U.S. Army Corps of Engineers – Charleston District - Regulatory Division

JURISDICTIONAL DETERMINATION REQUEST

For Identifying Waters of the U.S., Including Wetlands and Tributaries

Project Name & Location Address: Steepl		
County: Kershaw	Total Acreage of Tract: 277.91	Date: 5-9-2014
Property Owner : Kershaw County	Agent: S&ME, Inc. (c/o Chris Daves, P.W.S.)
515 Walnut Street Address:	134 Suber Ro	d.
Camden, South Carolina 29020	Columbia, SC	C 29210
Phone: (803) 425-7685 (Peggy	McLean) Phone: (803) 561-902	4
Email:eggy.mclean@kershaw.sc.gov		ic.com
 an environmental consultant. The first to Accurate location maps (from the property from a nearby major in the Copy of Survey Plat or Tax Material Additional information such as description of the proposed use 	ap of Property. soil survey sheet, aerial photograph, tope of property, status of project, etc, may for review and verification by the Corps.	pur request: street address and directions to pographic survey, conceptual site plan also be provided but are not required.
Accurate-Approved Approxi	imate-Approved Accurate-Prelin	minary Approximate-Preliminary
Refer to the below definitions: <u>Preliminary</u> – Preliminary determinations will identif jurisdictional; therefore, a Preliminary can often be <u>Approved</u> – Approved determinations will identify w	completed more quickly than an Approved jurisdic	ctional determination.
jurisdictional status.	mether wedards of other waters are present of a	to site and will include a determination of their
<u>Accurate:</u> Verified location and extent of all Waters or represented by a tax map (or by GPS points if no		nd surveyor. Project boundary must be surveyed
<u>Approximate</u> : Verified location and extent of all Warepresented by a tax map or GPS coordinates.	aters of the U.S. are depicted approximately on a	sketch. Project boundary may be surveyed or
MPORTANT NOTE: Legible printed name present property owner or have the specified employees or their agents to enter onto the Do not sign this form unless you are the c	fic authority of the property owner to ne property for on-site investigations owner, or have the specific authority	authorize Corps of Engineers if such is deemed necessary.
PRINTED NAME of person signing this for	rm, below: Chris Daves, P.W.S.	
Signature of Property Owner or Authorize	ed Agent: Chis Daves	

HQ and South Branch 69-A Hagood Avenue Charleston, SC 29403 843-329-8044 Northeast Branch 1949 Industrial Park Rd, Room 140 Conway, SC 29526 843-365-4239 Northwest Branch 1835 Assembly St., Room 865-B1 Columbia, SC 29201 803-253-3444



May 9, 2014

U.S. Army Corps of Engineers Columbia Regulatory Office Strom Thurmond Federal Building 1835 Assembly Street, Room 865 B-1 Columbia, South Carolina 29201

Attention: Watershed 5 Project Manager

Reference: Request for Jurisdictional Determination

Steeplechase IP Site – 277.91 acres

SAC 2001-34608-5JK

Camden, Kershaw County, South Carolina

S&ME Project No. 4261-14-036

Dear Watershed 5 Project Manager:

On behalf of Kershaw County Economic Development Office, S&ME, Inc. (S&ME) has completed a Wetland Delineation at the above-referenced site. The approximately 277.91-acre site is located at 399 Black River Road near Camden, Kershaw County, South Carolina. The site consists of two Kershaw County tax parcel numbers (299-00-00-049 and 299-00-00-085), subsequently owned by Mulberry Plantation Inc. and Kershaw County. The site consists of forestland, open fields, cutover, and the Kershaw County Economic Development Office. The site is located in the Wateree River Watershed (HUC 03050104-03) within the Catawba River Basin and USACE Watershed Group 5. Please refer to Figures 1-5 in Appendix A for depictions of the site and surrounding features.

PREVIOUS WETLAND DELINEATION

A Jurisdictional Determination (JD) letter was issued by the USACE on May 29, 2009 in response to a letter submitted on behalf of Mr. Nelson Lindsay, with the Kershaw County Economic Development Office. The JD letter (SAC 2001-34608-5JK) approximated 108.063 acres of jurisdictional Waters of the U.S. (WOUS). Please refer to Appendix C for the 2009 JD letter.

