:	
		-		OBL species 40	x 1 =	40	
	20% (	of total cover:	0				
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 10	x 2 =	20	
1				FAC species 0	x 3 =	0	
2.				FACU species 5	x 4 =	20	
2				UPL species 0	x 5 =	0	
3				Column Totals: 55	(A)	80	(B)
4.					· (^) -	00	(0)
5							
6.				Prevalence Index = B/A =		1.45	_
7.							
				Hydrophytic Vegetation Indic	ators:		
				X 1 - Rapid Test for Hydroph	vtic Vege	etation	
9				X 2 - Dominance Test is >50			
	0	= Total Cov	er				
50% of total cover: 0	20% (	of total cover:	0	X 3 - Prevalence Index ≤3.0 <sup>1</sup>			
Herb Stratum (Plot size: 5 )				4 - Morphological Adaptation			ting
	40	Ma a		Problematic Hydrophytic V	egetatior	n <sup>1</sup> (Explain)	
1. Typha latifolia / Broadleaf cattail, Broad-leaved cattail		Yes	OBL				
2. Scirpus cyperinus / Woolgrass	10	No	FACW	<sup>1</sup> Indicators of hydric soil and we	tland by	drology mus	•
3. Andropogon virginicus / Broomsedge bluestem	5	No	FACU				
4				be present, unless disturbed or	problem	atic.	
5				Definitions of Four Vegetation	1 Strata		
6							
7				Tree - Woody plants, excluding	vines, 3	in. (7.6 cm)	or
8				more in diameter at breast heig			
0				height.	,	, 5	
9							
10							
11				Sapling/Shrub - Woody plants,	excludir	ng vines, les	S
	55	= Total Cov	er	than 3 in. DBH and greater than		•	
50% of total cover: 27	20%	- of total cover:	11	tall.		,	,
	20700						
Woody Vine Stratum (Plot size: 30 )							
1				Herb - All herbaceous (non-woo	ody) plan	nts, regardles	s of
2				size, and woody plants less that	n 3.28 ft	tall.	
3.							
4.				Woody vines - All woody vines	greater	than 3.28 ft	n
5				height.			
	0	= Total Cov	er				
50% of total cover: 0	20% (	of total cover:	0	Hydrophytic			
				Vegetation			
				-			
				Present? Yes	<u> </u>	0	
				1			
Remarks: (Include photo numbers here or on a separate sheet.	.)						

-	-	-	
c	n	I	
	J	I	L

:	Matrix           Color (moist)         %         C           5Y 4/1         100		Redox Featur		Loc <sup>2</sup>	Tauduma	Demente
nches) 0-3			Color (moist) %	Type1	Texture Muck Lm Clay	Remarks	
Type: C=Co	ncentration, D=Depletic	on, RM=Redu	ced Matrix, MS=Masked San	d Grains.		<sup>2</sup> Location: PL	=Pore Lining, M=Matrix.
Black H Hydroge Stratifie 2 cm Mu Deplete Thick Da Sandy M Sandy C Sandy F		A11)	Dark Surface (S7) Polyvalue Below S Thin Dark Surface Loamy Gleyed Mari Depleted Matrix (F Redox Dark Surface Depleted Dark Surface Redox Depression Iron-Manganese M (LRR N, MLRA 13 Umbric Surface (F Piedmont Floodpla Red Parent Materia	(S9) (MLRA 14 trix (F2) 3) 5e (F6) face (F7) 5 (F8) lasses (F12) 6) 13) (MLRA 136 in Soils (F19) (N	, 122) /ILRA 148	148) 2 cm Muc Coast Pra (MLR/ Piedmont (MLR/ Very Shal Other (Ex <sup>3</sup> Indicators of h wetland h	boblematic Hydric Soils <sup>3</sup> : k (A10) (MLRA 147) irie Redox (A16) A 147, 148) Floodplain Soils (F19) A 136, 147) low Dark Surface (TF12) plain in Remarks) hydrophytic vegetation and ydrology must be present. sturbed or problematic.
Туре:	Layer (if observed):					Hydric Soil Present?	Yes X No

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Coun	nty	Sampling Date:	04/13/2022
Applicant/Owner:	Avangrid Renewables,				Sampling Point:	14-W003-1W
Investigator(s):	CM, RMS, JK	Section, Township, R	ange:		of Hazard	
Landform (hillslope, terrace, etc)	): Bowl shaped depression	Local relief (concave,		concave		%): 2-5
Subregion (LRR or MLRA):	LRR N Lat:	37.288075		-83.2910991		-
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe			VI classificatio	n:	
Are climatic / hydrologic condition	ons on the site typical for this time of year?			ain in Remarks	s.)	
Are Vegetation X , Soil		lly disturbed?	Are "Normal Circumst			No
Are Vegetation , Soil	X , or Hydrology naturally p	problematic?	(If needed, explain an	y answers in	Remarks.)	
SUMMARY OF FINDING	S - Attach site map showing sar	npling point locat	ons, transects, i	mportant f	eatures, etc.	
Hydrophytic Vegetation Prese			`	•	•	
Hydric Soil Present?	Yes X No	Is the San	pled Area			
Wetland Hydrology Present?	Yes X No	within a W	-	Yes X	No	
Remarks:	l, reclaimed coal mine soil,	-				
HYDROLOGY						
Wetland Hydrology Indicato	ire.					]
	of one required: check all that apply)		Sec	ondary Indica	tors (minimum of tw	o required)
X Surface Water (A1)	· · · · · · · · · · · · · · · · · · ·	Plants (B14)		Surface Soil		orequiredy
X High Water Table (A2)		ulfide Odor (C1)	—		getated Concave Su	urface (B8)
X Saturation (A3)	; 0	izospheres on Living Ro	oots (C3)	Drainage Pa		
Water Marks (B1)		Reduced Iron (C4)	. ,	Moss Trim L		
Sediment Deposits (B2)	Recent Iron	Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck S	urface (C7)		Crayfish Bur	rows (C8)	
Algal Mat or Crust (B4)	Other (Expla	in in Remarks)		Saturation V	isible on Aerial Imag	gery (C9)
Iron Deposits (B5)				Stunted or S	tressed Plants (D1)	
Inundation Visible on Ae	rial Imagery (B7)			Geomorphic	Position (D2)	
Water-Stained Leaves (E	39)		_	Shallow Aqu	itard (D3)	
Aquatic Fauna (B13)				Microtopogra	aphic Relief (D4)	
			<u>X</u>	FAC-Neutral	Test (D5)	
Field Observations:						
Surface Water Present?	Yes X No Depth (incl	nes): 6				
Water Table Present?	Yes X No Depth (incl					
Saturation Present?	Yes X No Depth (inch		Wetland Hydrolog	v Present?	Yes X	No
(includes capillary fringe)						
Describe Recorded Data (stre	am gauge, monitoring well, aerial photos,	previous inspections), if	available:			
Remarks:						

/EGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling	Point:	14-W003-1
				Dominance Test worksheet:		
				Number of Dominant Species		
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC:	2	(A)
				That Are OBL, FACW, of FAC.	Z	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status			
1				Total Number of Dominant		
2				Species Across All Strata:	2	(B)
3	-	-	-			( )
3				Demonstrat Demoissant Oracian		
4				Percent of Dominant Species		
5		-		That Are OBL, FACW, or FAC:	100.0	0 (A/B)
6						
7.				Prevalence Index worksheet:		
··	0	= Total Cov		Total % Cover of:	Multiply	bv:
		-		OBL species 45 x 1		45
50% of total cover: 0	20% (	of total cover	: 0			
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 20 x 2		40
				FAC species 0 x 3	; =	0
1		_		FACU species 5 x 4	= :	20
2					-	0
3		-				-
4				Column Totals: 70 (A)	/1	105 (B)
5		-		Prevalence Index = B/A =	15	
6						<u> </u>
7		-		Hydrophytic Vegetation Indicators		
8						
9.				X 1 - Rapid Test for Hydrophytic V	egetation	
·		- Tatal Cau		X 2 - Dominance Test is >50%		
	0	= Total Cov		X 3 - Prevalence Index ≤3.0 <sup>1</sup>		
50% of total cover: 0	20% (	of total cover	:	4 - Morphological Adaptations <sup>1</sup>	(Provido e	supporting
Herb Stratum (Plot size: 5 )						
1. Typha latifolia / Broadleaf cattail, Broad-leaved cattail	45	Yes	OBL	Problematic Hydrophytic Vegeta	ation <sup>1</sup> (Exp	olain)
			-			
2. Scirpus cyperinus / Woolgrass	20	Yes	FACW	<sup>1</sup> Indicators of hydric soil and wetland	l hvdroloa <sup>,</sup>	v must
3. Andropogon virginicus / Broomsedge bluestem	5	No	FACU	be present, unless disturbed or prob		
4				be present, unless disturbed of prob	lemanc.	
5					-4-	
0		-		Definitions of Four Vegetation Stra	ata	
6						
7		-		Tree - Woody plants, excluding vines	s, 3 in. (7.0	6 cm) or
8				more in diameter at breast height (D		
0				height.	<i>,,</i> 0	
10						
11. <u> </u>				Sapling/Shrub - Woody plants, excl	udina vine	es. less
	70	= Total Cov	er	than 3 in. DBH and greater than or e		
50% of total cover: 35	20%	- of total cover	: 14	tall.	4	
	20%					
Woody Vine Stratum (Plot size: 30 )						
1				Herb - All herbaceous (non-woody)	olants rec	ardless of
2				size, and woody plants less than 3.2		jaraiooo or
		-		size, and woody plants less than 0.2	o it tall.	
3						
4.				Woody vines - All woody vines grea	ter than 3	3.28 ft in
5.				height.		
	0	= Total Cov	or			
				He doe o be the		
50% of total cover: 0	20% (	of total cover	: 0	Hydrophytic		
				Vegetation		
				Present? Yes X	No	
						<u> </u>
Remarks: (Include photo numbers here or on a separate sheet	.)					

SOIL	J	Ο	I	L
------	---	---	---	---

Depth	Matrix		Redox Features					
(inches)	Color (moist)	%	Color (moist)	% Type <sup>1</sup> Loc <sup>2</sup>		Loc <sup>2</sup>	Texture	Remarks
0-5	10YR 4/1 99		10YR 5/8				Muck Lm Clay	
'Type: C=Co	ncentration, D=Depletio	n, RM=Red	uced Matrix, MS=Masl	ked Sand G	ains.		<sup>2</sup> Location: PL	=Pore Lining, M=Matrix.
Black H Hydroge Stratifie 2 cm Mu Deplete Thick Da Sandy M (LRR N Sandy C Sandy F		A11)	Thin Dark 3 Loamy Gle X Depleted M Redox Dar Depleted D Redox Dep Iron-Manga (LRR N, M Umbric Su Piedmont F	Below Surfa Surface (S9) yed Matrix ( Matrix (F3) k Surface (F Dark Surface Dressions (F anese Mass	(MLRA 14 F2) 6) (F7) 8) es (F12) (MLRA 136 oils (F19) (N	47, 148) 5, 122) MLRA 148	2 cm Mucl Coast Prai (MLRA Piedmont (MLRA Very Shall Other (Exp <sup>3</sup> Indicators of hy- wetland hy-	Ablematic Hydric Soils <sup>3</sup> : ( (A10) (MLRA 147) irie Redox (A16) ( 147, 148) Floodplain Soils (F19) ( 136, 147) ow Dark Surface (TF12) olain in Remarks) ydrophytic vegetation and ydrology must be present. turbed or problematic.
Туре:	Layer (if observed):						Hydric Soil Present?	Yes X No

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Co	ounty	Sampling Date:	04/13/2022
Applicant/Owner:	Avangrid Renewables,	LLC	State	: Kentucky	Sampling Point:	14-W005-1U
Investigator(s):	CM, RMS, JK	Section, Township, Ra	ange:	Cit	y of Hazard	
Landform (hillslope, terrace, etc):	Flat	Local relief (concave,	convex, none):	none	Slope	(%): 0-5
Subregion (LRR or MLRA):	LRR N Lat:	37.2894485	Long:	-83.285194 <sup>-</sup>	17 Datum	: WGS 84
Soil Map Unit Name: Ma	atewan-Marrowbone-Latham complex, 20	to 80 percent slopes, ve	ery rocky	NWI classification	on:	
Are climatic / hydrologic condition	is on the site typical for this time of year?	Yes X No	(If no, ex	plain in Remark	s.)	
Are Vegetation, Soil	X , or Hydrologysignificant	tly disturbed?	Are "Normal Circur	mstances" prese	nt? Yes X	<u>No</u>
Are Vegetation, Soil	X_, or Hydrologynaturally	problematic?	(If needed, explain	any answers in	Remarks.)	
SUMMARY OF FINDINGS	- Attach site map showing sar	npling point locati	ons, transects	, important	features, etc.	
Hydrophytic Vegetation Presen	t? Yes No X					
Hydric Soil Present?	Yes No X	Is the Sam	pled Area			
Wetland Hydrology Present?	Yes No X	within a W	/etland?	Yes	No X	
Remarks: Reclaimed coal m	ine	I				
HYDROLOGY						
Wetland Hydrology Indicators	s:					
Primary Indicators (minimum of	f one required: check all that apply)		5	Secondary Indica	ators (minimum of tv	vo required)
Surface Water (A1)	True Aquatio	c Plants (B14)		Surface Soil	Cracks (B6)	
High Water Table (A2)	Hydrogen Si	ulfide Odor (C1)	_	Sparsely Ve	getated Concave S	urface (B8)
Saturation (A3)	Oxidized Rh	izospheres on Living Ro	ots (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)		Reduced Iron (C4)	-	Moss Trim L		
Sediment Deposits (B2)		Reduction in Tilled Soils	(C6)		Water Table (C2)	
Drift Deposits (B3)	Thin Muck S	( )	-	Crayfish Bu	( )	( )
Algal Mat or Crust (B4)	Other (Expla	ain in Remarks)	-		isible on Aerial Ima	
Iron Deposits (B5)			-		Stressed Plants (D1)	)
Inundation Visible on Aeria Water-Stained Leaves (B9	<b>U I ( )</b>		-	Shallow Aqu	Position (D2)	
Aquatic Fauna (B13)	')		-		aphic Relief (D4)	
			-	FAC-Neutra		
			<u> </u>		. ,	
Field Observations:						
Surface Water Present?	Yes <u>No X</u> Depth (inch					
Water Table Present?	Yes No X Depth (incl					
Saturation Present?	Yes <u>No X</u> Depth (incl	1es):	Wetland Hydrol	logy Present?	Yes	No <u>X</u>
(includes capillary fringe)						
Describe Recorded Data (strea	m gauge, monitoring well, aerial photos,	previous inspections), if	available:			
Remarks:						

	s of plant	0.			Sampling P	oint: 14	
				Dominance Test work	sheet:		
				Number of Dominant Sp			
	Absolute	Dominant	Indicator	That Are OBL, FACW, o		0	(A)
Trop Stratum (Plot size: 20)	% Cover			mat Ale ODE, I AOW, C		0	(~)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status				
				Total Number of Domina			
2				Species Across All Stra	ta:	2	(B)
3							
4				Percent of Dominant Sp	ecies		
5.				That Are OBL, FACW, o	or FAC:	0.0	(A/B)
C				,,.			( /
			·	Prevalence Index wor	ksheet:		
7			·	Total % Cover of:		Multiply by:	
	0	= Total Cov			0 x 1 =		
50% of total cover: 0	20% (	of total cover:	0				
Sapling/Shrub Stratum (Plot size: 15 )					0 x 2 =		
1				FAC species	0 x 3 =	0	
2.				FACU species 1	55 x 4 =	620	
3			·	UPL species	15 x 5 =	75	
3				· · · · · · · · · · · · · · · · · · ·	70 (A)	695	(B)
4							(2)
5					5/4	4.00	
6				Prevalence Index	= B/A =	4.09	
7							
8.				Hydrophytic Vegetatic			
9.				1 - Rapid Test for H	lydrophytic Ve	getation	
J	0	= Total Cov	- <u></u>	2 - Dominance Tes	t is >50%		
50% ( ) )		-		3 - Prevalence Inde	ex ≤3.0¹		
50% of total cover: 0	20% 0	of total cover:	0	4 - Morphological A	Adaptations <sup>1</sup> (P	rovide supp	ortina
Herb Stratum (Plot size: 5 )				Problematic Hydro			-
1. Andropogon virginicus / Broomsedge bluestem	75	Yes	FACU		priytic vegetati		,
2. Trifolium pratense / Red clover	60	Yes	FACU				
3. <i>Plantago major /</i> Common plantain	20	No	FACU	<sup>1</sup> Indicators of hydric soi			ist
4. Aster / Aster	15	No	NI	be present, unless distu	rbed or proble	matic.	
			·				
5.						-	
				Definitions of Four Ve	getation Strat	а	
6.				Definitions of Four Ve	getation Strat	а	
6.				Definitions of Four Ve	-		) or
6					cluding vines,	3 in. (7.6 cm	
6 7 8				<b>Tree</b> - Woody plants, ex	cluding vines,	3 in. (7.6 cm	
6				<b>Tree</b> - Woody plants, ex more in diameter at bre	cluding vines,	3 in. (7.6 cm	
6. 7. 8. 9. 10.				<b>Tree</b> - Woody plants, ex more in diameter at bre height.	cluding vines, ast height (DBI	3 in. (7.6 cm H), regardles	s of
6				Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6. 7. 8. 9. 10. 11.	170	= Total Cov		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and grea	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6. 7. 8. 9. 10.	170			Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6	170	= Total Cov		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and grea	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6	170	= Total Cov		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood than 3 in. DBH and great tall.	cluding vines, ast height (DBl y plants, exclud ater than or equ	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft	s of sss (1 m)
6	  	= Total Cov of total cover:		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood than 3 in. DBH and great tall. Herb - All herbaceous (	cluding vines, ast height (DBl y plants, exclud ater than or equ non-woody) pla	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl	s of sss (1 m)
6	  	= Total Cov of total cover:		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood than 3 in. DBH and great tall.	cluding vines, ast height (DBl y plants, exclud ater than or equ non-woody) pla	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl	s of sss (1 m)
6	  	= Total Cov of total cover:		<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants)</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	  	= Total Cov of total cover:		<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants</li> <li>Woody vines - All woody</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	  	= Total Cov of total cover:		<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants)</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	  	= Total Cov of total cover:	er 34	<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants</li> <li>Woody vines - All woody</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	170 20% d	= Total Cov of total cover:	er 34	<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants</li> <li>Woody vines - All woodh height.</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	170 20% d	= Total Cov of total cover: = Total Cov	er 34	Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and great tall. Herb - All herbaceous ( size, and woody plants Woody vines - All wood height. Hydrophytic	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ss (1 m) ess of
6	170 20% d	= Total Cov of total cover: = Total Cov	er 34	Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and great tall. Herb - All herbaceous ( size, and woody plants Woody vines - All wood height. Hydrophytic Vegetation	ccluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28 dy vines greate	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ss (1 m) ess of

c	<b>^</b>	ı	
Э	υ	I	ᄂ

Depth	Matrix		Redox F				
(inches)	Color (moist)	%	Color (moist)	% Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-6	10YR 4/1100	100	·			Silt Loam	Reclaimed coal mine, rocky surface, I
ſype: C=Co	ncentration, D=Depletic	on, RM=Redu	uced Matrix, MS=Masked	I Sand Grains.		²Loca	ation: PL=Pore Lining, M=Matrix.
Histosol	l (A1)		Dark Surface	. ,		2	s for Problematic Hydric Soils <sup>3</sup> : cm Muck (A10) (MLRA 147)
	pipedon (A2)			ow Surface (S8) (N	-	48) <u> </u>	coast Prairie Redox (A16)
-	istic (A3) en Sulfide (A4)		Loamy Gleye	face (S9) <b>(MLRA</b> ' Matrix (E2)	147, 148)	P	(MLRA 147, 148) iedmont Floodplain Soils (F19)
	d Layers (A5)		Depleted Mat	. ,		'	(MLRA 136, 147)
_	uck (A10) (LRR N)		Redox Dark S			V	ery Shallow Dark Surface (TF12)
-	d Below Dark Surface (	A11)		Surface (F7)			other (Explain in Remarks)
Thick Da	ark Surface (A12)	,	Redox Depres	ssions (F8)			
Sandy N	Mucky Mineral (S1)		Iron-Mangane	ese Masses (F12)			
(LRR N,	, MLRA 147,148)		(LRR N, MLR	A 136)			
	Gleyed Matrix (S4)			ce (F13) (MLRA 13			ators of hydrophytic vegetation and
	Redox (S5)			odplain Soils (F19)			etland hydrology must be present.
Stripped	d Matrix (S6)		Red Parent N	aterial (F21) (MLF	A 127, 147)	u	nless disturbed or problematic.
estrictive L	Layer (if observed):						
Type	choc):					Hydric Soil F	Present? Yes No >
Type: Depth (in						-	

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Co	ounty	Sampling Date:	04/13/2022
Applicant/Owner:	Avangrid Renewables,	LLC	State	: Kentucky	Sampling Point:	14-W005-1U
Investigator(s):	CM, RMS, JK	Section, Township, Ra	ange:	Cit	y of Hazard	
Landform (hillslope, terrace, etc):	Flat	Local relief (concave,	convex, none):	none	Slope	(%): 0-5
Subregion (LRR or MLRA):	LRR N Lat:	37.2894485	Long:	-83.285194 <sup>-</sup>	17 Datum	: WGS 84
Soil Map Unit Name: Ma	atewan-Marrowbone-Latham complex, 20	to 80 percent slopes, ve	ery rocky	NWI classification	on:	
Are climatic / hydrologic condition	is on the site typical for this time of year?	Yes X No	(If no, ex	plain in Remark	s.)	
Are Vegetation, Soil	X , or Hydrologysignificant	tly disturbed?	Are "Normal Circur	mstances" prese	nt? Yes X	<u>No</u>
Are Vegetation, Soil	X_, or Hydrologynaturally	problematic?	(If needed, explain	any answers in	Remarks.)	
SUMMARY OF FINDINGS	- Attach site map showing sar	npling point locati	ons, transects	, important	features, etc.	
Hydrophytic Vegetation Presen	t? Yes No X					
Hydric Soil Present?	Yes No X	Is the Sam	pled Area			
Wetland Hydrology Present?	Yes No X	within a W	/etland?	Yes	No X	
Remarks: Reclaimed coal m	ine	I				
HYDROLOGY						
Wetland Hydrology Indicators	s:					
Primary Indicators (minimum of	f one required: check all that apply)		5	Secondary Indica	ators (minimum of tv	vo required)
Surface Water (A1)	True Aquatio	c Plants (B14)		Surface Soil	Cracks (B6)	
High Water Table (A2)	Hydrogen Si	ulfide Odor (C1)	_	Sparsely Ve	getated Concave S	urface (B8)
Saturation (A3)	Oxidized Rh	izospheres on Living Ro	ots (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)		Reduced Iron (C4)	-	Moss Trim L		
Sediment Deposits (B2)		Reduction in Tilled Soils	(C6)		Water Table (C2)	
Drift Deposits (B3)	Thin Muck S	( )	-	Crayfish Bu	( )	( )
Algal Mat or Crust (B4)	Other (Expla	ain in Remarks)	-		isible on Aerial Ima	
Iron Deposits (B5)			-		Stressed Plants (D1)	)
Inundation Visible on Aeria Water-Stained Leaves (B9	0,000		-	Shallow Aqu	Position (D2)	
Aquatic Fauna (B13)	')		-		aphic Relief (D4)	
			-	FAC-Neutra		
			<u> </u>		. ,	
Field Observations:						
Surface Water Present?	Yes <u>No X</u> Depth (inch					
Water Table Present?	Yes No X Depth (incl					
Saturation Present?	Yes <u>No X</u> Depth (incl	1es):	Wetland Hydrol	logy Present?	Yes	No <u>X</u>
(includes capillary fringe)						
Describe Recorded Data (strea	m gauge, monitoring well, aerial photos,	previous inspections), if	available:			
Remarks:						

	s of plant	0.			Sampling P	oint: 14	
				Dominance Test work	sheet:		
				Number of Dominant Sp			
	Absolute	Dominant	Indicator	That Are OBL, FACW, o		0	(A)
Trop Stratum (Plot size: 20)	% Cover			mat Ale ODE, I AOW, C		0	(~)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status				
				Total Number of Domina			
2				Species Across All Stra	ta:	2	(B)
3							
4				Percent of Dominant Sp	ecies		
5.				That Are OBL, FACW, o	or FAC:	0.0	(A/B)
C				,,.			( /
			·	Prevalence Index wor	ksheet:		
7			·	Total % Cover of:		Multiply by:	
	0	= Total Cov			0 x 1 =		
50% of total cover: 0	20% (	of total cover:	0				
Sapling/Shrub Stratum (Plot size: 15 )					0 x 2 =		
1				FAC species	0 x 3 =	0	
2.				FACU species 1	55 x 4 =	620	
3			·	UPL species	15 x 5 =	75	
3				· · · · · · · · · · · · · · · · · · ·	70 (A)	695	(B)
4							(2)
5					5/4	4.00	
6				Prevalence Index	= B/A =	4.09	
7							
8.				Hydrophytic Vegetatic			
9.				1 - Rapid Test for H	lydrophytic Ve	getation	
J	0	= Total Cov	- <u></u>	2 - Dominance Tes	t is >50%		
50% ( ) )		-		3 - Prevalence Inde	ex ≤3.0¹		
50% of total cover: 0	20% 0	of total cover:	0	4 - Morphological A	Adaptations <sup>1</sup> (P	rovide supp	ortina
Herb Stratum (Plot size: 5 )				Problematic Hydro			-
1. Andropogon virginicus / Broomsedge bluestem	75	Yes	FACU		priytic vegetati		,
2. Trifolium pratense / Red clover	60	Yes	FACU				
3. <i>Plantago major /</i> Common plantain	20	No	FACU	<sup>1</sup> Indicators of hydric soi			ist
4. Aster / Aster	15	No	NI	be present, unless distu	rbed or proble	matic.	
			·				
5.						-	
				Definitions of Four Ve	getation Strat	а	
6.				Definitions of Four Ve	getation Strat	а	
6.				Definitions of Four Ve	-		) or
6 7					cluding vines,	3 in. (7.6 cm	
6				<b>Tree</b> - Woody plants, ex	cluding vines,	3 in. (7.6 cm	
6				<b>Tree</b> - Woody plants, ex more in diameter at bre	cluding vines,	3 in. (7.6 cm	
6. 7. 8. 9. 10.				<b>Tree</b> - Woody plants, ex more in diameter at bre height.	cluding vines, ast height (DBI	3 in. (7.6 cm H), regardles	s of
6				Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6. 7. 8. 9. 10. 11.	170	= Total Cov		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and grea	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6. 7. 8. 9. 10.	170			Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6 7 8 9 10 11	170	= Total Cov		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and grea	cluding vines, ast height (DBl y plants, exclud	3 in. (7.6 cm H), regardles ding vines, le	ess
6	170	= Total Cov		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood than 3 in. DBH and great tall.	cluding vines, ast height (DBl y plants, exclud ater than or equ	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft	s of sss (1 m)
6	  	= Total Cov of total cover:		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood than 3 in. DBH and great tall. Herb - All herbaceous (	cluding vines, ast height (DBl y plants, exclud ater than or equ non-woody) pla	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl	s of sss (1 m)
6	  	= Total Cov of total cover:		Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Wood than 3 in. DBH and great tall.	cluding vines, ast height (DBl y plants, exclud ater than or equ non-woody) pla	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl	s of sss (1 m)
6	  	= Total Cov of total cover:		<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants)</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	  	= Total Cov of total cover:		<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants</li> <li>Woody vines - All woody</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	  	= Total Cov of total cover:		<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants)</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	  	= Total Cov of total cover:	er 34	<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants</li> <li>Woody vines - All woody</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	170 20% d	= Total Cov of total cover:	er 34	<ul> <li>Tree - Woody plants, exmore in diameter at bre height.</li> <li>Sapling/Shrub - Woody than 3 in. DBH and greatall.</li> <li>Herb - All herbaceous (size, and woody plants</li> <li>Woody vines - All woodh height.</li> </ul>	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ess (1 m) ess of
6	170 20% d	= Total Cov of total cover: = Total Cov	er 34	Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and great tall. Herb - All herbaceous ( size, and woody plants Woody vines - All wood height. Hydrophytic	cluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ss (1 m) ess of
6	170 20% d	= Total Cov of total cover: = Total Cov	er 34	Tree - Woody plants, ex more in diameter at bre height. Sapling/Shrub - Woody than 3 in. DBH and great tall. Herb - All herbaceous ( size, and woody plants Woody vines - All wood height. Hydrophytic Vegetation	ccluding vines, ast height (DBI y plants, exclud ater than or equ non-woody) pla less than 3.28 dy vines greate	3 in. (7.6 cm H), regardles ding vines, le ual to 3.28 ft ants, regardl ft tall.	s of ss (1 m) ess of

c	<b>^</b>	ı	
Э	υ	I	ᄂ

Depth	Matrix		Redox F				
(inches)	Color (moist)	%	Color (moist)	% Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-6	10YR 4/1	100	·			Silt Loam	Reclaimed coal mine, rocky surface, I
ſype: C=Co	ncentration, D=Depletic	on, RM=Redu	uced Matrix, MS=Masked	I Sand Grains.		²Loca	ation: PL=Pore Lining, M=Matrix.
Histosol	l (A1)		Dark Surface	. ,		2	s for Problematic Hydric Soils <sup>3</sup> : cm Muck (A10) (MLRA 147)
	pipedon (A2)			ow Surface (S8) (N	-	48) <u> </u>	coast Prairie Redox (A16)
-	istic (A3) en Sulfide (A4)		Loamy Gleye	face (S9) <b>(MLRA</b> ' Matrix (E2)	147, 148)	P	(MLRA 147, 148) iedmont Floodplain Soils (F19)
	d Layers (A5)		Depleted Mat	. ,		'	(MLRA 136, 147)
_	uck (A10) (LRR N)		Redox Dark S			V	ery Shallow Dark Surface (TF12)
-	d Below Dark Surface (	A11)		(Surface (F7)			other (Explain in Remarks)
Thick Da	ark Surface (A12)	,	Redox Depres	ssions (F8)			
Sandy N	Mucky Mineral (S1)		Iron-Mangane	ese Masses (F12)			
(LRR N,	, MLRA 147,148)		(LRR N, MLR	A 136)			
	Gleyed Matrix (S4)			ce (F13) (MLRA 13			ators of hydrophytic vegetation and
	Redox (S5)			odplain Soils (F19)			etland hydrology must be present.
Stripped	d Matrix (S6)		Red Parent N	aterial (F21) (MLF	A 127, 147)	u	nless disturbed or problematic.
estrictive L	Layer (if observed):						
Type	choc).					Hydric Soil F	Present? Yes No >
Type: Depth (in						-	

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Co	unty	Sampling Date: 04/13	/2022
Applicant/Owner:	Avangrid Renewables					/005-1W
Investigator(s):	CM, RMS, JK	Section, Township, Ra			of Hazard	
Landform (hillslope, terrace, et		Local relief (concave,		concave		1-4
Subregion (LRR or MLRA):	LRR N Lat:	37.28957683	Long:	-83.2852575		GS 84
	Matewan-Marrowbone-Latham complex, 2			WI classificatio		
	tions on the site typical for this time of year			plain in Remarks		
	I X , or Hydrology significa		Are "Normal Circum		,	)
Are Vegetation , Soil			(If needed, explain a			
·	GS - Attach site map showing sa			-		
				mportant		
Hydrophytic Vegetation Pres		<u> </u>				
Hydric Soil Present?	Yes X No	Is the Sam		No o	N -	
Wetland Hydrology Present	? Yes <u>X</u> No	within a W	retiand ?	Yes X	No	
Remarks:						
Reclaimed coa	al mine rocky surface					
HYDROLOGY						
Wetland Hydrology Indica						
Primary Indicators (minimun	n of one required: check all that apply)		S	econdary Indica	tors (minimum of two requi	red)
X Surface Water (A1)	True Aquat	ic Plants (B14)	<u>&gt;</u>	Surface Soil		
High Water Table (A2)	Hydrogen S	Sulfide Odor (C1)	_	Sparsely Veg	getated Concave Surface (	B8)
Saturation (A3)	Oxidized R	hizospheres on Living Ro	ots (C3)	Drainage Pa	tterns (B10)	
Water Marks (B1)	Presence of	of Reduced Iron (C4)	_	Moss Trim Li	nes (B16)	
Sediment Deposits (B2	.) Recent Iron	n Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck	Surface (C7)	_	Crayfish Bur	rows (C8)	
Algal Mat or Crust (B4)	Other (Exp	lain in Remarks)	_	Saturation V	sible on Aerial Imagery (C	9)
Iron Deposits (B5)				Stunted or S	tressed Plants (D1)	
Inundation Visible on A	erial Imagery (B7)			Geomorphic	Position (D2)	
Water-Stained Leaves	(B9)			Shallow Aqu	itard (D3)	
Aquatic Fauna (B13)				Microtopogra	aphic Relief (D4)	
—			X	FAC-Neutral	Test (D5)	
Field Observations:						
Surface Water Present?	Yes X No Depth (in	ches): 2				
Water Table Present?	Yes <u>No X</u> Depth (in	ches):				
Saturation Present?	Yes <u>No X</u> Depth (in	ches):	Wetland Hydrold	ogy Present?	Yes X No	
(includes capillary fringe)						
Describe Descrided Date (at		······································	l			
Describe Recorded Data (st	ream gauge, monitoring well, aerial photos	, previous inspections), if	avallable:			
Remarks:						

EGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling	Sampling Point: 14-W005		
				Dominance Test worksheet:			
				Number of Dominant Species			
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC:	2	(A)	
				That Are OBL, FACW, OF FAC.	2	(A)	
ree Stratum (Plot size: 30 )	% Cover	Species?	Status				
·				Total Number of Dominant			
	_			Species Across All Strata:	2	(B)	
				Percent of Dominant Species			
				That Are OBL, FACW, or FAC:	100.	0 (A/E	
				That Ale OBL, FACW, OF FAC.	100.		
				Prevalence Index worksheet:			
				Total % Cover of:	Multiply	, by:	
	0	= Total Cov			Multiply		
50% of total cover: 0	20% (	of total cover:	0	OBL species 80 x 1	_	80	
apling/Shrub Stratum (Plot size: 15 )				FACW species 60 x 2	<u>'</u> =	120	
				FAC species 0 x 3	3 =	0	
	-			FACU species 5 x 4	l =	20	
					5 =	0	
					_		
				Column Totals: 145 (A)	)	220 (I	
				Prevalence Index = B/A =	1.52	2	
				Hydrophytic Vegetation Indicators	3:		
				X 1 - Rapid Test for Hydrophytic \	/egetation	1	
				X 2 - Dominance Test is >50%			
	0	= Total Cov		X 3 - Prevalence Index ≤3.0 <sup>1</sup>			
50% of total cover: 0	20% (	of total cover:	0	4 - Morphological Adaptations <sup>1</sup>	(Provide (	unnorting	
erb Stratum (Plot size: 5)							
Typha latifolia / Broadleaf cattail, Broad-leaved cattail	80	Yes	OBL	Problematic Hydrophytic Veget	ation' (Exp	plain)	
Scirpus cyperinus / Woolgrass	50	Yes	FACW				
	10			<sup>1</sup> Indicators of hydric soil and wetland	l hydrolog	y must	
Juncus effusus / Common bog rush, Soft or lamp rush		No	FACW	be present, unless disturbed or prob	lematic.		
Andropogon virginicus / Broomsedge bluestem	5	No	FACU				
				Definitions of Four Vegetation Str	ata		
				Tree - Woody plants, excluding vine	e 3 in (7	6 cm) or	
				more in diameter at breast height (D			
	-			height.	Diri), rega		
	-			lioight.			
				Sapling/Shrub - Woody plants, excl	luding vin	es, less	
	145	= Total Cov	er	than 3 in. DBH and greater than or e	qual to 3.	28 ft (1 m)	
50% of total cover: 72	20% (	of total cover:	29	tall.			
oody Vine Stratum (Plot size: 30)							
				Herb - All herbaceous (non-woody)		gardless of	
				size, and woody plants less than 3.2	.8 ft tall.		
	_	<u> </u>					
				Woody vines - All woody vines grea	ator than ?	2 28 ft in	
		_		height.			
	0	= Total Cov	er				
		-		Liveran huti-			
50% of total cover: 0	20% (	of total cover:	0	Hydrophytic			
				Vegetation			
				Present? Yes X	No		
Remarks: (Include photo numbers here or on a separate sheet	)			Present? Yes X	No		

S	Ο	I	L
J	v		ᄂ

Depth	Matrix		Redox	Features						
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-8	5Y 4/1	98	10YR 5/8	2	C	М	Slty Clay Loam	Rocky refusal multiple spots, reclaimed c		
ype: C=Cor ydric Soil II	· •	n, RM=Red	uced Matrix, MS=Mask	ed Sand Gr	ains.			tion: PL=Pore Lining, M=Matrix.		
Histosol	. ,		Dark Surfac	. ,				cm Muck (A10) <b>(MLRA 147)</b>		
_ ·	ipedon (A2)			Below Surfac	. , .		148) Co	bast Prairie Redox (A16)		
Black His	( )			Surface (S9)	•	47, 148)		(MLRA 147, 148)		
	n Sulfide (A4)		Loamy Gley		-2)		Pie	edmont Floodplain Soils (F19)		
_	Layers (A5)		X Depleted M	. ,	0)			(MLRA 136, 147)		
_	ck (A10) (LRR N)	• • • •		Surface (F	,		Very Shallow Dark Surface (TF12)			
	Below Dark Surface (	411)		ark Surface	. ,		Ot	her (Explain in Remarks)		
-	rk Surface (A12)			ressions (F8	,					
_ `	ucky Mineral (S1)			nese Masse	es (F12)					
· · ·	MLRA 147,148)		(LRR N, MI			400	31			
	leyed Matrix (S4)			Umbric Surface (F13) (MLRA 136, 122) Piedmont Floodplain Soils (F19) (MLRA 148)				tors of hydrophytic vegetation and		
	edox (S5)			•	. , .			etland hydrology must be present.		
Sunbbed	Matrix (S6)			Material (F2		<b>A</b> 1 <i>21</i> , 14 <i>1</i>	) un	less disturbed or problematic.		
	<i></i>									
	ayer (if observed):						1			
							Hydric Soil Pi			

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry Co	unty	Sampling Date: 04/13	/2022
Applicant/Owner:	Avangrid Renewables					/005-1W
Investigator(s):	CM, RMS, JK	Section, Township, Ra			of Hazard	
Landform (hillslope, terrace, et		Local relief (concave,		concave		1-4
Subregion (LRR or MLRA):	LRR N Lat:	37.28957683	Long:	-83.2852575		GS 84
	Matewan-Marrowbone-Latham complex, 2			WI classificatio		
	tions on the site typical for this time of year			plain in Remarks		
	I X , or Hydrology significa		Are "Normal Circum		,	)
Are Vegetation , Soil			(If needed, explain a			
·	GS - Attach site map showing sa			-		
				mportant		
Hydrophytic Vegetation Pres		<u> </u>				
Hydric Soil Present?	Yes X No	Is the Sam		No o	N -	
Wetland Hydrology Present	? Yes <u>X</u> No	within a W	retiand ?	Yes X	No	
Remarks:						
Reclaimed coa	al mine rocky surface					
HYDROLOGY						
Wetland Hydrology Indica						
Primary Indicators (minimun	n of one required: check all that apply)		S	econdary Indica	tors (minimum of two requi	red)
X Surface Water (A1)	True Aquat	ic Plants (B14)	<u>&gt;</u>	Surface Soil		
High Water Table (A2)	Hydrogen S	Sulfide Odor (C1)	_	Sparsely Veg	getated Concave Surface (	B8)
Saturation (A3)	Oxidized R	hizospheres on Living Ro	ots (C3)	Drainage Pa	tterns (B10)	
Water Marks (B1)	Presence of	of Reduced Iron (C4)	_	Moss Trim Li	nes (B16)	
Sediment Deposits (B2	.) Recent Iron	n Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck	Surface (C7)	_	Crayfish Bur	rows (C8)	
Algal Mat or Crust (B4)	Other (Exp	lain in Remarks)	_	Saturation V	sible on Aerial Imagery (C	9)
Iron Deposits (B5)				Stunted or S	tressed Plants (D1)	
Inundation Visible on A	erial Imagery (B7)			Geomorphic	Position (D2)	
Water-Stained Leaves	(B9)			Shallow Aqu	itard (D3)	
Aquatic Fauna (B13)				Microtopogra	aphic Relief (D4)	
—			X	FAC-Neutral	Test (D5)	
Field Observations:						
Surface Water Present?	Yes X No Depth (in	ches): 2				
Water Table Present?	Yes <u>No X</u> Depth (in	ches):				
Saturation Present?	Yes <u>No X</u> Depth (in	ches):	Wetland Hydrold	ogy Present?	Yes X No	
(includes capillary fringe)						
Describe Descrided Date (at		······································	l			
Describe Recorded Data (st	ream gauge, monitoring well, aerial photos	, previous inspections), if	avallable:			
Remarks:						

EGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling	Sampling Point: 14-W005		
				Dominance Test worksheet:			
				Number of Dominant Species			
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC:	2	(A)	
				That Are OBL, FACW, OF FAC.	2	(A)	
ree Stratum (Plot size: 30 )	% Cover	Species?	Status				
·				Total Number of Dominant			
	_			Species Across All Strata:	2	(B)	
				Percent of Dominant Species			
				That Are OBL, FACW, or FAC:	100.	0 (A/E	
				That Ale OBL, FACW, OF FAC.	100.		
				Prevalence Index worksheet:			
				Total % Cover of:	Multiply	, by:	
	0	= Total Cov			Multiply		
50% of total cover: 0	20% (	of total cover:	0	OBL species 80 x 1	_	80	
apling/Shrub Stratum (Plot size: 15 )				FACW species 60 x 2	<u>'</u> =	120	
				FAC species 0 x 3	3 =	0	
	-			FACU species 5 x 4	l =	20	
					5 =	0	
					_		
				Column Totals: 145 (A)	)	220 (I	
				Prevalence Index = B/A =	1.52	2	
				Hydrophytic Vegetation Indicators	3:		
				X 1 - Rapid Test for Hydrophytic \	/egetation	1	
				X 2 - Dominance Test is >50%			
	0	= Total Cov		X 3 - Prevalence Index ≤3.0 <sup>1</sup>			
50% of total cover: 0	20% (	of total cover:	0	4 - Morphological Adaptations <sup>1</sup>	(Provide (	unnorting	
erb Stratum (Plot size: 5)							
Typha latifolia / Broadleaf cattail, Broad-leaved cattail	80	Yes	OBL	Problematic Hydrophytic Veget	ation' (Exp	plain)	
Scirpus cyperinus / Woolgrass	50	Yes	FACW				
	10			<sup>1</sup> Indicators of hydric soil and wetland	l hydrolog	y must	
Juncus effusus / Common bog rush, Soft or lamp rush		No	FACW	be present, unless disturbed or prob	lematic.		
Andropogon virginicus / Broomsedge bluestem	5	No	FACU				
				Definitions of Four Vegetation Str	ata		
				Tree - Woody plants, excluding vine	e 3 in (7	6 cm) or	
				more in diameter at breast height (D			
	-			height.	Diri), rega		
	-			lioight.			
				Sapling/Shrub - Woody plants, excl	luding vin	es, less	
	145	= Total Cov	er	than 3 in. DBH and greater than or e	qual to 3.	28 ft (1 m)	
50% of total cover: 72	20% (	of total cover:	29	tall.			
oody Vine Stratum (Plot size: 30)							
				Herb - All herbaceous (non-woody)		gardless of	
				size, and woody plants less than 3.2	.8 ft tall.		
		<u> </u>					
				Woody vines - All woody vines grea	ator than ?	2 28 ft in	
		_		height.			
	0	= Total Cov	er				
		-		Liveran huti-			
50% of total cover: 0	20% (	of total cover:	0	Hydrophytic			
				Vegetation			
				Present? Yes X	No		
Remarks: (Include photo numbers here or on a separate sheet	)			Present? Yes X	No		

SOIL	J	Ο	I	L
------	---	---	---	---

Depth	Matrix		Redox	Features						
(inches) Colo	or (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-8	5Y 4/1	98	10YR 5/8	2	<u> </u>	Μ	Slty Clay Loam	Rocky refusal multiple spots, reclaimed c		
ype: C=Concentratio	· · ·	RM=Reduce	d Matrix, MS=Mask	ed Sand Gra	ains.			tion: PL=Pore Lining, M=Matrix. for Problematic Hydric Soils <sup>3</sup> :		
Histosol (A1)			Dark Surfac	. ,				cm Muck (A10) (MLRA 147)		
Histic Epipedon (	,		Polyvalue B		. , .		148) Co	past Prairie Redox (A16)		
Black Histic (A3)			Thin Dark S	. ,	•	17, 148)	<b>D</b> .	(MLRA 147, 148)		
_ Hydrogen Sulfide	. ,		Loamy Gley		-2)		Pie	edmont Floodplain Soils (F19)		
Stratified Layers	. ,		X Depleted Ma	. ,	2)		14-	(MLRA 136, 147)		
_ 2 cm Muck (A10)	. ,		Redox Dark		,		Very Shallow Dark Surface (TF12)			
_ Depleted Below [	•	1)	Depleted Da		. ,		Ot	her (Explain in Remarks)		
_ Thick Dark Surface	. ,		Redox Depr		,					
Sandy Mucky Mir	· ,		Iron-Manga		s (F12)					
(LRR N, MLRA 1			(LRR N, ML	,		400	31			
Sandy Gleyed Ma	. ,			hbric Surface (F13) (MLRA 136, 122) edmont Floodplain Soils (F19) (MLRA 148)				ors of hydrophytic vegetation and		
_ Sandy Redox (St	,			•	• • •			etland hydrology must be present.		
	56)		Red Parent	Material (F2	21) (MLRA	A 127, 147	) un	less disturbed or problematic.		
Stripped Matrix (S										
estrictive Layer (if o	observed):									
	observed):		_							

Project/Site: E	Bright Mountain Solar	City/County:	Hazard, Perry Co	ounty	Sampling Date:	04/13/2022
Applicant/Owner:	Avangrid Renewables,			: Kentucky	Sampling Point:	14-W006-1U
Investigator(s):	CM, RMS, JK	Section, Township, Ra			y of Hazard	
Landform (hillslope, terrace, etc):		- Local relief (concave,		concav	e Slope (	(%): 10-25
Subregion (LRR or MLRA):	LRR N Lat:	37.2962645	Long:	-83.286628		
Soil Map Unit Name: Mat	tewan-Marrowbone-Latham complex, 20	to 80 percent slopes, ve	ery rocky	NWI classification	on:	
Are climatic / hydrologic conditions	s on the site typical for this time of year?	Yes X No	(If no, ex	plain in Remark	s.)	
Are Vegetation , Soil	X , or Hydrologysignifican	tly disturbed?	Are "Normal Circur	mstances" prese	nt? Yes X	No
	X , or Hydrology naturally		(If needed, explain	any answers in	Remarks.)	
SUMMARY OF FINDINGS	- Attach site map showing sar	npling point locati	ons, transects	, important	features, etc.	
Hydrophytic Vegetation Present					· · ·	
Hydric Soil Present?	Yes No X	Is the Sam	pled Area			
Wetland Hydrology Present?	Yes No X	within a W	-	Yes	No X	
Remarks: Reclaimed coal mi	ne					
HYDROLOGY						
Wetland Hydrology Indicators						
	one required: check all that apply)		S	Secondary Indica	ators (minimum of tw	vo required)
Surface Water (A1)	· · · · · · · · · · · · · · · · · · ·	c Plants (B14)			Cracks (B6)	´
High Water Table (A2)	Hydrogen Si	ulfide Odor (C1)	-	Sparsely Ve	getated Concave Si	urface (B8)
Saturation (A3)	Oxidized Rh	izospheres on Living Ro	ots (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)	Presence of	Reduced Iron (C4)	_	Moss Trim L	ines (B16)	
Sediment Deposits (B2)	Recent Iron	Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck S		-	Crayfish Bu		
Algal Mat or Crust (B4)	Other (Expla	ain in Remarks)	-		isible on Aerial Ima	
Iron Deposits (B5)			-		Stressed Plants (D1)	)
Inundation Visible on Aeria	,		-		Position (D2)	
Water-Stained Leaves (B9)	1		-	Shallow Aqu		
Aquatic Fauna (B13)			-	FAC-Neutra	aphic Relief (D4)	
					riest (D0)	
Field Observations:						
Surface Water Present?	Yes <u>No X</u> Depth (incl	nes):				
Water Table Present?	Yes <u>No X</u> Depth (incl					
Saturation Present?	Yes <u>No X</u> Depth (inch	nes):	Wetland Hydrol	logy Present?	Yes	No X
(includes capillary fringe)						
Describe Recorded Data (strear	n gauge, monitoring well, aerial photos,	previous inspections), if	available:			
Remarks:						

	s of plant							
				Dominance Test	worksheet:			
				Number of Domina	ant Species			
	Abaaluta	Deminant	Indiantan				0	( • )
	Absolute	Dominant	Indicator	That Are OBL, FA	SW, or FAC:		0	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status					
1.				Total Number of D	ominant			
			·					-
2.	_	_		Species Across Al	Strata:		1	(B)
3								
A				Demonst of Domina	nt Chaolan			
4.		_		Percent of Domina				
5				That Are OBL, FA	CW, or FAC:		0.0	(A/B)
			·	Prevalence Index	workshoot			
7	-	_						
	0	= Total Cov	er	Total % Cove	er of:	M	ultiply by:	_
50% of total cover: 0	200/	of total cover:		OBL species	0	x 1 =	0	
	20%	or total cover.	0	· · · -	0	-	0	_
Sapling/Shrub Stratum (Plot size: 15 )				FACW species	0	x 2 =	0	_
				FAC species	0	x 3 =	0	
1				FACU species	110	x 4 =	440	_
2				-		-		
3				UPL species	10	x 5 =	50	
4			·	Column Totals:	120	(A)	490	(B)
4.					120	(/ )	400	(0)
5.								
6.				Prevalence	ndex = B/A =		4.08	
0.								_
7				I had a set to the Mar Mar				
8				Hydrophytic Vege				
			·	1 - Rapid Tes	t for Hydrophy	tic Vege	tation	
9	-	-		2 - Dominanc				
	0	= Total Cov	er			0		
E00/ of total approx	200/	= of total action	0	3 - Prevalenc	e Index ≤3.0¹			
50% of total cover: 0	20%	of total cover:	0	4 - Morpholog	ical Adaptatio	ons <sup>1</sup> (Pro	vide suppor	ina
Herb Stratum (Plot size: 5 )								ing
1. Andropogon virginicus / Broomsedge bluestem	90		FACU	Problematic H	iydrophytic V	egetation	' (Explain)	
1. Mildropogon virginicus / Broomseuge Bidestern		Yes			5 1 5			
		Yes			, , ,			
2. Plantago major / Common plantain	20	Yes No	FACU			tland byd		
	20	No	FACU	<sup>1</sup> Indicators of hydr	ic soil and we	-		
Plantago major / Common plantain     Aster / Aster	20	-			ic soil and we	-		
	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr	ic soil and we	-		
3. Aster / Aster 4.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless	ic soil and we disturbed or	problema		
3. Aster / Aster 4 5	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr	ic soil and we disturbed or	problema		
3. Aster / Aster 4.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless	ic soil and we disturbed or	problema		
3. Aster / Aster 4 5 6	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless Definitions of For	ic soil and we disturbed or ur Vegetatior	problema Strata	atic.	
3. Aster / Aster 4 5 6 7	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster         4.         5.         6.         7.         8.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster 4 5 6 7	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster         4.         5.         6.         7.         8.         9.         40	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh	problema <b>Strata</b> vines, 3 i nt (DBH),	n. (7.6 cm) regardless	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         40	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh	problema <b>Strata</b> vines, 3 i nt (DBH),	n. (7.6 cm) regardless	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60	20 10 	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - V than 3 in. DBH and tall.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than	excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60           Woody Vine Stratum           (Plot size:           30           1.	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding tt breast heigi Voody plants, d greater than ous (non-woo	vines, 3 i excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - V than 3 in. DBH and tall.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding tt breast heigi Voody plants, d greater than ous (non-woo	vines, 3 i excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60           Woody Vine Stratum           (Plot size:           30           1.           2.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding tt breast heigi Voody plants, d greater than ous (non-woo	vines, 3 i excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         3.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace size, and woody p	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60           Woody Vine Stratum           (Plot size:           30           1.           2.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         3.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For</li> <li>Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - W than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.	20 10 10 120 20% (	No No = Total Cov of total cover:	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace size, and woody p	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For</li> <li>Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - W than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace size, and woody p <b>Woody vines</b> - All height.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover:	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - V than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All height.</li> <li>Hydrophytic</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	strata vines, 3 i nt (DBH), excludin or equal ody) plant n 3.28 ft t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - V than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All height.</li> <li>Hydrophytic Vegetation</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less than woody vines	problema <b>Strata</b> vines, 3 i nt (DBH), excludin or equal ody) plani n 3.28 ft t greater t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 is, regardles all. han 3.28 ft i	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - V than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All height.</li> <li>Hydrophytic</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	problema <b>Strata</b> vines, 3 i nt (DBH), excludin or equal ody) plani n 3.28 ft t greater t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of

c	<b>^</b>	ı	
Э	υ	I	ᄂ

Depth	Matrix		Redox F							
(inches)	Color (moist)	%	Color (moist)	% Type <sup>1</sup>	Loc <sup>2</sup>	Texture	- <u></u>	Remarks		
0-6	10YR 4/1	100				Silt Loam		coal mine, rocky surface, refu		
Гуре: С=Со	ncentration, D=Depletic	n, RM=Redu		d Sand Grains.		2F0C	ation: PL=Pore	e Lining, M=Matrix.		
Hydric Soil Indicators: Histosol (A1) Dark Surface (S7)						Indicators for Problematic Hydric Soils <sup>3</sup> : 2 cm Muck (A10) (MLRA 147)				
Histoc Epipedon (A2)			Polyvalue Be	/I RA 147 1						
Black Histic (A3)			Thin Dark Su		(MLRA 147, 148)					
Hydrogen Sulfide (A4)			Loamy Gleye	· · · , · · · <b>·</b> ,	Piedmont Floodplain Soils (F19)					
Stratified Layers (A5)			Depleted Mat		(MLRA 136, 147)					
2 cm Muck (A10) (LRR N)			Redox Dark S		Very Shallow Dark Surface (TF12)					
Depleted Below Dark Surface (A11)			Depleted Dar		Other (Explain in Remarks)					
Thick Dark Surface (A12)			Redox Depre	ssions (F8)						
Sandy N	/lucky Mineral (S1)		Iron-Mangane	ese Masses (F12)						
(LRR N, MLRA 147,148)			(LRR N, MLF							
Sandy Gleyed Matrix (S4)			Umbric Surface (F13) (MLRA 136, 122)			<sup>3</sup> Indicators of hydrophytic vegetation and				
Sandy Redox (S5)			Piedmont Floodplain Soils (F19) (MLRA 148)			) wetland hydrology must be present.				
Stripped Matrix (S6)			Red Parent Material (F21) (MLRA 127, 147)			) unless disturbed or problematic.				
	.ayer (if observed):									
						Hydric Soil F	Procont?	Yes No X		
estrictive L Type: Depth (in	iches):					Hyunc Son F	iesent:			