WETLAND DELINEATION

On March 11 and April 22-25, 2014, S&ME Biologists Chris Daves and Chris Handley conducted the Wetland Delineation. Features observed were as follows:

- Two (2) jurisdictional wetlands (Wetlands A and B);
- Two (2) jurisdictional linear features including, one (1) Perennial Relatively Permanent Water (PRPW-1) and one (1) Seasonal Relatively Permanent Water (SRPW-2);
- Two (2) non-jurisdictional linear conveyances (NJLC-1-2); and
- Two (2) upland-dug, non-jurisdictional impoundments (Detention Pond and Borrow Pit).

Please refer to Figure 3 (Aerial Map) in Appendix A for the approximate locations of these features.

JURISDICTIONAL WETLANDS AND LINEAR FEATURES

Please refer to the tables below for information regarding the jurisdictional features included in the delineation.

Table 1 – Jurisdictional Wetlands

ID	Photo ID	Wetland Type	Approximate Acreage
Wetland A	1-2	Palustrine forested (PFO)/scrub-shrub (PSS) wetland located on the central portion of the site.	118.486 ac
Wetland B	3	Palustrine emergent (PEM) wetland located on the southwestern portion of the site.	1.470 ac
		Total Approximate Acreage	119.956 ac

Table 2 – Jurisdictional Linear Features

ID	Photo ID	Comments	Approximate Acreage/Linear Footage
PRPW-1	4-5	Perennial, jurisdictional tributary flowing through Wetland A on the central portion of the site.	0.297 ac/3,237 lf
SRPW-2	6	Seasonal, jurisdictional tributary flowing on the southeastern portion of the site. Flows into Wetland A where it becomes a braided channel system.	0.120 ac/1,743 lf
		Total Approximate Acreage/Linear Footage	0.417 ac/4,980 lf

PRPW = Perennial Relatively Permanent Water

SRPW = Seasonal Relatively Permanent Water

NON-JURISDICTIONAL LINEAR FEATURES AND IMPOUNDMENTS

Please refer to the table below for information regarding the non-jurisdictional features included in the delineation.

Table 3 – Non-Jurisdictional Linear Conveyances

ID	Photo ID	Comments	Approximate Acreage/Linear Footage
NJLC-1	7	NJLC located on the western portion of the site.	0.160 ac/695 lf
NJLC-2	8	NJLC located on the southwestern portion of the site.	0.011 ac/480 lf
		Total Approximate Acreage/Linear Footage	0.171 ac/1,175 lf

NJLC = Non-Jurisdictional Linear Conveyance

Table 4 – Non-Jurisdictional Impoundments

ID	Photo ID	Comments	Approximate Acreage
Detention Pond	9	Upland-dug detention pond located on the western portion of the site.	1.206 ac
Borrow Pit	10	Upland-dug borrow pit located on the northern portion of the site.	0.591 ac
		Total Approximate Acreage	1.797 ac

In summary, the site contains approximately 120.373 acres of jurisdictional Waters of the U.S.

UPLANDS

Upland areas (Photographs 11-12) on the site consist of pine-mixed hardwoods, mixed-hardwoods, planted pine, cutover forestland, and open fields. These portions of the site consist primarily of non-hydric soil series such as Goldsboro, Norfolk, Persanti, and Wagram listed in the *Soil Survey of Kershaw County* and the U.S. Department of Agriculture - Natural Resources Conservation Service (USDA-NRCS) Web Soil Survey (Figure 4 – Soils Map). Wetland vegetation, hydric soils, or hydrology were not observed in the upland areas.

ENCLOSURES

Attached in Appendices A-C, please find the following information for your review:

Appendix A

Figure 1 - Vicinity Map, Figure 2 - Topographic Map, Figure 3 - Aerial Map, Figure 4 - Soils Map, Figure 5 - NWI Map, Site Photographs

Appendix B

Wetland/Upland Datasheets

Appendix C

Previous USACE JD Letter SAC 2001-34608-5JK, dated May 29, 2009

CLOSING

Thank you for your time and attention to this project. If we can provide additional information, please do not hesitate to contact Chris Daves at 803-561-9024.