Project/Site: E	Bright Mountain Solar	City/County:	Hazard, Perry Co	ry County Sampling Date: 04/13/2022				
Applicant/Owner:	Avangrid Renewables,			: Kentucky	Sampling Point:	14-W006-1U		
Investigator(s):	CM, RMS, JK	Section, Township, Ra			y of Hazard			
Landform (hillslope, terrace, etc):		Local relief (concave,		concave	e Slope (	(%): 10-25		
Subregion (LRR or MLRA):	LRR N Lat:	37.2962645	Long:	-83.286628				
Soil Map Unit Name: Mat	tewan-Marrowbone-Latham complex, 20	to 80 percent slopes, ve	ery rocky	NWI classificatio	on:			
Are climatic / hydrologic conditions	s on the site typical for this time of year?	Yes X No	(If no, ex	plain in Remark	s.)			
Are Vegetation , Soil	X , or Hydrologysignifican	tly disturbed?	Are "Normal Circur	mstances" prese	ent? Yes X	No		
	X , or Hydrology naturally		(If needed, explain	any answers in	Remarks.)			
SUMMARY OF FINDINGS	- Attach site map showing sar	npling point locati	ons, transects	, important	features, etc.			
Hydrophytic Vegetation Present		· • • ·		•				
Hydric Soil Present?	Yes No X	Is the Sam	pled Area					
Wetland Hydrology Present?	Yes No X	within a W	-	Yes	No X			
Remarks: Reclaimed coal mi	ne							
HYDROLOGY								
Wetland Hydrology Indicators								
	one required: check all that apply)		S	Secondary Indica	ators (minimum of tw	vo required)		
Surface Water (A1)	True Aquatio	c Plants (B14)		Surface Soil	Cracks (B6)			
High Water Table (A2)	Hydrogen Si	ulfide Odor (C1)		Sparsely Vegetated Concave Surface (B8)				
Saturation (A3)	Oxidized Rh	izospheres on Living Ro	ots (C3)	Drainage Pa	atterns (B10)			
Water Marks (B1)	Presence of	Reduced Iron (C4)	_	Moss Trim L	ines (B16)			
Sediment Deposits (B2)	Recent Iron	Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)			
Drift Deposits (B3)	Thin Muck S		-	Crayfish Bu				
Algal Mat or Crust (B4)	Other (Expla	ain in Remarks)	-		isible on Aerial Ima			
Iron Deposits (B5)			-		Stressed Plants (D1)	1		
Inundation Visible on Aeria	,		-		Position (D2)			
Water-Stained Leaves (B9)	1		-	Shallow Aqu				
Aquatic Fauna (B13)			-	FAC-Neutra	aphic Relief (D4)			
					r lest (D5)			
Field Observations:								
Surface Water Present?	Yes <u>No X</u> Depth (incl	nes):						
Water Table Present?	Yes <u>No X</u> Depth (incl	·						
Saturation Present?	Yes <u>No X</u> Depth (inch	nes):	Wetland Hydrol	logy Present?	Yes	No X		
(includes capillary fringe)								
Describe Recorded Data (strear	n gauge, monitoring well, aerial photos,	previous inspections), if	available:					
Remarks:								
	s of plant							
--	--	---	------------	---	---	--	---	------------------------
				Dominance Test	worksheet:			
				Number of Domina	ant Species			
	Abaaluta	Deminant	Indiantan				0	( • )
	Absolute	Dominant	Indicator	That Are OBL, FA	SW, or FAC:		0	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status					
1.				Total Number of D	ominant			
			·					-
2.	_	_		Species Across Al	Strata:		1	(B)
3								
A				Demonst of Domina	nt Chaolan			
4.		_		Percent of Domina				
5				That Are OBL, FA	CW, or FAC:		0.0	(A/B)
			·	Prevalence Index	workshoot			
7	-	_						
	0	= Total Cov	er	Total % Cove	er of:	Mu	ultiply by:	_
50% of total cover: 0	200/	of total cover:		OBL species	0	x 1 =	0	
	20%	or total cover.	0	· · · -	0	-	0	_
Sapling/Shrub Stratum (Plot size: 15 )				FACW species	0	x 2 =	0	_
				FAC species	0	x 3 =	0	
1				FACU species	110	x 4 =	440	_
2				-		-		
3				UPL species	10	x 5 =	50	
4	-		·	Column Totals:	120	(A)	490	(B)
4.					120	(/ )	400	(0)
5.								
6.				Prevalence	ndex = B/A =		4.08	
0.								_
7				I had a set to the Mar Mar				
8				Hydrophytic Vege				
· · · · · · · · · · · · · · · · · · ·			·	1 - Rapid Tes	t for Hydrophy	tic Vege	tation	
9	-	_		2 - Dominanc				
	0	= Total Cov	er			0		
E00/ of total approx	200/	= of total action	0	3 - Prevalenc	e Index ≤3.0¹			
50% of total cover: 0	20%	of total cover:	0	4 - Morpholog	ical Adaptatio	ons <sup>1</sup> (Pro	vide suppor	ina
Herb Stratum (Plot size: 5 )								ing
1. Andropogon virginicus / Broomsedge bluestem	90		FACU	Problematic H	iydrophytic V	egetation	' (Explain)	
1. Mildropogon virginicus / Broomseuge Bidestern		Yes			5 1 5			
	_	Yes			, , ,			
2. Plantago major / Common plantain	20	Yes No	FACU			tland byd		
	20	No	FACU	<sup>1</sup> Indicators of hydr	ic soil and we	-		
2. Plantago major / Common plantain 3. Aster / Aster	20	-			ic soil and we	-		
	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr	ic soil and we	-		
3. Aster / Aster 4.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless	ic soil and we disturbed or	problema		
3. Aster / Aster 4 5	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr	ic soil and we disturbed or	problema		
3. Aster / Aster 4.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless	ic soil and we disturbed or	problema		
3. Aster / Aster 4 5 6	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless Definitions of For	ic soil and we disturbed or ur Vegetatior	problema Strata	atic.	
3. Aster / Aster 4 5 6 7	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster         4.         5.         6.         7.         8.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster 4 5 6 7	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster         4.         5.         6.         7.         8.         9.         40	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a	ic soil and we disturbed or ur Vegetation ts, excluding	problema <b>Strata</b> vines, 3 i	atic. n. (7.6 cm)	or
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh	problema <b>Strata</b> vines, 3 i nt (DBH),	n. (7.6 cm) regardless	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         40	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh	problema <b>Strata</b> vines, 3 i nt (DBH),	n. (7.6 cm) regardless	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.	20 10	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60	20 10 	No No	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants,	problema <b>Strata</b> vines, 3 i nt (DBH), excludin	n. (7.6 cm) regardless g vines, less	or of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - V than 3 in. DBH and tall.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60           Woody Vine Stratum           (Plot size:           30           1.	20 10 	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding tt breast heigi Voody plants, d greater than ous (non-woo	vines, 3 i trata excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - V than 3 in. DBH and tall.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding tt breast heigi Voody plants, d greater than ous (non-woo	vines, 3 i trata excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60           Woody Vine Stratum           (Plot size:           30           1.           2.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding tt breast heigi Voody plants, d greater than ous (non-woo	vines, 3 i trata excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1	or of m)
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         3.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace size, and woody p	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster           4.           5.           6.           7.           8.           9.           10.           11.           50% of total cover:           60           Woody Vine Stratum           (Plot size:           30           1.           2.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         3.	20 10 10 10 10 10 120 20%	No No 	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For</li> <li>Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - W than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.	20 10 10 10 20% (	No No = Total Cov of total cover:	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace size, and woody p	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For</li> <li>Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - W than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<sup>1</sup> Indicators of hydr be present, unless <b>Definitions of For</b> <b>Tree</b> - Woody plan more in diameter a height. <b>Sapling/Shrub</b> - W than 3 in. DBH and tall. <b>Herb</b> - All herbace size, and woody p <b>Woody vines</b> - All height.	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover:	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - V than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All height.</li> <li>Hydrophytic</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	vines, 3 i nt (DBH), excludin or equal	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - V than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All height.</li> <li>Hydrophytic Vegetation</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less than woody vines	problema <b>Strata</b> vines, 3 i nt (DBH), excludin or equal ody) plani n 3.28 ft t greater t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 is, regardles all. han 3.28 ft i	or of m) s of
3. Aster / Aster         4.         5.         6.         7.         8.         9.         10.         11.         50% of total cover:         60         Woody Vine Stratum         (Plot size:         30         1.         2.         3.         4.         5.	20 10 10 120 20% (	No No = Total Cov of total cover: = Total Cov	FACU NI	<ul> <li><sup>1</sup>Indicators of hydr be present, unless</li> <li>Definitions of For Tree - Woody plan more in diameter a height.</li> <li>Sapling/Shrub - V than 3 in. DBH and tall.</li> <li>Herb - All herbace size, and woody p</li> <li>Woody vines - All height.</li> <li>Hydrophytic</li> </ul>	ic soil and we disturbed or <b>ur Vegetatior</b> ts, excluding at breast heigh Voody plants, d greater than ous (non-woo lants less that	problema <b>Strata</b> vines, 3 i nt (DBH), excludin or equal ody) plani n 3.28 ft t greater t	n. (7.6 cm) regardless g vines, less to 3.28 ft (1 ts, regardles all.	or of m) s of

c	<b>^</b>	ı	
Э	υ	I	ᄂ

Depth	Matrix		Redox Fe						
(inches)	Color (moist)	%	Color (moist)	% Type <sup>1</sup>	Loc <sup>2</sup>	Texture	·	Remarks	
0-6	10YR 4/1	100				Silt Loam	Reclaimed	coal mine, rocky surface, refu	
Гуре: С=Со	ncentration, D=Depletic	on, RM=Redu	iced Matrix, MS=Masked	Sand Grains.		2Loca	ation: PL=Por	re Lining, M=Matrix.	
ydric Soil I Histosol	ndicators:		Dark Surface	(\$7)				natic Hydric Soils³: 10) (MLRA 147)	
_	pipedon (A2)			ow Surface (S8) (M	I RA 147 1		coast Prairie F		
_ '	istic (A3)			face (S9) (MLRA 1			(MLRA 147	( )	
-	en Sulfide (A4)		Loamy Gleyed		,	Р	•	dplain Soils (F19)	
_ ` `	d Layers (A5)		Depleted Matr	. ,			(MLRA 136	,	
	uck (A10) (LRR N)		Redox Dark S	urface (F6)		V	ery Shallow E	Dark Surface (TF12)	
Deplete	d Below Dark Surface (	A11)	Depleted Dark	Surface (F7)		Other (Explain in Remarks)			
Thick Da	ark Surface (A12)		Redox Depres	sions (F8)					
Sandy N	/lucky Mineral (S1)		Iron-Mangane	se Masses (F12)					
(LRR N,	, MLRA 147,148)		(LRR N, MLR	A 136)					
Sandy G	Gleyed Matrix (S4)		Umbric Surfac	e (F13) (MLRA 136	6, 122)	<sup>3</sup> Indica	ators of hydro	phytic vegetation and	
Sandy F	Redox (S5)		Piedmont Floo	dplain Soils (F19) <b>(</b> I	MLRA 148)	w	etland hydrol	ogy must be present.	
Stripped	l Matrix (S6)		Red Parent Ma	aterial (F21) (MLR	A 127, 147)	") unless disturbed or problematic.			
	₋ayer (if observed):								
							<b>New 2 10 10</b>	Vee Ne Y	
estrictive L Type: Depth (in	iches):					Hydric Soil F	resent?	Yes No X	

Project/Site:	Bright Mounta	ain Solar		City/Cou	nty:	Hazard, Perry	County	Sampling Date:	04/13/2022
Applicant/Owner:		Avangrid	Renewables, L	LC		Sta	ate: Kentucky	Sampling Point:	14-W006-1W
Investigator(s):	CM, RM	IS, JK		Section,	Township, Rar	nge:	Cit	y of Hazard	
Landform (hillslope, terrace	, etc): Bov	vl shaped dep	ression	Local reli	ef (concave, c	onvex, none):	concave	e Slope	(%): 0-2
Subregion (LRR or MLRA):	LF	RR N	Lat:	37.2	29625917	Long:	-83.2867608	33 Datum	n: WGS 84
Soil Map Unit Name:	Matewan-Marro	wbone-Lathar	n complex, 20 t	to 80 perce	ent slopes, ver	y rocky	NWI classification	on:	
Are climatic / hydrologic cor	ditions on the site	typical for this	time of year?	Yes 🛛	X No	(If no,	explain in Remark	s.)	
Are Vegetation, S	Soil <u>X</u> , or Hy	ydrology	significant	y disturbed	d? A	re "Normal Circ	cumstances" prese	nt? Yes X	< No
Are Vegetation, S	Soil <u>X</u> , or Hy	ydrology	naturally p	roblematic	? (	lf needed, expla	in any answers in	Remarks.)	
SUMMARY OF FINDI	NGS - Attach s	site map sł	lowing sam	npling po	oint locatio	ons, transec	ts, important i	features, etc.	
Hydrophytic Vegetation P	resent?	Yes X	No						
Hydric Soil Present?		Yes X	No	-	Is the Samp	oled Area			
Wetland Hydrology Prese	ent?	Yes X	No	-	within a We	tland?	Yes X	No	
Remarks: Reclaimed o	oal mine								
HYDROLOGY									
Wetland Hydrology Indi	cators:								]
Primary Indicators (minim		d: check all tha	t apply)				Secondary Indica	tors (minimum of t	wo required)
X Surface Water (A1)			True Aquatic	Plants (B1	4)			Cracks (B6)	
High Water Table (A	2)		Hydrogen Su		•		Sparsely Ve	getated Concave S	Surface (B8)
Saturation (A3)		Х	Oxidized Rhiz	zospheres	on Living Roo	ts (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)			Presence of F	Reduced Ir	on (C4)		Moss Trim L	ines (B16)	
Sediment Deposits (	B2)		Recent Iron F	Reduction i	n Tilled Soils (	C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)			Thin Muck Su	• • •			Crayfish Bu	. ,	
Algal Mat or Crust (E	34)		Other (Explai	n in Rema	rks)			isible on Aerial Ima	
Iron Deposits (B5)		-,						Stressed Plants (D1	)
Inundation Visible or	0,10	7)						Position (D2)	
Water-Stained Leave Aquatic Fauna (B13	( )						Shallow Aqu	aphic Relief (D4)	
	,						X FAC-Neutra		
								1001 (20)	
Field Observations:									
Surface Water Present?	Yes X	No	Depth (inch	·	2				
Water Table Present?	Yes	No X	Depth (inche						
Saturation Present?	Yes	No X	Depth (inche	es):		Wetland Hydi	rology Present?	Yes X	No
(includes capillary fringe)									
Describe Recorded Data	(stream gauge, mo	onitoring well, a	aerial photos, p	previous in	spections), if a	vailable:			
Remarks:									

VEGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling	J Point:	14-W	006-1W
				Dominance Test worksheet:			
				Number of Dominant Species			
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC:		2	(A)
				That Are OBL, FACW, of FAC.		2	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status				
1				Total Number of Dominant			
2.				Species Across All Strata:		3	(B)
						-	(-)
3							
4				Percent of Dominant Species			
5				That Are OBL, FACW, or FAC:	6	6.7	(A/B)
6							
7				Prevalence Index worksheet:			
7		Tatal Oas	·	Total % Cover of:	Multi	ply by:	
	0	= Total Cov			1 =	70	_
50% of total cover: 0	20% (	of total cover	0				_
Sapling/Shrub Stratum (Plot size: 15 )					2 =	60	_
1. Salix / Willow	10	Yes	NI	FAC species 0 x 3	3 =	0	
				FACU species 0 x 4	4 =	0	_
2				· · · · · · · · · · · · · · · · · · ·	5 =		_
3					-		
4				Column Totals: 110 (A	·)	180	(B)
5			-				
		-		Prevalence Index = B/A =	1	.64	
							_
7				Hydrophytic Vegetation Indicator	·e ·		
8							
9.				1 - Rapid Test for Hydrophytic	vegetati	on	
	10	= Total Cov	or	X 2 - Dominance Test is >50%			
		-		X 3 - Prevalence Index ≤3.0 <sup>1</sup>			
50% of total cover: 5	20% (	of total cover	2	4 - Morphological Adaptations <sup>1</sup>	Provid	e supporti	na
Herb Stratum (Plot size: 5 )							ng
1. Typha latifolia / Broadleaf cattail, Broad-leaved cattail	70	Yes	OBL	Problematic Hydrophytic Veget	tation. (E	=xpiain)	
2. Scirpus cyperinus / Woolgrass	30	Yes	FACW				
			17.011	<sup>1</sup> Indicators of hydric soil and wetland	d hydrol	logy must	
3				be present, unless disturbed or prot	blematic		
4				F,			
5				Definitions of Four Vegetation Str	rata		
6.				Deminions of Four Vegetation of	lutu		
7							
7				Tree - Woody plants, excluding vine			
8				more in diameter at breast height (D	ЭВН), re	gardless o	of
9				height.			
10.			-				
11				Sapling/Shrub - Woody plants, exc			
	100	= Total Cov	er	than 3 in. DBH and greater than or e	equal to	3.28 ft (1	m)
50% of total cover: 50	20% (	of total cover	20	tall.			
Woody Vine Stratum (Plot size: 30)							
	·			Herb - All herbaceous (non-woody)			s of
2				size, and woody plants less than 3.2	28 ft tall.	•	
3							
4.				Weedu vinee All weedu vinee are	otor the	- 2 20 # ir	
5.				Woody vines - All woody vines great	ater that	11 3.20 IL II	1
5				height.			
	0	= Total Cov					
50% of total cover: 0	20% (	of total cover	0	Hydrophytic			
				Vegetation			
				•	No		
				Present? Yes X	- 110 -		
Remarks: (Include photo numbers here or on a separate sheet.	)			•			

-	-	-	
c	n	I	
	J	I	L

Depth	Matrix		Redox	Features						
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-8	5Y 4/2	98	7.5YR 5/8	2	<u> </u>	M,PL	Clay Loam	Rocky refusal multiple pits, reclaimed coa		
Type: C=Cor	· ·	n, RM=Red	uced Matrix, MS=Mask	ed Sand Gra	ains.			ation: PL=Pore Lining, M=Matrix.		
Histosol			Dark Surfac	· · /	e (S8) <b>(M</b>	LRA 147, 1	2	<b>s for Problematic Hydric Soils³:</b> cm Muck (A10) <b>(MLRA 147)</b> coast Prairie Redox (A16)		
	n Sulfide (A4)		Thin Dark S	ed Matrix (F	•	47, 148)	P	(MLRA 147, 148) iedmont Floodplain Soils (F19)		
_	l Layers (A5) ck (A10) <b>(LRR N)</b>		X Depleted M Redox Dark	. ,	6)			(MLRA 136, 147) ery Shallow Dark Surface (TF12)		
Thick Da	l Below Dark Surface ( Irk Surface (A12) Iucky Mineral (S1)	A11)	Depleted Da Redox Depl Iron-Manga	essions (F8 nese Masse	)		0	ther (Explain in Remarks)		
Sandy G	MLRA 147,148) leyed Matrix (S4) edox (S5) Matrix (S6)		(LRR N, ML Umbric Surf Piedmont F Red Parent	ace (F13) ( loodplain Sc	oils (F19) <b>(</b> I	MLRA 148)	, , , , , , , , , , , , , , , , , , , ,			
estrictive L Type:	ayer (if observed):						Hydric Soil F	Present? Yes X No		

Project/Site:	Bright Mounta	ain Solar		City/Cou	nty:	Hazard, Perry	County	Sampling Date:	04/13/2022
Applicant/Owner:		Avangrid	Renewables, L	LC		Sta	ate: Kentucky	Sampling Point:	14-W006-1W
Investigator(s):	CM, RM	IS, JK		Section,	Township, Rar	nge:	Cit	y of Hazard	
Landform (hillslope, terrace	, etc): Bov	vl shaped dep	ression	Local reli	ef (concave, c	onvex, none):	concave	e Slope	(%): 0-2
Subregion (LRR or MLRA):	LF	RR N	Lat:	37.2	29625917	Long:	-83.2867608	33 Datum	n: WGS 84
Soil Map Unit Name:	Matewan-Marro	wbone-Lathar	n complex, 20 t	to 80 perce	ent slopes, ver	y rocky	NWI classification	on:	
Are climatic / hydrologic cor	ditions on the site	typical for this	time of year?	Yes 🛛	X No	(If no,	explain in Remark	s.)	
Are Vegetation, S	Soil <u>X</u> , or Hy	ydrology	significant	y disturbed	d? A	re "Normal Circ	cumstances" prese	nt? Yes X	< No
Are Vegetation, S	Soil <u>X</u> , or Hy	ydrology	naturally p	roblematic	? (	lf needed, expla	in any answers in	Remarks.)	
SUMMARY OF FINDI	NGS - Attach s	site map sł	lowing sam	npling po	oint locatio	ons, transec	ts, important i	features, etc.	
Hydrophytic Vegetation P	resent?	Yes X	No						
Hydric Soil Present?		Yes X	No	-	Is the Samp	oled Area			
Wetland Hydrology Prese	ent?	Yes X	No	-	within a We	tland?	Yes X	No	
Remarks: Reclaimed o	oal mine								
HYDROLOGY									
Wetland Hydrology Indi	cators:								]
Primary Indicators (minim		d: check all tha	t apply)				Secondary Indica	tors (minimum of t	wo required)
X Surface Water (A1)			True Aquatic	Plants (B1	4)			Cracks (B6)	
High Water Table (A	2)		Hydrogen Su		•		Sparsely Ve	getated Concave S	Surface (B8)
Saturation (A3)		Х	Oxidized Rhiz	zospheres	on Living Roo	ts (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)			Presence of F	Reduced Ir	on (C4)		Moss Trim L	ines (B16)	
Sediment Deposits (	B2)		Recent Iron F	Reduction i	n Tilled Soils (	C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)			Thin Muck Su	• • •			Crayfish Bu	. ,	
Algal Mat or Crust (E	34)		Other (Explai	n in Rema	rks)			isible on Aerial Ima	
Iron Deposits (B5)		-,						Stressed Plants (D1	)
Inundation Visible or	0,10	7)						Position (D2)	
Water-Stained Leave Aquatic Fauna (B13	( )						Shallow Aqu	aphic Relief (D4)	
	,						X FAC-Neutra		
								1001 (20)	
Field Observations:									
Surface Water Present?	Yes X	No	Depth (inch	·	2				
Water Table Present?	Yes	No X	Depth (inche						
Saturation Present?	Yes	No X	Depth (inche	es):		Wetland Hydi	rology Present?	Yes X	No
(includes capillary fringe)									
Describe Recorded Data	(stream gauge, mo	onitoring well, a	aerial photos, p	previous in	spections), if a	vailable:			
Remarks:									

VEGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling	J Point:	14-W	006-1W
				Dominance Test worksheet:			
				Number of Dominant Species			
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC:		2	(A)
				That Are OBL, FACW, of FAC.		2	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status				
1				Total Number of Dominant			
2.				Species Across All Strata:		3	(B)
						-	(-)
3							
4				Percent of Dominant Species			
5				That Are OBL, FACW, or FAC:	6	6.7	(A/B)
6							
7				Prevalence Index worksheet:			
7		Tatal Oas	- <u> </u>	Total % Cover of:	Multi	ply by:	
	0	= Total Cov			1 =	70	_
50% of total cover: 0	20% (	of total cover	0				_
Sapling/Shrub Stratum (Plot size: 15 )					2 =	60	_
1. Salix / Willow	10	Yes	NI	FAC species 0 x 3	3 =	0	
				FACU species 0 x 4	4 =	0	_
2				· · · · · · · · · · · · · · · · · · ·	5 =		_
3					-		
4				Column Totals: 110 (A	·)	180	(B)
5			-				
				Prevalence Index = B/A =	1	.64	
							_
7				Hydrophytic Vegetation Indicator	·e ·		
8							
9.				1 - Rapid Test for Hydrophytic	vegetati	on	
	10	= Total Cov	or	X 2 - Dominance Test is >50%			
		-		X 3 - Prevalence Index ≤3.0 <sup>1</sup>			
50% of total cover: 5	20% (	of total cover	2	4 - Morphological Adaptations <sup>1</sup>	Provid	e supporti	na
Herb Stratum (Plot size: 5 )							ng
1. Typha latifolia / Broadleaf cattail, Broad-leaved cattail	70	Yes	OBL	Problematic Hydrophytic Veget	tation. (E	=xpiain)	
2. Scirpus cyperinus / Woolgrass	30	Yes	FACW				
			17.011	<sup>1</sup> Indicators of hydric soil and wetland	d hydrol	logy must	
3				be present, unless disturbed or prot	blematic		
4				F,			
5				Definitions of Four Vegetation Str	rata		
6.				Deminions of Four Vegetation of	lutu		
7							
7				Tree - Woody plants, excluding vine			
8				more in diameter at breast height (D	ЭВН), re	gardless o	of
9				height.			
10.			-				
11				Sapling/Shrub - Woody plants, exc			
	100	= Total Cov	er	than 3 in. DBH and greater than or e	equal to	3.28 ft (1	m)
50% of total cover: 50	20% (	of total cover	20	tall.			
Woody Vine Stratum (Plot size: 30)							
	·			Herb - All herbaceous (non-woody)			s of
2				size, and woody plants less than 3.2	28 ft tall.	•	
3							
4.				Mandu vinen All woody vince are	otor the	- 2 20 # ir	
5.				Woody vines - All woody vines great	ater that	11 3.20 11 11	1
5				height.			
	0	= Total Cov					
50% of total cover: 0	20% (	of total cover	0	Hydrophytic			
				Vegetation			
				•	No		
				Present? Yes X	- 110 -		
Remarks: (Include photo numbers here or on a separate sheet.	)			•			

-	-	-	
c	n	I	
	J	I	L

Depth	Matrix		Redox	Features						
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-8	5Y 4/2	98	7.5YR 5/8	2	<u> </u>	M,PL	Clay Loam	Rocky refusal multiple pits, reclaimed coa		
Type: C=Cor	· ·	n, RM=Red	uced Matrix, MS=Mask	ed Sand Gra	ains.			ation: PL=Pore Lining, M=Matrix.		
Histosol			Dark Surfac	· · /	e (S8) <b>(M</b>	LRA 147, 1	2	<b>s for Problematic Hydric Soils³:</b> cm Muck (A10) <b>(MLRA 147)</b> coast Prairie Redox (A16)		
	n Sulfide (A4)		Thin Dark S	ed Matrix (F	•	47, 148)	P	(MLRA 147, 148) iedmont Floodplain Soils (F19)		
_	l Layers (A5) ck (A10) <b>(LRR N)</b>		X Depleted M Redox Dark	. ,	6)			(MLRA 136, 147) ery Shallow Dark Surface (TF12)		
Thick Da	l Below Dark Surface ( Irk Surface (A12) Iucky Mineral (S1)	A11)	Depleted Da Redox Depl Iron-Manga	essions (F8 nese Masse	)		0	ther (Explain in Remarks)		
Sandy G	MLRA 147,148) leyed Matrix (S4) edox (S5) Matrix (S6)		(LRR N, ML Umbric Surf Piedmont F Red Parent	ace (F13) ( loodplain Sc	oils (F19) <b>(</b> I	MLRA 148)	, , , , , , , , , , , , , , , , , , , ,			
estrictive L Type:	ayer (if observed):						Hydric Soil F	Present? Yes X No		

Project/Site:	Bright Mountain Solar	City/County: H	lazard, Perry County	Sampling Date: 04/13/2022
Applicant/Owner:	Avangrid Renewables, I	LLC	State: Kentucky	Sampling Point: 14-W007-1W
Investigator(s):	CM, RMS, JK	Section, Township, Rang	e:	City of Hazard
Landform (hillslope, terrace, etc):	Bowl shaped depression	Local relief (concave, cor	nvex, none): conc	ave Slope (%): 0-2
Subregion (LRR or MLRA):	LRR N Lat:	37.3044535	Long: -83.28654	4717 Datum: WGS 84
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe	rcent slopes, benched, stor	ny NWI classifica	ation:
Are climatic / hydrologic condition	s on the site typical for this time of year?	Yes X No	(If no, explain in Rema	arks.)
Are Vegetation, Soil	, or Hydrologysignificant	tly disturbed? Are	e "Normal Circumstances" pre	esent? Yes X No
Are Vegetation, Soil	, or Hydrologynaturally p	problematic? (If	needed, explain any answers	in Remarks.)
SUMMARY OF FINDINGS	- Attach site map showing san	mpling point location	is, transects, importar	nt features, etc.
Hydrophytic Vegetation Present	t? Yes X No			
Hydric Soil Present?	Yes X No	Is the Sample	ed Area	
Wetland Hydrology Present?	Yes X No	within a Wetl	and? Yes	X No
Remarks: Reclaimed coal mi	ine	I		
HYDROLOGY				
Wetland Hydrology Indicators				
	one required: check all that apply)		Secondary Inc	licators (minimum of two required)
Surface Water (A1)		Plants (B14)		Soil Cracks (B6)
High Water Table (A2)	Hydrogen Sı	ulfide Odor (C1)	Sparsely	Vegetated Concave Surface (B8)
Saturation (A3)	X Oxidized Rhi	izospheres on Living Roots	(C3) Drainage	Patterns (B10)
Water Marks (B1)	Presence of	Reduced Iron (C4)	Moss Trir	m Lines (B16)
Sediment Deposits (B2)	Recent Iron	Reduction in Tilled Soils (C	6) Dry-Seas	on Water Table (C2)
Drift Deposits (B3)	Thin Muck S	( )		Burrows (C8)
Algal Mat or Crust (B4)	Other (Expla	in in Remarks)		n Visible on Aerial Imagery (C9)
Iron Deposits (B5)				or Stressed Plants (D1)
Inundation Visible on Aeria Water-Stained Leaves (B9	<b>u</b> , <i>i</i>			hic Position (D2) Aquitard (D3)
Aquatic Fauna (B13)	)			ographic Relief (D4)
				tral Test (D5)
Field Observations:				
Surface Water Present?	Yes <u>No X</u> Depth (inch			
Water Table Present?	Yes <u>No X</u> Depth (inch			
Saturation Present?	Yes <u>No X</u> Depth (inch	nes):	Wetland Hydrology Present	? Yes X No
(includes capillary fringe)				
Describe Recorded Data (stream	m gauge, monitoring well, aerial photos,	previous inspections), if ava	ailable:	
Remarks:				

### VEGETATION (Four Strata) - Use scientific names of plants.

EGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling Point:	14-W007-1V
				Dominance Test worksheet:	
				Number of Dominant Species	
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC: 3	(A)
ree Stratum (Plot size: 30 )	% Cover	Species?	Status		(,,)
I. Salix nigra / Black willow	5	Yes	OBL	Total Number of Dominant	
	5				
2. Platanus / Sycamore	5	Yes	NI	Species Across All Strata: 5	(B)
				Percent of Dominant Species	
		_		That Are OBL, FACW, or FAC: 60.0	(A/B)
				Prevalence Index worksheet:	
	10	= Total Cove	er	Total % Cover of: Multiply	by:
50% of total cover: 5	20%	of total cover:	2	OBL species 7 x 1 =	7
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 2 x 2 =	4
. Rosa multiflora / Multiflora rose, Multiflora rosa	2	Yes	FACU	FAC species 0 x 3 =	0
		res	FACU		8
				· · · · · · · · · · · · · · · · · · ·	25
3					
				Column Totals: <u>16</u> (A) <u>4</u>	14 (B)
				Prevalence Index = B/A = 2.75	
				Hydrophytic Vegetation Indicators:	
				1 - Rapid Test for Hydrophytic Vegetation	
	2	= Total Cove		X 2 - Dominance Test is >50%	
				X 3 - Prevalence Index ≤3.0 <sup>1</sup>	
50% of total cover: <u>1</u>	20%	of total cover:	0	4 - Morphological Adaptations <sup>1</sup> (Provide su	upporting
Herb Stratum (Plot size: 5 )				Problematic Hydrophytic Vegetation <sup>1</sup> (Exp	
. <u>Salix nigra / Black willow</u>	2	Yes	OBL		,
. Juncus effusus / Common bog rush, Soft or lamp rush	2	Yes	FACW	<sup>1</sup> Indicators of hydric soil and wetland hydrology	must
3					must
l				be present, unless disturbed or problematic.	
				Definitions of Four Venetation Strate	
				Definitions of Four Vegetation Strata	
·			·	Tree - Woody plants, excluding vines, 3 in. (7.6	
)				more in diameter at breast height (DBH), regar	dless of
)				height.	
0					
1				Sapling/Shrub - Woody plants, excluding vine	s. less
	4	= Total Cove	ər	than 3 in. DBH and greater than or equal to 3.2	
50% of total cover: 2	20%	of total cover:	1	tall.	. ,
Voody Vine Stratum (Plot size: 30 )					
·					
				Herb - All herbaceous (non-woody) plants, rega	ardless of
				size, and woody plants less than 3.28 ft tall.	
3		-	·		
				Woody vines - All woody vines greater than 3.	28 ft in
i		-		height.	
	0	= Total Cove	er		
50% of total cover: 0	20%	of total cover:	0	Hydrophytic	
				Vegetation	
				Present? Yes X No	

SOIL	J	Ο	I	L
------	---	---	---	---

Depth	Matrix		Redox	Features				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-7	10YR 5/1	80	7.5YR 4/6	2	С	M,PL	Clay	Rocky refusal multiple pits, reclaimed coa
7-8	10YR 5/1	50	10YR 5/8	50	C	M	Sand	Very gravely, refusal
ype: C=Cor	centration, D=Depletio	n, RM=Red	uced Matrix, MS=Mask	ed Sand Gr	ains.			cation: PL=Pore Lining, M=Matrix.
Histosol			Dark Surfac	e (S7)				2 cm Muck (A10) (MLRA 147)
-	vipedon (A2)			elow Surfac	e (S8) (M	LRA 147, 14		Coast Prairie Redox (A16)
Black His				Surface (S9)			<i>'</i> _	(MLRA 147, 148)
- Hydroge	n Sulfide (A4)		Loamy Gley	ed Matrix (F	=2)			Piedmont Floodplain Soils (F19)
Stratified	Layers (A5)		X Depleted M	atrix (F3)				(MLRA 136, 147)
2 cm Mu	ck (A10) (LRR N)		Redox Dark	Surface (F	6)			Very Shallow Dark Surface (TF12)
_ Depleted	Below Dark Surface (	A11)		ark Surface				Other (Explain in Remarks)
 Thick Da	rk Surface (A12)	,	Redox Dep	ressions (F8	3)			
Sandy M	lucky Mineral (S1)		Iron-Manga	nese Masse	, es (F12)			
	MLRA 147,148)		(LRR N, MI	.RA 136)	. ,			
Sandy G	leyed Matrix (S4)		Umbric Sur	face (F13)	(MLRA 136	6, 122)	³Indic	cators of hydrophytic vegetation and
-	edox (S5)			loodplain So	•			wetland hydrology must be present.
Stripped	Matrix (S6)		Red Parent	Material (F2	21) (MLR/	A 127, 147)	1	unless disturbed or problematic.
estrictive L	ayer (if observed):							
Туре:								
Depth (in	ches):						Hydric Soil	Present? Yes X No
= • P ··· (···								

Project/Site:	Bright Mountain Solar	City/County: Ha	azard, Perry County	Sampling Date: 04/13/2022
Applicant/Owner:	Avangrid Renewables,	LLC	State: Kentucky	Sampling Point: W007-1W
Investigator(s):	CM, RMS, JK	Section, Township, Range	: Cit	y of Hazard
Landform (hillslope, terrace, etc)	: Bowl shaped depression	Local relief (concave, con	vex, none): concav	e Slope (%): 0-2
Subregion (LRR or MLRA):	LRR N Lat:	37.3044535	Long: -83.286547	17 Datum: WGS 84
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe	rcent slopes, benched, ston	y NWI classification	on:
Are climatic / hydrologic condition	ns on the site typical for this time of year?	Yes X No	(If no, explain in Remark	s.)
Are Vegetation, Soil	, or Hydrologysignificant	tly disturbed? Are	"Normal Circumstances" prese	ent? Yes <u>X</u> No
Are Vegetation, Soil	, or Hydrologynaturally p	problematic? (If n	eeded, explain any answers in	Remarks.)
SUMMARY OF FINDINGS	S - Attach site map showing sar	mpling point locations	s, transects, important	features, etc.
Hydrophytic Vegetation Preser	nt? Yes X No			
Hydric Soil Present?	Yes X No	Is the Sample	d Area	
Wetland Hydrology Present?	Yes X No	within a Wetla	nd? Yes X	No
Remarks: Reclaimed coal n	nine			
HYDROLOGY				
Wetland Hydrology Indicator	rs:			
	of one required: check all that apply)		Secondary Indica	ators (minimum of two required)
Surface Water (A1)		Plants (B14)		Cracks (B6)
High Water Table (A2)	Hydrogen Su	ulfide Odor (C1)	Sparsely Ve	getated Concave Surface (B8)
Saturation (A3)	X Oxidized Rh	izospheres on Living Roots	(C3) Drainage Pa	atterns (B10)
Water Marks (B1)	Presence of	Reduced Iron (C4)	Moss Trim L	ines (B16)
Sediment Deposits (B2)	Recent Iron	Reduction in Tilled Soils (C6	) Dry-Season	Water Table (C2)
Drift Deposits (B3)	Thin Muck S	( )	Crayfish Bu	· ,
Algal Mat or Crust (B4)	Other (Expla	in in Remarks)		/isible on Aerial Imagery (C9)
Iron Deposits (B5)				Stressed Plants (D1)
Inundation Visible on Aer Water-Stained Leaves (B	<b>U U U</b>		Shallow Aqu	Position (D2)
Aquatic Fauna (B13)	5)			aphic Relief (D4)
			X FAC-Neutra	
				1001(20)
Field Observations:				
Surface Water Present?	Yes No X Depth (inch			
Water Table Present?	Yes <u>No X</u> Depth (inch			
Saturation Present?	Yes <u>No X</u> Depth (incl	nes): 🛛 🛛	Vetland Hydrology Present?	Yes <u>X</u> No
(includes capillary fringe)				
Describe Recorded Data (strea	am gauge, monitoring well, aerial photos,	previous inspections), if ava	ilable:	
Remarks:				

# VEGETATION (Four Strata) - Use scientific names of plants

VEGETATION (Four Strata) - Use scientific names	s of plant	s.		Sampling Point: W007-1W
				Dominance Test worksheet:
				Number of Dominant Species
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC: 3 (A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status	
1. Salix nigra / Black willow	5	Yes	OBL	Total Number of Dominant
2. Platanus / Sycamore	5	Yes	NI	Species Across All Strata: 5 (B)
3				
4.	·			Percent of Dominant Species
5.				That Are OBL, FACW, or FAC: 60.0 (A/B)
6				
7.				Prevalence Index worksheet:
···	10	= Total Cov	er	Total % Cover of: Multiply by:
50% of total cover: 5		of total cover:		OBL species 7 x 1 = 7
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 2 x 2 = 4
1. Rosa multiflora / Multiflora rose, Multiflora rosa	2	Ves	FACU	FAC species 0 x 3 = 0
			1400	FACU species 2 x 4 = 8
2	·			UPL species 5 x 5 = 25
3				Column Totals: 16 (A) 44 (B)
5				Prevalence Index = B/A = 2.75
6				
7		-		Hydrophytic Vegetation Indicators:
8		-		1 - Rapid Test for Hydrophytic Vegetation
9				X 2 - Dominance Test is >50%
	2			X 3 - Prevalence Index ≤3.0 <sup>1</sup>
	20%	of total cover:	0	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
Herb Stratum (Plot size: 5 )				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain )
1. Juncus effusus / Common bog rush, Soft or lamp rush	2	Yes	FACW	
2. <i>Salix nigra /</i> Black willow		Yes	OBL	<sup>1</sup> Indicators of hydric soil and wetland hydrology must
3				be present, unless disturbed or problematic.
4				
5				Definitions of Four Vegetation Strata
6				
7				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) or
8				more in diameter at breast height (DBH), regardless of
9				height.
10		-		
11				Sapling/Shrub - Woody plants, excluding vines, less
	4	= Total Cov		than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 2	20%	of total cover:	1	tall.
Woody Vine Stratum (Plot size: 30 )				
1				Herb - All herbaceous (non-woody) plants, regardless of
2				size, and woody plants less than 3.28 ft tall.
3.				
4.				Woody vines - All woody vines greater than 3.28 ft in
5.				height.
	0	= Total Cov	er	
50% of total cover:0	20%	of total cover:		Hydrophytic
				Vegetation
				Present?         Yes         X         No
Remarks: (Include photo numbers here or on a separate sheet.	)			

SOIL	J	Ο	I	L
------	---	---	---	---

Depth	Matrix		Redox	Features				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-7	10YR 5/1	80	7.5YR 4/6	2	С	M,PL	Clay	Rocky refusal multiple pits, reclaimed coa
7-8	10YR 5/1	50	10YR 5/8	50		M	Sand	Very gravely, refusal
ype: C=Cor ydric Soil I	ncentration, D=Depletion	n, RM=Redu	uced Matrix, MS=Mask	ed Sand Gra	ains.			cation: PL=Pore Lining, M=Matrix.  rs for Problematic Hydric Soils <sup>3</sup> :
Histosol			Dark Surfac	e (S7)				2 cm Muck (A10) <b>(MLRA 147)</b>
-	pipedon (A2)			Below Surfac	e (S8) <b>(M</b>	LRA 147. 14		Coast Prairie Redox (A16)
Black Hi	,			Surface (S9)	• • •			(MLRA 147, 148)
_	n Sulfide (A4)			/ed Matrix (F	•	,,	r	Piedmont Floodplain Soils (F19)
	Layers (A5)		X Depleted M		_/			(MLRA 136, 147)
_	ick (A10) (LRR N)			surface (F6	;)		``	Very Shallow Dark Surface (TF12)
_	Below Dark Surface (A	11)		ark Surface (	,			Other (Explain in Remarks)
	ark Surface (A12)	<b>\</b> \\)		ressions (F8	· ·		`	
_	lucky Mineral (S1)			nese Masse				
_ `	MLRA 147,148)		(LRR N, MI		3 (1 12)			
•	ileyed Matrix (S4)		•	face (F13) (	MI RA 136	\$ 122)	<sup>3</sup> Indic	ators of hydrophytic vegetation and
	edox (S5)			loodplain So				wetland hydrology must be present.
_ ·	Matrix (S6)			Material (F2	· / ·			unless disturbed or problematic.
Supped				ivialenai (F2		· · 2/, · 4/)		
estrictive L	ayer (if observed):							
Type:								
1390.							Hydric Soil	Present? Yes X No

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry County	Sampling Date: 04/13/2022
Applicant/Owner:	Avangrid Renewables, I		State: Ke	
Investigator(s):	CM, RMS, JK	Section, Township, Ra		City of Hazard
Landform (hillslope, terrace, etc):	Hilltop	Local relief (concave,		convex Slope (%): 0-3
Subregion (LRR or MLRA):	LRR N Lat:	37.3042375		3.28673733 Datum: WGS 84
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe	rcent slopes, benched, s		assification:
Are climatic / hydrologic condition	ns on the site typical for this time of year?		(If no, explain ir	n Remarks.)
			Are "Normal Circumstanc	
Are Vegetation , Soil		problematic?	(If needed, explain any ar	nswers in Remarks.)
SUMMARY OF FINDINGS	- Attach site map showing san	npling point locati	ons, transects, imp	ortant features, etc.
Hydrophytic Vegetation Preser	· · · · · · · · · · · · · · · · · · ·		· · · ·	· · · · · ·
Hydric Soil Present?	Yes X No	Is the Sam	pled Area	
Wetland Hydrology Present?	Yes No X	within a W	•	es No X
Remarks: Remains of old pa	asture land.			
HYDROLOGY				
Wetland Hydrology Indicator				
	of one required: check all that apply)		Second	ary Indicators (minimum of two required)
Surface Water (A1)		Plants (B14)		rface Soil Cracks (B6)
High Water Table (A2)	Hydrogen St	ulfide Odor (C1)	Sp	arsely Vegetated Concave Surface (B8)
Saturation (A3)	Oxidized Rhi	izospheres on Living Ro	ots (C3) Dra	ainage Patterns (B10)
Water Marks (B1)	Presence of	Reduced Iron (C4)	Mc	oss Trim Lines (B16)
Sediment Deposits (B2)	Recent Iron I	Reduction in Tilled Soils	(C6) Dr	y-Season Water Table (C2)
Drift Deposits (B3)	Thin Muck S	urface (C7)	Cra	ayfish Burrows (C8)
Algal Mat or Crust (B4)	Other (Expla	iin in Remarks)	Sa	turation Visible on Aerial Imagery (C9)
Iron Deposits (B5)			Stu	unted or Stressed Plants (D1)
Inundation Visible on Aeri	al Imagery (B7)		Ge	eomorphic Position (D2)
Water-Stained Leaves (B	Э)		Sh	allow Aquitard (D3)
Aquatic Fauna (B13)			Mie	crotopographic Relief (D4)
			FA	C-Neutral Test (D5)
Field Observations:				
Surface Water Present?	Yes No X Depth (inch	nes).		
Water Table Present?	Yes No X Depth (inch			
Saturation Present?	Yes No X Depth (inch	,	Wetland Hydrology P	resent? Yes No _ X
(includes capillary fringe)			fredana nyarology n	
(				
Describe Recorded Data (strea	am gauge, monitoring well, aerial photos, l	previous inspections), if	available:	
Remarks:				