Sincerely,

S&ME, Inc.

Chris Handley

Chris Handley

Biologist

Chris Daves, P.W.S.

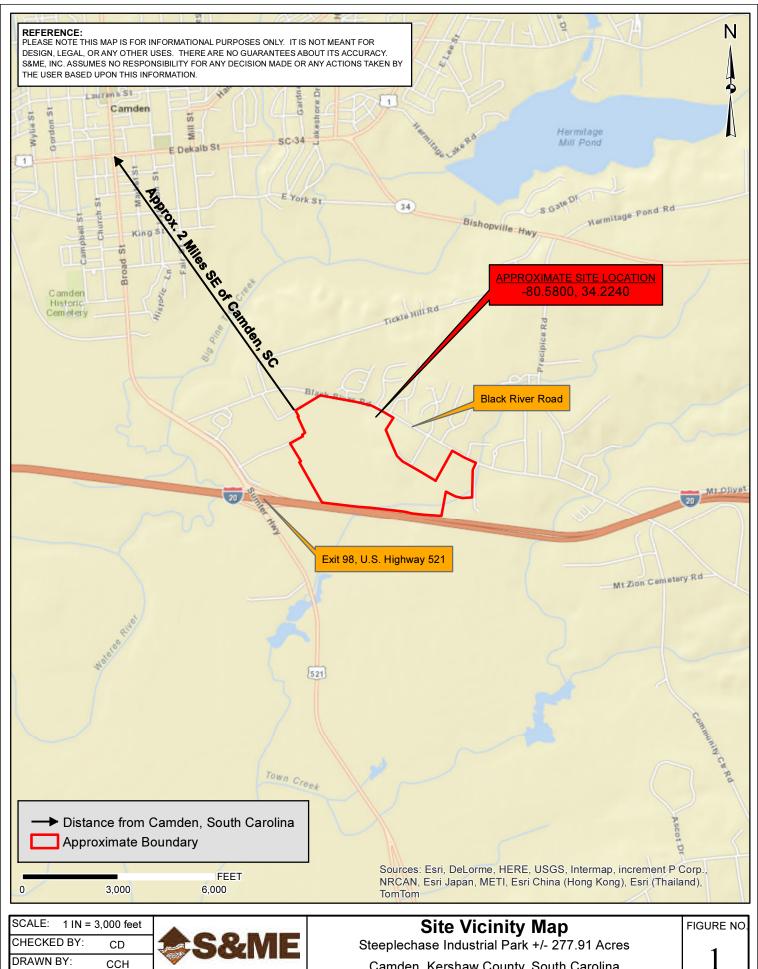
(In Daves

Biologist

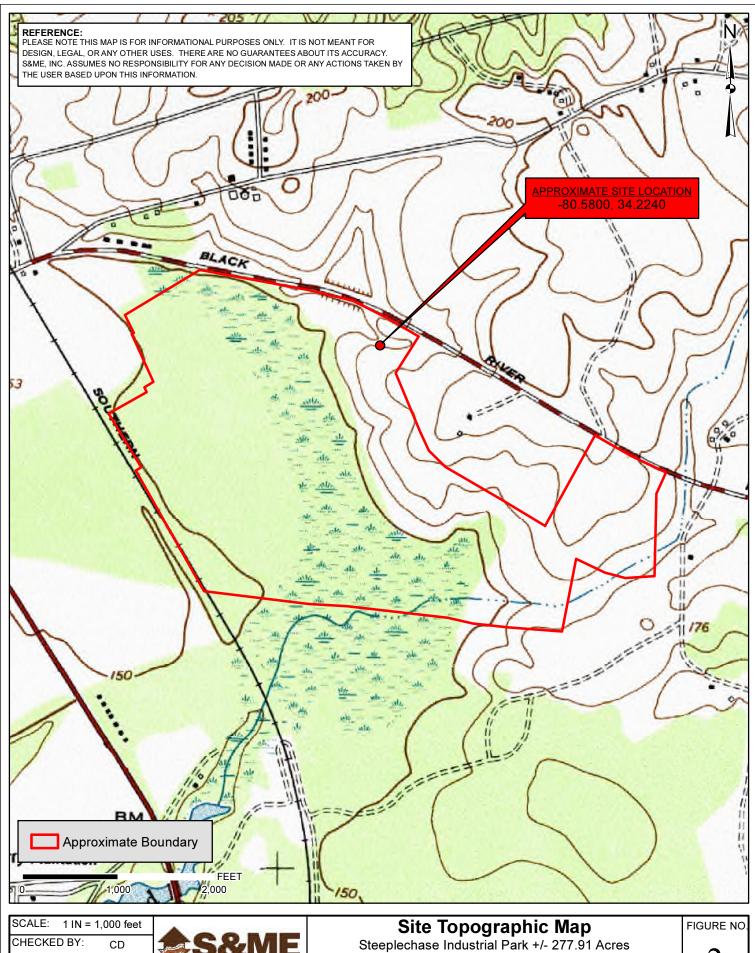
S:\ENVIRON\1 6 1 4 - 014 (2420) JOBS\4261-14-036\ Steeplechase IP Site\ JD Request Submittal