## VEGETATION (Four Strata) - Use scientific names of plants.

Sampling Point: W007/W008-1U

				Dominance Test worksheet: Number of Dominant Species
Tree Stratum (Plot size: 30 )	Absolute % Cover	Dominant Species?	Indicator Status	That Are OBL, FACW, or FAC: (A)
1. Pinus resinosa / Red pine	45	Yes	FACU	Total Number of Dominant
2. Acer rubrum / Red maple	20	Yes	FAC	Species Across All Strata: 4 (B)
3.				
4			·	Percent of Dominant Species
4 5		-		
				That Are OBL, FACW, or FAC: 25.0 (A/B)
			·	Prevalence Index worksheet:
7		= Total Cove		Total % Cover of: Multiply by:
	65			$\begin{array}{c c c c c c c c c c c c c c c c c c c $
50% of total cover: <u>32</u>	20%	of total cover:	13	FACW species $0 \times 2 = 0$
Sapling/Shrub Stratum (Plot size: 15 )				
1. Rosa multiflora / Multiflora rose, Multiflora rosa		Yes	FACU	FAC species 20 x 3 = 60
2				FACU species <u>65</u> x 4 = <u>260</u>
3				UPL species 25 x 5 = 125
4				Column Totals: <u>110</u> (A) <u>445</u> (B)
5				
6.				Prevalence Index = B/A = 4.05
7				
7			·	Hydrophytic Vegetation Indicators:
8				<ol> <li>Rapid Test for Hydrophytic Vegetation</li> </ol>
9			·	2 - Dominance Test is >50%
	20	_		3 - Prevalence Index ≤3.0 <sup>1</sup>
	20%	of total cover:	4	4 - Morphological Adaptations <sup>1</sup> (Provide supporting
Herb Stratum (Plot size: 5 )				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain )
1. <i>Poa /</i> Bluegrass			NI	
2				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
3				
4.				be present, unless disturbed or problematic.
5				Definitions of Four Vegetation Strata
6.				Deminions of Four Vegetation offata
7.				Tree Weady plants evoluting vince 2 in (7.6 cm) or
0				<b>Tree</b> - Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of
				height.
9				
10			·	
11				Sapling/Shrub - Woody plants, excluding vines, less
	25	= Total Cove		than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 12	20%	of total cover:	5	tall.
Woody Vine Stratum (Plot size: 30 )				
1				Herb - All herbaceous (non-woody) plants, regardless of
2				size, and woody plants less than 3.28 ft tall.
3				
4.				Woody vines - All woody vines greater than 3.28 ft in
5.				height.
0	0	= Total Cove		neight.
E00/ of total courses		-		Hydrophytic
50% of total cover: 0	20%	of total cover:	0	
				Vegetation
				Present?         Yes         No         X
Remarks: (Include photo numbers here or on a separate sheet.	)			-

Depth	ription: (Describe to tl Matrix	ne depth neede		Features	or confirm	the absend	ce of indicators.)			
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks		
0-18	7.5YR 3/2	60	7.5YR 5/6	40	С	М	Loam			
		·								
		·		·		·				
		·								
		· ·		·			·			
				·						
		·								
	ncentration, D=Depletio	n RM=Reduced	Matrix MS=Mask	ed Sand Gra	aine		<sup>2</sup> l ocation: Pl =	Pore Lining, M=I	Matrix	
			Matrix, MS-Mask		airi5.		Eocation. FE-	-Pore Lining, M-		
Hydric Soil	Indicators:						Indicators for Pro	-		
Histoso	( )		Dark Surfac	. ,	(0.0) (1.1)			(A10) <b>(MLRA 1</b> 4	47)	
	pipedon (A2)			Below Surfac				rie Redox (A16)		
	istic (A3)			Surface (S9)	•	17, 148)	•	147, 148) Teodologio Soile (	E10)	
	en Sulfide (A4) d Layers (A5)		Depleted M	/ed Matrix (F	-2)			Floodplain Soils ( 136, 147)	F19)	
	uck (A10) (LRR N)			Courface (F6	3)		•	ow Dark Surface	(TE12)	
	d Below Dark Surface (	A11)		ark Surface				lain in Remarks)		
	ark Surface (A12)			ressions (F8	. ,					
	Mucky Mineral (S1)			nese Masse	,					
	, MLRA 147,148)		(LRR N, ML							
Sandy (	Gleyed Matrix (S4)		Umbric Sur	, face (F13) <b>(</b>	MLRA 136	, 122)	<sup>3</sup> Indicators of hy	drophytic vegeta	tion and	
Sandy F	Redox (S5)		Piedmont F	loodplain So	oils (F19) <b>(N</b>	/ILRA 148)	wetland hy	drology must be	present.	
Stripped	d Matrix (S6)		Red Parent	Material (F2	21) (MLRA	A 127, 147)	unless dist	urbed or problem	atic.	
Restrictive	Layer (if observed):									
Type:	Layer (il observeu).									
Depth (ir	nches):		_				Hydric Soil Present?	Yes	No	х
									_	
Remarks:	Large chunks of coal de	eposits.								
		opoonor								

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry	County	Sampling Date:	04/14/2022
Applicant/Owner:	Avangrid Renewab			ate: Kentucky	Sampling Point: V	
Investigator(s):	JK CS RMS	Section, Township, R			y of Hazard	
Landform (hillslope, terrace, etc)	): Hill	Local relief (concave	, convex, none):	convex	•	(%): 2-4
Subregion (LRR or MLRA):	LRR N La		,	-83.2881433		
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 7			NWI classification	on:	
Are climatic / hydrologic condition	ons on the site typical for this time of ye	ear? Yes X No	o (lf no,	explain in Remark	s.)	
Are Vegetation X, Soil	X , or Hydrology signifi	cantly disturbed?	Are "Normal Cire	cumstances" prese	ent? Yes X	K No
Are Vegetation, Soil	, or Hydrologynatura	ally problematic?	(If needed, expla	ain any answers in	Remarks.)	
SUMMARY OF FINDING	S - Attach site map showing	sampling point locat	tions, transed	ts, important	features, etc.	
Hydrophytic Vegetation Prese	ent? Yes No	Х				
Hydric Soil Present?	Yes No	X Is the Sar	mpled Area			
Wetland Hydrology Present?	Yes No	X within a V	Wetland?	Yes	No X	
Remarks:		I				
L HYDROLOGY						
Wetland Hydrology Indicato	ors:					
	of one required: check all that apply)			Secondary Indica	ators (minimum of t	wo required)
Surface Water (A1)	1 11 17	uatic Plants (B14)			Cracks (B6)	<u></u>
High Water Table (A2)		en Sulfide Odor (C1)			getated Concave S	Surface (B8)
Saturation (A3)	Oxidized	Rhizospheres on Living R	oots (C3)		atterns (B10)	<b>、</b> ,
Water Marks (B1)	Presenc	e of Reduced Iron (C4)		Moss Trim L	ines (B16)	
Sediment Deposits (B2)	Recent I	ron Reduction in Tilled Soil	s (C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Mu	ck Surface (C7)		Crayfish Bu	rrows (C8)	
Algal Mat or Crust (B4)	Other (E	xplain in Remarks)		Saturation \	isible on Aerial Ima	agery (C9)
Iron Deposits (B5)				Stunted or S	Stressed Plants (D1	)
Inundation Visible on Ae					Position (D2)	
Water-Stained Leaves (E	39)			Shallow Aqu	( )	
Aquatic Fauna (B13)					aphic Relief (D4)	
				FAC-Neutra	T Test (D5)	
Field Observations:						
Surface Water Present?	Yes <u>No X</u> Depth	(inches):				
Water Table Present?	Yes No X Depth	(inches):				
Saturation Present?	Yes No X Depth	(inches):	Wetland Hyd	rology Present?	Yes	No X
(includes capillary fringe)						
Describe Recorded Data (stre	eam gauge, monitoring well, aerial pho	tos, previous inspections), i	f available:			
Remarks:						

#### **VEGETATION (Four Strata) - Use scientific names of plants.**

Sampling Point: W008/009/010-1U

Tree Stratum     (Plot size:30)       1        2        3        4				Total Number of Dominant	(A) (B)
5.					(A/B)
6 7	0	= Total Cov	er	Prevalence Index worksheet:           Total % Cover of:         Multiply by:	
50% of total cover: 0	20% c	of total cover:	0	OBL species 0 x 1 = 0	-
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 0 x 2 = 0	_
1				FAC species 0 x 3 = 0	_
2.				FACU species 95 x 4 = 380	_
3.				UPL species 30 x 5 = 150	_
4.				Column Totals: <u>125</u> (A) <u>530</u>	(B)
5 6			·	Prevalence Index = B/A = 4.24	_
7				Hydrophytic Vegetation Indicators:	
8				1 - Rapid Test for Hydrophytic Vegetation	
9				2 - Dominance Test is >50%	
	0	= Total Cov	er	3 - Prevalence Index ≤3.01	
50% of total cover: 0	20% c	of total cover:	0	4 - Morphological Adaptations <sup>1</sup> (Provide supporting	a
Herb Stratum (Plot size: 5 )				Problematic Hydrophytic Vegetation <sup>1</sup> (Explain )	'9
1. Andropogon virginicus / Broomsedge bluestem	60	Yes	FACU		
2. Trifolium pratense / Red clover	35	Yes	FACU	Indiastors of hydric coil and watland hydrology must	
3. Aster / Aster 4.	30	Yes	NI	<sup>1</sup> Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.	
5.			- <u> </u>	Definitions of Four Vegetation Strata	
6. 7. 8. 9.	·			<b>Tree</b> - Woody plants, excluding vines, 3 in. (7.6 cm) or more in diameter at breast height (DBH), regardless of height.	
10 11	125	= Total Cov	er	Sapling/Shrub - Woody plants, excluding vines, less than 3 in. DBH and greater than or equal to 3.28 ft (1 m	n)
50% of total cover: 62	20% o	of total cover:	25	tall.	
Woody Vine Stratum (Plot size: 30)					
1				Herb - All herbaceous (non-woody) plants, regardless	of
2				size, and woody plants less than 3.28 ft tall.	
3					
4 5				<b>Woody vines</b> - All woody vines greater than 3.28 ft in height.	
	0	= Total Cov	er		
50% of total cover: <u>0</u>	20% d	of total cover:	0	Hydrophytic         Vegetation         Present?       Yes NoX	
Remarks: (Include photo numbers here or on a separate sheet.	)				

J	v	ᄂ

Depth	ription: (Describe to t Matrix			Features			· · · · · · · · · · · · · · · · · · ·			
(inches) 0-10	Color (moist) % Color (moist) %					Loc <sup>2</sup>	Texture	Remar	ks	
Type: C=Cor	ncentration, D=Depletic	n, RM=Redu	ced Matrix, MS=Masl	ked Sand Gra			²Location: P	L=Pore Lining, N	л=Matrix.	
Black Hi Hydroge Stratified 2 cm Mu Depleted Thick Da		A11)	Thin Dark S Loamy Gle Depleted M Redox Dar Depleted D Redox Dep	Below Surfac Surface (S9) yed Matrix (F	(MLRA 14 52) 6) (F7)	-	18) Coast Prime Coast Prime Coast Prime (MLR Piedmor (MLR Construct)) (MLR Construct) (MLR	roblematic Hyd ck (A10) (MLRA cairie Redox (A16 cA 147, 148) it Floodplain Soil cA 136, 147) allow Dark Surfac xplain in Remark	<b>s (F19)</b> ce (TF12)	
Sandy G	MLRA 147,148) bleyed Matrix (S4) bedox (S5) Matrix (S6)		Piedmont F	L <b>RA 136)</b> face (F13) Floodplain Sc t Material (F2	oils (F19) <b>(M</b>	LRA 148)	wetland	hydrophytic veg hydrology must t isturbed or probl	present.	
Restrictive L Type: Depth (in	ayer (if observed): ches):		_				Hydric Soil Present	:? Yes	No	х
Remarks:	Reclaimed coal mine g	ravel refusal								

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry (	County	Sampling Date:	04/13/2022
Applicant/Owner:	Avangrid Renewables, I			te: Kentucky	Sampling Point:	W008-1W
Investigator(s):	JK CS RMS	Section, Township, Ra			y of Hazard	
Landform (hillslope, terrace, etc)	): Bowl shape depression	Local relief (concave,	·	concav		(%): 1-3
Subregion (LRR or MLRA):	LRR N Lat:	37.30429967		-83.286969		
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe	rcent slopes, benched, s	stony	NWI classification	on:	
Are climatic / hydrologic condition	ons on the site typical for this time of year?	Yes X No	(If no, e	explain in Remark	s.)	
Are Vegetation X, Soil	, or Hydrologysignificant	ly disturbed?	Are "Normal Circ	umstances" prese	nt? Yes X	K No
	, or Hydrologynaturally p		(If needed, explain	in any answers in	Remarks.)	
SUMMARY OF FINDING	S - Attach site map showing san	npling point locati	ons, transect	ts, important	features, etc.	
Hydrophytic Vegetation Prese	ent? Yes X No					
Hydric Soil Present?	Yes X No	Is the Sam	pled Area			
Wetland Hydrology Present?	Yes X No	within a W	-	Yes X	No	
Remarks:		I				
L HYDROLOGY						
Wetland Hydrology Indicato	ors:					
	of one required: check all that apply)			Secondary Indica	ators (minimum of ty	wo required)
X Surface Water (A1)	True Aquatic	Plants (B14)		Surface Soil	Cracks (B6)	
High Water Table (A2)	Hydrogen Su	ulfide Odor (C1)		Sparsely Ve	getated Concave S	urface (B8)
Saturation (A3)	X Oxidized Rhi	izospheres on Living Ro	ots (C3)	Drainage Pa	atterns (B10)	
Water Marks (B1)	Presence of	Reduced Iron (C4)		Moss Trim L	ines (B16)	
Sediment Deposits (B2)	Recent Iron I	Reduction in Tilled Soils	(C6)	Dry-Season	Water Table (C2)	
Drift Deposits (B3)	Thin Muck S			Crayfish Bu	rrows (C8)	
Algal Mat or Crust (B4)	Other (Expla	in in Remarks)			isible on Aerial Ima	<b>J</b>
Iron Deposits (B5)					Stressed Plants (D1	)
Inundation Visible on Aer					Position (D2)	
Water-Stained Leaves (E	39)			Shallow Aqu	( )	
Aquatic Fauna (B13)				FAC-Neutra	aphic Relief (D4)	
					riest (D3)	
Field Observations:						
Surface Water Present?	Yes X No Depth (inch	nes): 6				
Water Table Present?	Yes <u>No X</u> Depth (inch	ies):				
Saturation Present?	Yes <u>No X</u> Depth (inch	ies):	Wetland Hydr	ology Present?	Yes X	No
(includes capillary fringe)						
Describe Recorded Data (stre	eam gauge, monitoring well, aerial photos,	previous inspections), if	available:			
Remarks:						

#### VEGETATION (Four Strata) - Use scientific names of plants

VEGETATION (Four Strata) - Use scientific names	of plant	s.		Sampling Point: W008-1W
				Dominance Test worksheet:
				Number of Dominant Species
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC: 1 (A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status	
1. Pinus resinosa / Red pine	2	Yes	FACU	Total Number of Dominant
<u></u>				Species Across All Strata: 3 (B)
Λ				Percent of Dominant Species
5			·	That Are OBL, FACW, or FAC: 33.3 (A/B)
6.				
7.				Prevalence Index worksheet:
	2	= Total Cov	er	Total % Cover of: Multiply by:
50% of total cover: 1		-		OBL species 80 x 1 = 80
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 0 x 2 = 0
<u></u>				FAC species 0 x 3 = 0
2				FACU species 2 x 4 = 8
3.			·	UPL species 30 x 5 = 150
4				Column Totals: 112 (A) 238 (B)
4 5				
6.				Prevalence Index = B/A = 2.13
7.				
0				Hydrophytic Vegetation Indicators:
8 9.				1 - Rapid Test for Hydrophytic Vegetation
	0	= Total Cov	er	2 - Dominance Test is >50%
50% of total cover: 0	-	of total cover:		X 3 - Prevalence Index ≤3.01
Herb Stratum (Plot size: 5 )				4 - Morphological Adaptations <sup>1</sup> (Provide supporting
1. Eleocharis palustris / Common spikerush	80	Yes	OBL	Problematic Hydrophytic Vegetation <sup>1</sup> (Explain)
2. Carex / Sedge	30	Yes	NI	
3.				<sup>1</sup> Indicators of hydric soil and wetland hydrology must
4.				be present, unless disturbed or problematic.
5.				Definitions of Four Vegetation Strata
6.				Deminitions of Four Vegetation Strata
7				Tree - Woody plants, excluding vines, 3 in. (7.6 cm) or
8.				more in diameter at breast height (DBH), regardless of
9.				height.
10.				
11.				Sapling/Shrub - Woody plants, excluding vines, less
	110	= Total Cov	er	than 3 in. DBH and greater than or equal to 3.28 ft (1 m)
50% of total cover: 55	20%	of total cover:	22	tall.
Woody Vine Stratum (Plot size: 30 )				
1.				Herb - All herbaceous (non-woody) plants, regardless of
2.				size, and woody plants less than 3.28 ft tall.
3.				
4				Woody vines - All woody vines greater than 3.28 ft in
5.				height.
	0	= Total Cov	er	
50% of total cover: 0	20%	of total cover:	0	Hydrophytic
				Vegetation
				Present?         Yes         X         No
Remarks: (Include photo numbers here or on a separate sheet.	)			

SOIL	J	Ο	I	L
------	---	---	---	---

Profile Desc Depth	ription: (Describe to th Matrix	ne depth nee		e indicator Features	or confirm	the absen	nce of indicators.)		
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks	
0-10	2.5Y 4/1	80	7.5YR 4/6	20	<u> </u>	M	Clay Loam	Remarks	
0.10	2.01 1/1						olay Loann		
							<u> </u>		
	centration, D=Depletio	- DM-Dodu	and Matrix MC-Maak	ad Cand Cr	aina		<sup>2</sup> L continue	PL=Pore Lining, M=Matrix.	
Type. C=Col				eu Sanu Gr	airis.		Location.	-L-Fore Linning, M-Maurix.	
Hydric Soil I	ndicators:						Indicators for F	Problematic Hydric Soils <sup>3</sup> :	
Histosol	(A1)		Dark Surface	e (S7)			2 cm M	uck (A10) (MLRA 147)	
Histic Ep	pipedon (A2)		Polyvalue B	elow Surfac	ce (S8) (ML	RA 147, 1	48) Coast F	Prairie Redox (A16)	
Black Hi	stic (A3)		Thin Dark S	urface (S9)	(MLRA 14	7, 148)	, <u> </u>	RA 147, 148)	
Hydroge	n Sulfide (A4)		Loamy Gley	ed Matrix (F	=2)		Piedmo	nt Floodplain Soils (F19)	
Stratified	Layers (A5)		X Depleted Ma	atrix (F3)			(ML	RA 136, 147)	
2 cm Mu	ck (A10) (LRR N)		Redox Dark	Surface (F	6)		Very Sh	allow Dark Surface (TF12)	
	Below Dark Surface (A	A11)	Depleted Da		,			Explain in Remarks)	
·	rk Surface (A12)	,	Redox Depr		( )				
	lucky Mineral (S1)		Iron-Mangar	``	,				
	MLRA 147,148)		(LRR N, ML						
•	leyed Matrix (S4)		Umbric Surf		(MLRA 136	. 122)	<sup>3</sup> Indicators o	f hydrophytic vegetation and	4
	• • • •			. ,	•	•		hydrology must be present.	
Sandy Redox (S5) Piedmont Floodplain Soils (F19) (MLRA 148 Stripped Matrix (S6) Red Parent Material (F21) (MLRA 127, 147							disturbed or problematic.	•	
							411033		
Restrictive L	ayer (if observed):								
Type:									
Depth (in	ches):						Hydric Soil Preser	nt? Yes X No	
Remarks:									

Project/Site: Brig	ght Mountain Solar	City/County:	Hazard, Perry County	Sampling Date: 04/14/2022
Applicant/Owner:	Avangrid Renewables	LLC	State: Kentucky	Sampling Point: W009-1W
Investigator(s):	CM, RMS, JK	Section, Township, Rang	ge: C	ity of Hazard
Landform (hillslope, terrace, etc):	Bowl shaped depression	Local relief (concave, co	nvex, none): conca	ve Slope (%): 0-5
Subregion (LRR or MLRA):	LRR N Lat:	37.28917967	Long: -83.28863	083 Datum: WGS 84
Soil Map Unit Name: Fa	airpoint and Bethesda soils, 2 to 70 p	ercent slopes, benched, sto	ny NWI classificat	lion:
Are climatic / hydrologic conditions o	on the site typical for this time of year	Yes X No	(If no, explain in Rema	rks.)
Are Vegetation, Soil	K, or Hydrologysignificat	ntly disturbed? Ar	e "Normal Circumstances" pres	sent? Yes <u>X</u> No
Are Vegetation, Soil	K , or Hydrologynaturally	problematic? (If	needed, explain any answers i	n Remarks.)
SUMMARY OF FINDINGS - A	Attach site map showing sa	mpling point location	ns, transects, important	t features, etc.
Hydrophytic Vegetation Present?	Yes X No			
Hydric Soil Present?	Yes X No	Is the Sampl	ed Area	
Wetland Hydrology Present?	Yes X No	within a Wet	and? Yes X	K No
Remarks: Reclaimed coal mine		1		
HYDROLOGY				
Wetland Hydrology Indicators:				
Primary Indicators (minimum of or	ne required: check all that apply)		Secondary Indi	cators (minimum of two required)
X Surface Water (A1)	1 117	c Plants (B14)		bil Cracks (B6)
X High Water Table (A2)	Hydrogen S	Sulfide Odor (C1)		egetated Concave Surface (B8)
Saturation (A3)	Oxidized R	nizospheres on Living Roots	s (C3) Drainage F	Patterns (B10)
Water Marks (B1)	Presence o	f Reduced Iron (C4)	Moss Trim	Lines (B16)
Sediment Deposits (B2)	Recent Iror	Reduction in Tilled Soils (C	C6) Dry-Seaso	n Water Table (C2)
Drift Deposits (B3)		Surface (C7)		urrows (C8)
Algal Mat or Crust (B4)	Other (Expl	ain in Remarks)		Visible on Aerial Imagery (C9)
Iron Deposits (B5)	()			Stressed Plants (D1)
Inundation Visible on Aerial I	magery (B7)			ic Position (D2)
Water-Stained Leaves (B9)				quitard (D3)
Aquatic Fauna (B13)				graphic Relief (D4) al Test (D5)
Field Observations:				
Surface Water Present?	Yes X No Depth (inc	:hes): 2		
Water Table Present?	Yes X No Depth (inc	:hes): 5		
Saturation Present?	Yes X No Depth (inc	hes): 10	Wetland Hydrology Present?	Yes X No
(includes capillary fringe)				
Describe Recorded Data (stream (	gauge, monitoring well, aerial photos	previous inspections) if av	ailahla:	
Describe Recorded Data (stream)	gauge, monitoring weil, aenai photos			
Remarks:				

/EGETATION (Four Strata) - Use scientific names	of plant	s.		Sa	ampling Poi	int: W00	09-1W
				Dominance Test worksheet	t:		
				Number of Dominant Species			
	Abaaluta	Deminent	Indiantan			0	( • )
	Absolute	Dominant	Indicator	That Are OBL, FACW, or FAC		2	(A)
Tree Stratum (Plot size: <u>30</u> )	% Cover	Species?	Status				
1				Total Number of Dominant			
2.				Species Across All Strata:		3	(B)
3							_ (=)
3							
4				Percent of Dominant Species			
5				That Are OBL, FACW, or FAC	D:	66.7	(A/B)
6							
7.				Prevalence Index workshee	et:		
1.		Tatal Oas		Total % Cover of:	N	fultiply by:	
	0	= Total Cov					
50% of total cover: 0	20% c	of total cover:	0	OBL species 25	x 1 =	25	
Sapling/Shrub Stratum (Plot size: 15 )				FACW species 25	x 2 =	50	
				FAC species 0	x 3 =	0	
1				FACU species 0	x 4 =	0	
2							
3				UPL species 30	x 5 =		
4				Column Totals: 80	(A)	225	(B)
-							
<u> </u>				Prevalence Index = B/	Δ =	2.81	
6					·	2.01	—
7							
8.				Hydrophytic Vegetation Inc			
9.				1 - Rapid Test for Hydro	phytic Vege	etation	
9				X 2 - Dominance Test is >	50%		
	0	= Total Cov		X 3 - Prevalence Index ≤3	0 <sup>1</sup>		
50% of total cover: 0	20% c	of total cover:	0			ovido ounno	rtina
Herb Stratum (Plot size: 5 )				4 - Morphological Adapt			
1. Carex / Sedge	30	Yes	NI	Problematic Hydrophytic	: Vegetatio	n <sup>1</sup> (Explain)	
2. Typha angustifolia / Narrow leaf cattail, Narrow-leaved cattai		Yes	OBL	<sup>1</sup> Indicators of hydric soil and	wetland hv	droloav mus	st
3. Scirpus cyperinus / Woolgrass	25	Yes	FACW	be present, unless disturbed	-		-
4				be present, unless disturbed	or problem	iauc.	
							-
				Definitions of Four Vegetat	ion Strata		
6							
7				Tree - Woody plants, excludi	ng vines, 3	in. (7.6 cm)	or
8				more in diameter at breast he			
				height.	0 (	<i>,,</i> 0	
9				3			
10							
11. <u> </u>				Sapling/Shrub - Woody plan	nts. excludi	na vines. les	s
	80	= Total Cov	er	than 3 in. DBH and greater th	an or equa	al to 3.28 ft (	1 m)
50% of total cover: 40	20%	- of total cover:	16	tall.			,
	2070 0		10				
Woody Vine Stratum (Plot size: 30 )							
1				Herb - All herbaceous (non-v	voodv) plar	nts. regardle	ss of
2.				size, and woody plants less t			
3.							
4.				Woody vines - All woody vin	es greater	than 3.28 ft	in
5				height.			
	0	= Total Cov	er				
50% of total cover: 0	20%	of total cover:	0	Hydrophytic			
	20 /8 0		0				
				Vegetation			
				Present? Yes	<u>X</u> N	lo	
				-			
Remarks: (Include photo numbers here or on a separate sheet.	)						

SOIL	J	Ο	I	L
------	---	---	---	---

Depth	Matrix		Redox	Features				
inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-7	10YR 4/1	95	7.5YR 4/6	5	С	Μ	Clay Loam	
7-10	10YR 5/2	65	10YR 6/8	35		<u>M</u>	Clay Loam	Reclaimed coal mine, gravel fill
/pe: C=Co	ncentration, D=Depletion	n, RM=Red	uced Matrix, MS=Mask	ed Sand Gra	ains.		²Loc	ation: PL=Pore Lining, M=Matrix.
Histosol Histic Eg Black Hi Hydroge Stratified 2 cm Mu Depleted Thick Da Sandy M (LRR N,	ndicators: (A1) pipedon (A2) istic (A3) en Sulfide (A4) d Layers (A5) uck (A10) (LRR N) d Below Dark Surface (A ark Surface (A12) Mucky Mineral (S1) , MLRA 147,148) Bleyed Matrix (S4)	411)	Thin Dark S Loamy Gley X Depleted M Redox Darl Depleted D Redox Dep Iron-Manga (LRR N, MI	Below Surface Surface (S9) yed Matrix (F atrix (F3) C Surface (F6 ark Surface ressions (F8 nese Masse	(MLRA 14 52) 6) (F7) )) s (F12)	47, 148)	48) 2 P V C	rs for Problematic Hydric Soils <sup>3</sup> : 2 cm Muck (A10) (MLRA 147) Coast Prairie Redox (A16) (MLRA 147, 148) Piedmont Floodplain Soils (F19) (MLRA 136, 147) Very Shallow Dark Surface (TF12) Other (Explain in Remarks) ators of hydrophytic vegetation and
Sandy F	Redox (S5) I Matrix (S6)		Piedmont F	loodplain Sc Material (F2	oils (F19) <b>(N</b>	MLRA 148)	w w	vetland hydrology must be present. Inless disturbed or problematic.
estrictive L Type:	-ayer (if observed):						Hydric Soil I	<b>Present?</b> Yes X No

Project/Site:	Bright Mountain Solar	City/County:	Hazard, Perry County	Sampling Date: 04/14/2022
Applicant/Owner:	Avangrid Renewables,	LLC	State: Kentue	cky Sampling Point: W010-1W
Investigator(s):	CM, RMS, JK	Section, Township, Ran	ge:	City of Hazard
Landform (hillslope, terrace, etc):	Bowl shaped depression	Local relief (concave, co	onvex, none): co	oncave Slope (%): 0-5
Subregion (LRR or MLRA):	LRR N Lat:	37.289285	Long: -83.2	287633 Datum: WGS 84
Soil Map Unit Name:	Fairpoint and Bethesda soils, 2 to 70 pe	ercent slopes, benched, sto	ony NWI class	ification:
Are climatic / hydrologic condition	ns on the site typical for this time of year?	Yes X No	(If no, explain in Re	emarks.)
Are Vegetation, Soil	X_, or Hydrologysignificant		re "Normal Circumstances"	present? Yes X No
Are Vegetation, Soil	, or Hydrologynaturally p	problematic? (I	f needed, explain any answ	ers in Remarks.)
SUMMARY OF FINDINGS	6 - Attach site map showing sar	npling point locatio	ns, transects, impor	tant features, etc.
Hydrophytic Vegetation Preser	nt? Yes X No			
Hydric Soil Present?	Yes X No	Is the Samp	led Area	
Wetland Hydrology Present?	Yes X No	within a We	tland? Yes	X No
Remarks: Reclaimed coal m	nine			
HYDROLOGY				
Wetland Hydrology Indicator	'S:			
Primary Indicators (minimum o	f one required: check all that apply)		Secondary	Indicators (minimum of two required)
X Surface Water (A1)	True Aquatic	c Plants (B14)	Surfac	ce Soil Cracks (B6)
X High Water Table (A2)	Hydrogen Si	ulfide Odor (C1)	Spars	ely Vegetated Concave Surface (B8)
X Saturation (A3)	X Oxidized Rh	izospheres on Living Root	s (C3) Draina	age Patterns (B10)
Water Marks (B1)		Reduced Iron (C4)		Trim Lines (B16)
Sediment Deposits (B2)		Reduction in Tilled Soils (	· — ·	eason Water Table (C2)
Drift Deposits (B3)	Thin Muck S			sh Burrows (C8)
Algal Mat or Crust (B4)	Other (Expla	ain in Remarks)		ation Visible on Aerial Imagery (C9)
Iron Deposits (B5) Inundation Visible on Aeri	al Imagony (RZ)			ed or Stressed Plants (D1) orphic Position (D2)
Water-Stained Leaves (BS				w Aquitard (D3)
Aquatic Fauna (B13)	<i>,</i> ,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,			opographic Relief (D4)
				Veutral Test (D5)
				. ,
Field Observations:				
Surface Water Present?	Yes X No Depth (inch			
Water Table Present?	Yes X No Depth (inch			
Saturation Present?	Yes X No Depth (inch	nes): <u>5</u>	Wetland Hydrology Pres	ent? Yes <u>X</u> No
(includes capillary fringe)				
Describe Recorded Data (strea	am gauge, monitoring well, aerial photos,	previous inspections), if a	vailable:	
Remarks:				

	of plants					0	nt: <u>W01</u>	
				Dominance Test w	orksheet:			
				Number of Dominan				
		<b>.</b>			•			
	Absolute	Dominant	Indicator	That Are OBL, FAC	N, or FAC:		1	(A)
Tree Stratum (Plot size: 30 )	% Cover	Species?	Status					
1.				Total Number of Dor	ninant			
2.			·	Species Across All S	Strata:		2	(B)
				Species Across Air C	Silala.		2	(,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,
3.								
4				Percent of Dominan	t Species			
E				That Are OBL, FAC	N or FAC		50.0	(A/B)
6					,		0010	(,,,_)
		· ·	·	Prevalence Index v	orkshoot.			
7								
	0	= Total Cove	ər	Total % Cover	of:		ultiply by:	
50% of total cover: 0	20% (	of total cover:	0	OBL species	60	x 1 =	60	
				FACW species	0	x 2 =	0	
Sapling/Shrub Stratum (Plot size: 15 )				· · · ·		-		
1				FAC species	0	x 3 =		
2				FACU species	0	x 4 =	0	
2				UPL species	30	x 5 =	150	
3				Column Totals:	90	(A)	210	(B)
4.					90	(A) -	210	(D)
5.								
6.				Prevalence In	dex = B/A =		2.33	
7.			·					
				Hydrophytic Veget	ation Indica	tors:		
8.				1 - Rapid Test f			itation	
9.							ation	
	0	= Total Cov	ər	2 - Dominance		6		
E00/ of total action 0		-		X 3 - Prevalence	Index ≤3.0¹			
50% of total cover: 0	20% 0	of total cover:	0	4 - Morphologic	al Adaptatio	ons <sup>1</sup> (Pro	vide support	tina
Herb Stratum (Plot size: 5 )								
1. Typha angustifolia / Narrow leaf cattail, Narrow-leaved cattai	60	Yes	OBL	Problematic Hy		gelation	r (Explain)	
2. Carex / Sedge	30	Yes	NI					
				<sup>1</sup> Indicators of hydric	soil and we	tland hyd	drology must	
3				be present, unless d	isturbed or	nrohlem	atic	
4						problom		
5				Definitions of Four	Vegetation	Strata		
6				Definitions of Four	vegetation	Strata		
6								
7				Tree - Woody plants	, excluding	vines, 3	in. (7.6 cm)	or
8				<b>Tree</b> - Woody plants more in diameter at				
8				more in diameter at				
8 9								
8				more in diameter at				
8				more in diameter at height.	breast heigh	nt (DBH)	, regardless	of
8 9 10				more in diameter at height. Sapling/Shrub - Wo	breast heigh	nt (DBH) excludir	, regardless	of
8 9 10 11	90	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and	breast heigh	nt (DBH) excludir	, regardless	of
8	90			more in diameter at height. Sapling/Shrub - Wo	breast heigh	nt (DBH) excludir	, regardless	of
8 9 10 11	90	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and	breast heigh	nt (DBH) excludir	, regardless	of
8	90	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall.	breast heigh body plants, greater than	nt (DBH) excludir or equa	, regardless ng vines, less I to 3.28 ft (1	of m)
8	90 20% c	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceou	breast heigh body plants, greater than us (non-woo	excludir or equa	, regardless ng vines, less I to 3.28 ft (1 ts, regardles	of m)
8	90 20% c	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall.	breast heigh body plants, greater than us (non-woo	excludir or equa	, regardless ng vines, less I to 3.28 ft (1 ts, regardles	of m)
8	90 20% c	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceou	breast heigh body plants, greater than us (non-woo	excludir or equa	, regardless ng vines, less I to 3.28 ft (1 ts, regardles	of m)
8	90 20% c	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceous size, and woody place	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan a 3.28 ft	, regardless ng vines, less I to 3.28 ft (1 ts, regardles tall.	of m) s of
8	90 20% c	= Total Cove		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceou size, and woody plan Woody vines - All w	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan a 3.28 ft	, regardless ng vines, less I to 3.28 ft (1 ts, regardles tall.	of m) s of
8	90 20% c	= Total Cover:	er 	more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceous size, and woody place	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan a 3.28 ft	, regardless ng vines, less I to 3.28 ft (1 ts, regardles tall.	of m) s of
8	90 20% c	= Total Cover:		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceou size, and woody plan Woody vines - All w	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan a 3.28 ft	, regardless ng vines, less I to 3.28 ft (1 ts, regardles tall.	of m) s of
8.	90 20% c	= Total Cover:		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and tall. Herb - All herbaceou size, and woody plan Woody vines - All w	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan a 3.28 ft	, regardless ng vines, less I to 3.28 ft (1 ts, regardles tall.	of m) s of
8.	90 20% c	= Total Cover:		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and g tall. Herb - All herbaceou size, and woody plan Woody vines - All w height. Hydrophytic	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan a 3.28 ft	, regardless ng vines, less I to 3.28 ft (1 ts, regardles tall.	of m) s of
8.	90 20% c	= Total Cover:		more in diameter at height. Sapling/Shrub - Wo than 3 in. DBH and g tall. Herb - All herbaceou size, and woody plat Woody vines - All w height.	breast heigh body plants, greater than us (non-woo nts less thar	nt (DBH) excludir or equa dy) plan d 3.28 ft greater	, regardless ig vines, less i to 3.28 ft (1 ts, regardles tall. than 3.28 ft i	of m) s of

c	0	
J	J	ᇿ

Depth	Matrix			Features				
(inches)	Color (moist)	%	Color (moist)	%	Type <sup>1</sup>	Loc <sup>2</sup>	Texture	Remarks
0-9	10YR 4/1	95	7.5YR 4/6	5		M	Clay	
Type: C=Cor	ncentration, D=Depletion	n, RM=Redu	iced Matrix, MS=Mask	ed Sand Gra	ins.		<sup>2</sup> Location: F	PL=Pore Lining, M=Matrix.
Black Hi Hydroge Stratified 2 cm Mu Depleted Thick Da Sandy M (LRR N, Sandy G Sandy R	(A1) bipedon (A2)	A11)	Thin Dark S Loamy Gley X Depleted M Redox Dark Depleted Da Redox Depr Iron-Manga (LRR N, ML Umbric Surf Piedmont F	eelow Surface ourface (S9) ved Matrix (F3) atrix (F3) s Surface (F6 ark Surface ( ressions (F8) nese Masses	(MLRA 14 2) F7) s (F12) MLRA 136 Is (F19) (N	5, 122) MLRA 148)	48) 2 cm Mu Coast P (MLF Piedmon (MLF Very Sh Other (E <sup>3</sup> Indicators of wetland	Problematic Hydric Soils <sup>3</sup> : uck (A10) (MLRA 147) rairie Redox (A16) RA 147, 148) Int Floodplain Soils (F19) RA 136, 147) allow Dark Surface (TF12) Explain in Remarks)
Restrictive L Type: Depth (in	ayer (if observed):		_				Hydric Soil Presen	t? Yes X No
Remarks:	Reclaimed coal mine, ro	ocky refusal	at 9 inches				,	<u> </u>