Appendix A

Vicinity Map
Topographic Map
Aerial Map
Soils Map
NWI Map
Site Photographs

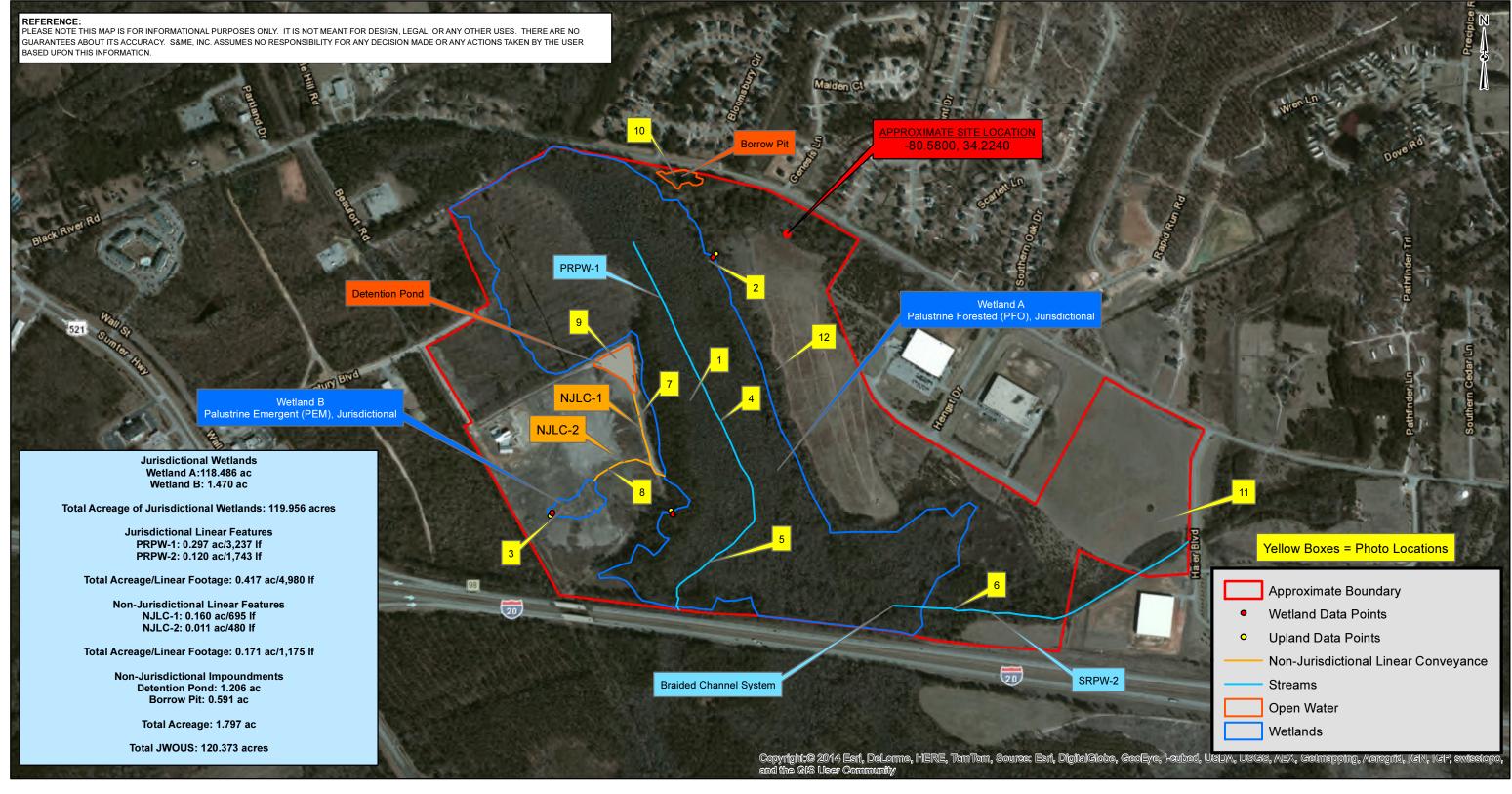


	SCALE: 1 IN:	= 3,000 feet	A			Site Vicinity Map	FIGURE NO.
	CHECKED BY:	CD	258	4ME	S	teeplechase Industrial Park +/- 277.91 Acres	1 1
	DRAWN BY:	ССН				Camden, Kershaw County, South Carolina	
	DATE:	5/7/2014	PROJECT NO:	4261-14-036	SOURCE:	World Street Map	
L							



SCALE: 1 IN:	= 1,000 feet	A		
CHECKED BY:	CD	258	ME	S
DRAWN BY:	ССН			
DATE:	5/7/2014	PROJECT NO:	4261-14-036	SOURCE:

Camden, Kershaw County, South Carolina USGS 7.5 Minute Topo Quad Camden South 1953



Source: ESRI Resources - World Imagery 2010 & World Transportation Applicant: Kershaw County

 SCALE:
 1 inch = 700 feet

 CHECKED BY:
 CD

 DRAWN BY:
 CH

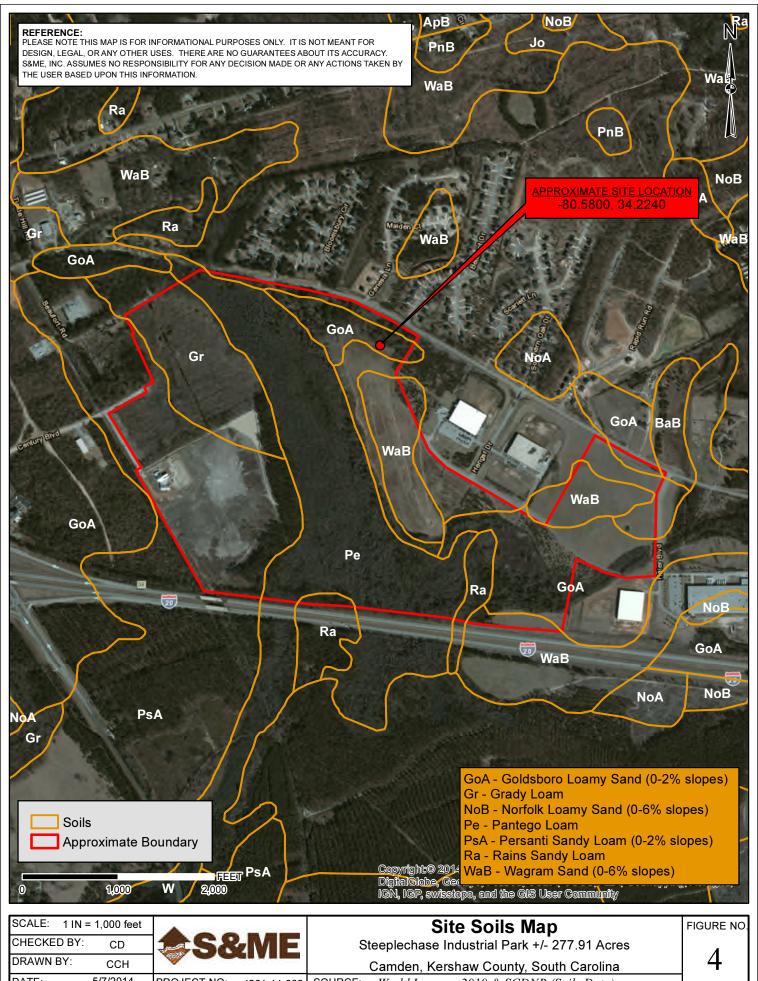
 DATE:
 5/7/2014



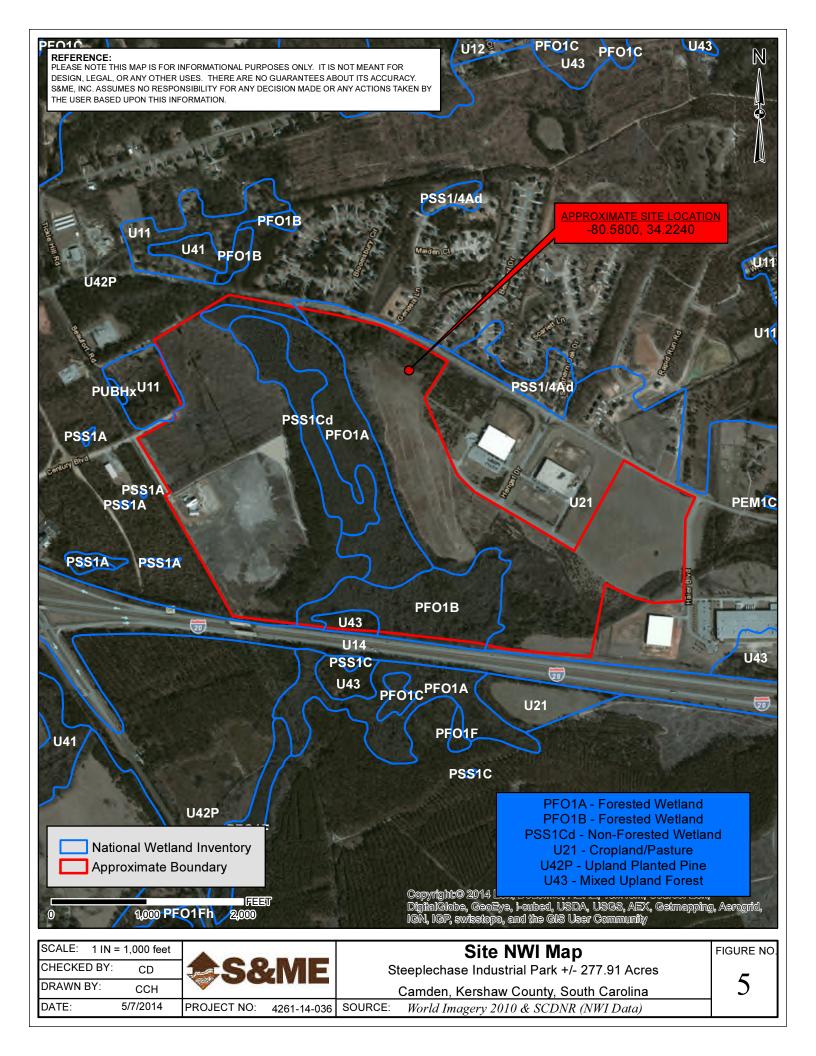
	0	700	1,400	2,800	
Site Aerial Map					
Steeplechase		277.91 Acres		3	

Camden, Kershaw County, South Carolina

S&ME PROJECT NO. 4261-14-036



5/7/2014 DATE: PROJECT NO: SOURCE: World Imagery 2010 & SCDNR (Soils Data) 4261-14-036





Forested wetland (Wetland A) located on the central portion of the site.



Palustrine emergent wetland (Wetland B) located on the southwest portion of the site.



Shrub-scrub wetland (Wetland A) located on the northern portion of the site.



Perennial stream (PRPW-1) flowing through Wetland A on the central portion of the site.



Perennial stream (PRPW-1) flowing through Wetland A on the southern portion of the site.



Non-jurisdictional linear conveyance (NJLC-1) located on the western portion of the site.



Seasonal stream (SRPW-2) flowing on the southeastern portion of the site.