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	224694
Survey Date	04/12/2022
User	Joseph Knight
Stream ID:	05-ST001
Administrative 1	
Investigator(s)	JK, RMS, CS
Latitude, Longitude	
Latitude	37.2890085
Longitude	-83.309893
Current Precipitation	
Precipitation in Past 48 Hours	
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	1
Stream Gradient	Moderate (6-11%)
Substrate	Bedrock, Gravel, Sand (Gritty feel), Silt/Clay (No grit)
OHWM width for stream reach (feet)	2
Geomorphology	
Continuity of channel bed and bank	1-Weak
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	2-Moderate
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	1-Weak
Are Headcuts present	2-Moderate
Grade Control	1-Moderate
Natural Valley	1-Moderate
Second or Greater Order	0-No

Channel	
Subtotal =	11
Hydrology	
Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	1-Weak
Leaf Litter	1-Weak
Sediment on Plants or Debris	0.5-Weak
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	3-Yes
Subtotal =	5.5
Biology	
Fibrous Roots in Streambed	3-Absent
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0.75-FACW
Subtotal =	6.75
Stream Type Determination	
Total Score	23.25
Stream Determination	Intermittent (≥19)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	224695
Survey Date	04/12/2022
User	Joseph Knight
Stream ID:	05-ST002
Administrative 1	
Investigator(s)	JK, RMS, CS
Latitude, Longitude	
Latitude	37.2893599
Longitude	-83.3098036
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	.25
Stream Gradient	Moderate (6-11%)
Substrate	Cobble, Gravel, Silt/Clay (No grit)
OHWM width for stream reach (feet)	1
Geomorphology	
Continuity of channel bed and bank	1-Weak
Sinuosity of channel along thalweg	0-Absent
In Channel Structures	0-Absent
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	1-Weak
Are Headcuts present	0-Absent
Grade Control	0.5-Weak
Natural Valley	0-Absent
Second or Greater Order Channel	0-No
Subtotal =	4.5
Hydrology	

Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	1-Weak
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	3-Yes
Subtotal =	4.5
Biology	
Fibrous Roots in Streambed	1-Moderate
Rooted Upland Plants in Streambed	1-Moderate
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0.5-Weak
Wetland Plants in Streambed	0-Other
Subtotal =	2.5
Stream Type Determination	
Total Score	11.5
Stream Determination	Ephemeral (<19)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	224696
Survey Date	04/12/2022
User	Joseph Knight
Stream ID:	05-ST003
Administrative 1	
Investigator(s)	JK, RMS, CS
Latitude, Longitude	
Latitude	37.2833311
Longitude	-83.2997988
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Steep (>12%)
Substrate	Boulder, Cobble, Gravel
OHWM width for stream reach (feet)	3
Geomorphology	
Continuity of channel bed and bank	2-Moderate
Sinuosity of channel along thalweg	0-Absent
In Channel Structures	0-Absent
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1-Moderate
Natural Valley	1-Moderate
Second or Greater Order Channel	0-No
Subtotal =	6
Hydrology	

Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	1-Weak
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	0-No
Subtotal =	1
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	5
Stream Type Determination	
Total Score	12
Stream Determination	Ephemeral (<19)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	298647
Survey Date	04/12/2022
User	Rebecca Steinberg
Stream ID:	05-ST004
Administrative 1	
Investigator(s)	JK, RMS, CS
Latitude, Longitude	
Latitude	37.28226151
Longitude	-83.29859994
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Steep (>12%)
Substrate	Boulder, Cobble, Gravel
OHWM width for stream reach (feet)	4
Geomorphology	
Continuity of channel bed and bank	2-Moderate
Sinuosity of channel along thalweg	0-Absent
In Channel Structures	0-Absent
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1-Moderate
Natural Valley	1-Moderate
Second or Greater Order Channel	0-No
Subtotal =	6
Hydrology	
Presence of Baseflow	0-Absent
---	-----------------
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	1-Weak
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	0-No
Subtotal =	1
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	5
Stream Type Determination	
Total Score	12
Stream Determination	Ephemeral (<19)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	224697
Survey Date	04/13/2022
User	Joseph Knight
Stream ID:	05-ST005
Administrative 1	
Investigator(s)	ЈК
Latitude, Longitude	
Latitude	37.29105027
Longitude	-83.29658262
Datum	WGS84
Current Precipitation	Rain
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No, but connects to mapped stream
NYSDEC mapped Classification	Oliver Branch
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	3
Stream Gradient	Steep (>12%)
Substrate	Boulder, Cobble, Gravel
OHWM width for stream reach (feet)	2
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	0-Absent
In Channel Structures	1-Weak
Particle Size of Stream Substrate	3-Strong
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	3-Strong
Grade Control	1-Moderate
Natural Valley	0.5-Weak
Second or Greater Order Channel	0-No

Subtotal =	11.5
Hydrology	
Presence of Baseflow	2-Moderate
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	0.5-Weak
Organic Debris Lines or Piles	1-Moderate
Soil-based evidence of high water table	3-Yes
Subtotal =	7
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0.5-Weak
Crayfish	0-Absent
Amphibians	0.5-Weak
Algae	0.5-Weak
Wetland Plants in Streambed	0-Other
Subtotal =	6.5
Stream Type Determination	
Total Score	25
Stream Determination	Intermittent (≥19)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	298654
Survey Date	04/13/2022
User	Rebecca Steinberg
Stream ID:	05-ST006
Administrative 1	
Investigator(s)	JK, RMS, CS
Latitude, Longitude	
Latitude	37.2923361
Longitude	-83.2822155
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Moderate (6-11%)
Substrate	Cobble, Gravel, Sand (Gritty feel)
OHWM width for stream reach (feet)	1
Geomorphology	
Continuity of channel bed and bank	1-Weak
Sinuosity of channel along thalweg	0-Absent
In Channel Structures	0-Absent
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1-Moderate
Natural Valley	1-Moderate
Second or Greater Order Channel	0-No
Subtotal =	5
Hydrology	

Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	1-Weak
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	0-No
Subtotal =	1
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in	3-Absent
Streambed	5 Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	5
Stream Type Determination	
Total Score	11
Stream Determination	Ephemeral (<19)
Notes	
Notes	05-ST006

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	279816
Survey Date	09/20/2022
User	Josh Bean
Stream ID:	13-ST001
Administrative 1	
Investigator(s)	JB RS LL MS
Latitude, Longitude	
Latitude	37.295848
Longitude	-83.278753
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Steep (>12%)
Substrate	Gravel, Silt/Clay (No grit)
OHWM width for stream reach (feet)	5
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	0-Absent
Particle Size of Stream Substrate	1-Weak
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	0.5-Weak
Natural Valley	0.5-Weak
Second or Greater Order Channel	0-No
Subtotal =	6.0
Hydrology	

Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	0-Strong
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0.5-Weak
Soil-based evidence of high water table	0-No
Subtotal =	0.5
Biology	
Fibrous Roots in Streambed	3-Absent
Rooted Upland Plants in Streambed	1-Moderate
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0.75-FACW
Subtotal =	4.75
Stream Type Determination	
Total Score	11.25
Stream Determination	Ephemeral (<19)
Notes	
Notes	Stream drains PSS wetland. This stream is not the primary drainage channel for the associated wetland and only responds to heavy precipitation events.

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	279878
Survey Date	09/20/2022
User	Josh Bean
Stream ID:	13-ST002
Administrative 1	
Investigator(s)	JB RS MS LL
Latitude, Longitude	
Latitude	37.2957455
Longitude	-83.2786922
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	1
Stream Gradient	Steep (>12%)
Substrate	Cobble, Gravel, Silt/Clay (No grit)
OHWM width for stream reach (feet)	2.5
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	2-Moderate
In Channel Structures	1-Weak
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1-Moderate
Natural Valley	0.5-Weak
Second or Greater Order Channel	0-No
Subtotal =	9.5
Hydrology	

Presence of Baseflow	2-Moderate
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0.5-Weak
Soil-based evidence of high water table	3-Yes
Subtotal =	6.0
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0.75-FACW
Subtotal =	5.75
Stream Type Determination	
Total Score	21.25
Stream Determination	Intermittent (≥19)
Notes	
Notes	Drains PSS wetland

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	279879
Survey Date	09/20/2022
User	Josh Bean
Stream ID:	13-ST002A
Administrative 1	
Investigator(s)	JB RS MS LL
Latitude, Longitude	
Latitude	37.2956543
Longitude	-83.2787322
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Steep (>12%)
Substrate	Boulder, Cobble, Gravel, Silt/Clay (No grit)
OHWM width for stream reach (feet)	3
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	2-Moderate
In Channel Structures	1-Weak
Particle Size of Stream Substrate	3-Strong
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1-Moderate
Natural Valley	0.5-Weak
Second or Greater Order Channel	0-No
Subtotal =	10.5
Hydrology	

Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	1-Moderate
Soil-based evidence of high water table	0-No
Subtotal =	3.0
Biology	
Fibrous Roots in Streambed	3-Absent
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0.75-FACW
Subtotal =	6.75
Stream Type Determination	
Total Score	20.25
Stream Determination	Intermittent (≥19)
Notes	
Notes	Drains PSS wetland. converges with 13-ST02

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	320136
Survey Date	09/20/2022
User	Rebecca Steinberg
Stream ID:	13-ST003
Administrative 1	
Investigator(s)	JB RS
Latitude, Longitude	
Latitude	37.299139
Longitude	-83.27621
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Steep (>12%)
Substrate	Boulder, Cobble, Silt/Clay (No grit)
OHWM width for stream reach (feet)	4
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	2-Moderate
In Channel Structures	0-Absent
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	2-Moderate
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1-Moderate
Natural Valley	1.5-Strong
Second or Greater Order Channel	0-No
Subtotal =	11.5
Hydrology	

Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	1.5-Absent
Sediment on Plants or Debris	0-Absent
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	0-No
Subtotal =	1.5
Biology	
Fibrous Roots in Streambed	0-Strong
Rooted Upland Plants in	0-Strong
Streambed	
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	0
Stream Type Determination	
Total Score	13
Stream Determination	Ephemeral (<19)
Notes	
Notes	Stream only responds during precipitation events.

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	280319
Survey Date	09/20/2022
User	Rebecca Steinberg
Stream ID:	13-ST004
Administrative 1	
Investigator(s)	JB RS
Latitude, Longitude	
Latitude	37.2993006
Longitude	-83.2757629
<b>Current Precipitation</b>	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	2
Stream Gradient	Moderate (6-11%)
Substrate	Bedrock
OHWM width for stream reach (feet)	3
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	3-Strong
Particle Size of Stream Substrate	3-Strong
Active/Relic Floodplain	2-Moderate
Depositional Bars or Benches	2-Moderate
Recent Alluvial Deposits	0-Absent
Are Headcuts present	2-Moderate
Grade Control	1.5-Strong
Natural Valley	1.5-Strong
Second or Greater Order Channel	0-No
Subtotal =	19
Hydrology	

Presence of Baseflow	3-Strong
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	3-Yes
Subtotal =	8
Biology	
Fibrous Roots in Streambed	0-Strong
Rooted Upland Plants in	3-Absent
Streambed	
Aquatic Macroinvertebrates	3-Strong
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	6
Stream Type Determination	
Total Score	33
Stream Determination	Perennial (≥30)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	280365
Survey Date	09/20/2022
User	Rebecca Steinberg
Stream ID:	13-ST005
Administrative 1	
Investigator(s)	JB RS
Latitude, Longitude	
Latitude	37.29936413
Longitude	-83.27563645
<b>Current Precipitation</b>	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	2
Stream Gradient	Moderate (6-11%)
Substrate	Bedrock, Cobble, Gravel
OHWM width for stream reach (feet)	4
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	2-Moderate
Particle Size of Stream Substrate	3-Strong
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	1-Weak
Recent Alluvial Deposits	0-Absent
Are Headcuts present	3-Strong
Grade Control	1.5-Strong
Natural Valley	1-Moderate
Second or Greater Order Channel	0-No
Subtotal =	15.5
Hydrology	

Presence of Baseflow	3-Strong
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	1-Weak
Sediment on Plants or Debris	0.5-Weak
Organic Debris Lines or Piles	0.5-Weak
Soil-based evidence of high water table	3-Yes
Subtotal =	8
Biology	
Fibrous Roots in Streambed	3-Absent
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	2-Moderate
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	8
Stream Type Determination	
Total Score	31.5
Stream Determination	Perennial (≥30)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	320138
Survey Date	09/20/2022
User	Rebecca Steinberg
Stream ID:	13-ST005A
Administrative 1	
Investigator(s)	JB RS
Latitude, Longitude	
Latitude	37.29976051
Longitude	-83.27526396
Datum	WGS84
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1 NYSDEC Mapped Stream	
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	0
Stream Gradient	Moderate (6-11%)
Substrate	Cobble, Gravel, Sand (Gritty feel)
OHWM width for stream reach (feet)	3
Geomorphology	
Continuity of channel bed and bank	1-Weak
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	0-Absent
Particle Size of Stream Substrate	1-Weak
Active/Relic Floodplain	1-Weak
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	0.5-Weak
Natural Valley	1-Moderate
Second or Greater Order Channel	0-No
Subtotal =	5.5

Hydrology	
Presence of Baseflow	0-Absent
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	1-Weak
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	0-Absent
Soil-based evidence of high water table	0-No
Subtotal =	2.5
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	0-Strong
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	2
Stream Type Determination	
Total Score	10
Stream Determination	Ephemeral (<19)
Notes	
Notes	Stream only responds during precipitation events.

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	280556
Survey Date	09/21/2022
User	Rebecca Steinberg
Stream ID:	13-ST006
Administrative 1	
Investigator(s)	RMS
Latitude, Longitude	
Latitude	37.30288088
Longitude	-83.27112892
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	2
Stream Gradient	Gentle (0-5%)
Substrate	Cobble, Gravel, Sand (Gritty feel)
OHWM width for stream reach (feet)	13
Geomorphology	
Continuity of channel bed and bank	1-Weak
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	2-Moderate
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	2-Moderate
Depositional Bars or Benches	3-Strong
Recent Alluvial Deposits	2-Moderate
Are Headcuts present	1-Weak
Grade Control	1-Moderate
Natural Valley	1.5-Strong
Second or Greater Order Channel	0-No
Subtotal =	16.5
Hydrology	

Presence of Baseflow	3-Strong
Iron Oxidizing Bacteria	3-Strong
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	1.5-Strong
Soil-based evidence of high water table	3-Yes
Subtotal =	12.5
Biology	
Fibrous Roots in Streambed	1-Moderate
Rooted Upland Plants in Streambed	0-Strong
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0.5-Weak
Amphibians	0-Absent
Algae	0.5-Weak
Wetland Plants in Streambed	0.75-FACW
Subtotal =	2.75
Stream Type Determination	
Total Score	31.75
Stream Determination	Perennial (≥30)
Notes	
Notes	

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	320135
Survey Date	09/21/2022
User	Rebecca Steinberg
Stream ID:	13-ST007
Administrative 1	
Investigator(s)	RMS
Latitude, Longitude	
Latitude	37.3039831
Longitude	-83.26953216
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	Yes
NYSDEC mapped Classification	
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	4
Stream Gradient	Gentle (0-5%)
Substrate	Gravel, Sand (Gritty feel)
OHWM width for stream reach (feet)	5
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	3-Strong
In Channel Structures	2-Moderate
Particle Size of Stream Substrate	1-Weak
Active/Relic Floodplain	3-Strong
Depositional Bars or Benches	3-Strong
Recent Alluvial Deposits	1-Weak
Are Headcuts present	1-Weak
Grade Control	0.5-Weak
Natural Valley	1.5-Strong
Second or Greater Order Channel	3-Yes
Subtotal =	22

Hydrology	
Presence of Baseflow	3-Strong
Iron Oxidizing Bacteria	0-Absent
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	0.5-Weak
Soil-based evidence of high water table	
Subtotal =	5.5
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	3-Strong
Aquatic Mollusks	0-Absent
Fish	1.5-Strong
Crayfish	1-Moderate
Amphibians	0-Absent
Algae	
Wetland Plants in Streambed	0.75-FACW
Subtotal =	11.25
Stream Type Determination	
Total Score	38.75
Stream Determination	Perennial (≥30)
Notes	
Notes	Kentucky mapped stream.

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	280499
Survey Date	09/21/2022
User	Josh Bean
Stream ID:	13-ST008
Administrative 1	
Investigator(s)	JB LL
Latitude, Longitude	
Latitude	37.304179
Longitude	-83.269936
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No, but connects to mapped stream
NYSDEC mapped Classification	460
Drainage Ditch	No
Surface Water Depth at Thalweg (Inches)	1.5
Stream Gradient	Moderate (6-11%)
Substrate	Gravel, Silt/Clay (No grit)
OHWM width for stream reach (feet)	5
Geomorphology	
Continuity of channel bed and bank	2-Moderate
Sinuosity of channel along thalweg	3-Strong
In Channel Structures	2-Moderate
Particle Size of Stream Substrate	1-Weak
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	1-Weak
Recent Alluvial Deposits	0-Absent
Are Headcuts present	3-Strong
Grade Control	1-Moderate
Natural Valley	1-Moderate
Second or Greater Order Channel	0-No
Subtotal =	14.0

Hydrology	
Presence of Baseflow	1-Weak
Iron Oxidizing Bacteria	3-Strong
Leaf Litter	0.5-Moderate
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	1.5-Strong
Soil-based evidence of high water table	0-No
Subtotal =	7.5
Biology	
Fibrous Roots in Streambed	1-Moderate
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0.75-FACW
Subtotal =	4.75
Stream Type Determination	
Total Score	26.25
Stream Determination	Intermittent (≥19)
Notes	
Notes	stream drains to PEM wetland with hydrologic connection to Kentucky mapped perennial stream.

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	320146
Survey Date	09/21/2022
User	Rebecca Steinberg
Stream ID:	13-ST009
Administrative 1	
Investigator(s)	RS,MS
Latitude, Longitude	
Latitude	37.30410456
Longitude	-83.26919421
Datum	WGS84
Current Precipitation	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	Yes
Surface Water Depth at Thalweg (Inches)	4
Stream Gradient	Moderate (6-11%)
Substrate	Cobble, Sand (Gritty feel)
OHWM width for stream reach (feet)	2
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	1-Weak
Particle Size of Stream Substrate	2-Moderate
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	2-Moderate
Grade Control	1-Moderate
Natural Valley	0-Absent
Second or Greater Order Channel	0-No
Subtotal =	10

Hydrology	
Presence of Baseflow	3-Strong
Iron Oxidizing Bacteria	3-Strong
Leaf Litter	1.5-Absent
Sediment on Plants or Debris	1.5-Strong
Organic Debris Lines or Piles	1-Moderate
Soil-based evidence of high water table	3-Yes
Subtotal =	13
Biology	
Fibrous Roots in Streambed	2-Weak
Rooted Upland Plants in Streambed	3-Absent
Aquatic Macroinvertebrates	0-Absent
Aquatic Mollusks	0-Absent
Fish	0-Absent
Crayfish	0-Absent
Amphibians	0-Absent
Algae	0-Absent
Wetland Plants in Streambed	0-Other
Subtotal =	5
Stream Type Determination	
Total Score	28
Stream Determination	Intermittent (≥19)
Notes	
Notes	Stream flows along roadside.

22046: Bright Mountain	Stream Dataform 1
Project	22046: Bright Mountain Solar
ID	371726
Survey Date	09/21/2022
User	Josh Bean
Stream ID:	13-ST010
Administrative 1	
Investigator(s)	JB, RMS
Latitude, Longitude	
Latitude	37.291721
Longitude	-83.236124
<b>Current Precipitation</b>	None
Precipitation in Past 48 Hours	None
Town/County/State	Hazard, Perry County, Kentucky
General Characteristics 1	
NYSDEC Mapped Stream	No
Drainage Ditch	Yes
Surface Water Depth at Thalweg (Inches)	3
Stream Gradient	Moderate (6-11%)
Substrate	Boulder, Cobble
OHWM width for stream reach (feet)	6
Geomorphology	
Continuity of channel bed and bank	3-Strong
Sinuosity of channel along thalweg	1-Weak
In Channel Structures	3-Strong
Particle Size of Stream Substrate	3-Strong
Active/Relic Floodplain	0-Absent
Depositional Bars or Benches	0-Absent
Recent Alluvial Deposits	0-Absent
Are Headcuts present	0-Absent
Grade Control	1.5-Strong
Natural Valley	0-Absent
Second or Greater Order Channel	0-No
Subtotal =	11.5
Hydrology	