Non-jurisdictional linear conveyance (NJLC-2) located on the southwestern portion of the site.



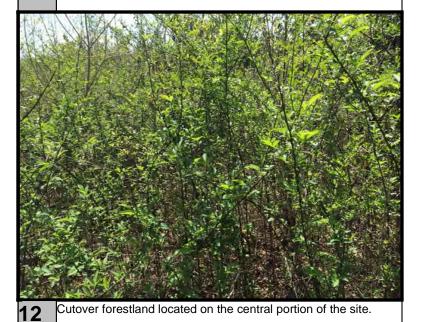
9 Upland-dug detention pond located on the western portion of the site.



Open field/fallow agricultural land located on the eastern portion of the site.



10 Upland-dug borrow pit located on the northern portion of the site.



Site Photographs Steeplechase IP Site Camden, Kershaw County, South Carolina

Appendix B

Wetland/Upland Datasheets

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Steeplechase IP Site	City/County: Can	nden/Kershaw	Sampling Date: 4-22-14
Applicant/Owner: Kershaw County		State: SC	Sampling Point: Wet A-PFO
Investigator(s): Chris Daves & Chris Handley-S&ME	Section, Township	, Range:	
Landform (hillslope, terrace, etc.): Hillslope	Local relief (conca	ve, convex, none): concave	Slope (%): <2%
Subregion (LRR or MLRA): LRR-P Lat: 34.2	180	Long: -80.5830	Datum: NAD83
Soil Map Unit Name: Persanti Sandy Loam (PsA)		NWI classifica	
Are climatic / hydrologic conditions on the site typical for this time of y	ear? Yes	No (If no, explain in Re	emarks.)
		Are "Normal Circumstances" pi	resent? Yes 🗸 No
	roblematic?	(If needed, explain any answer	s in Remarks.)
SUMMARY OF FINDINGS – Attach site map showing	g sampling poi	nt locations, transects,	important features, etc.
	1		
Hydrophytic Vegetation Present? Yes No	Is the Sam	pled Area	
Hydric Soil Present? Yes V No	within a W	etland? Yes	No
Wetland Hydrology Present? Yes No Remarks:			
Data point taken within Wetland A on the southwester	n side.		
HYDROLOGY			
Wetland Hydrology Indicators:		Secondary Indicat	tors (minimum of two required)
Primary Indicators (minimum of one is required; check all that apply))	Surface Soil 0	Cracks (B6)
Surface Water (A1) Aquatic Fauna (B ²	13)	Sparsely Veg	etated Concave Surface (B8)
High Water Table (A2) Marl Deposits (B1		Drainage Patt	
Saturation (A3) Hydrogen Sulfide	, ,	Moss Trim Lir	` ′
	heres along Living F		Vater Table (C2)
Sediment Deposits (B2) Presence of Redu	, ,	Crayfish Burro	` ′
	ction in Tilled Soils (· ·	sible on Aerial Imagery (C9)
Algal Mat or Crust (B4) Thin Muck Surface Iron Deposits (B5) Other (Explain in I	` ,	Geomorphic F	· '
Inundation Visible on Aerial Imagery (B7)	(Ciliaiks)	FAC-Neutral	` ′
Water-Stained Leaves (B9)			oss (D8) (LRR T, U)
Field Observations:			(, (, -,
Surface Water Present? Yes No Pepth (inches	s):		
Water Table Present? Yes No Pepth (inches	s):		
Saturation Present? Yes V No Depth (inches	s): <u>6"</u>	Wetland Hydrology Present	t? Yes 🔽 No 🔙
(includes capillary fringe) Describe Recorded Data (stream gauge, monitoring well, aerial photographics)		tions), if available:	
gango, momenty non, asian pro-	, p	,	
Remarks:			
Wetland hydrology was observed.			

size: 30-ft radius) % Cover Species? Status 30 Y FAC

50% of total cover: 15 20% of total cover: 6

50% of total cover: 7.5 20% of total cover: 3

50% of total cover: 7.5 20% of total cover: 3

50% of total cover: 12.5 20% of total cover: 5

3. Liquidambar styraciflua 5 Y FAC

15____ = Total Cover

20% of total cover: 4

Tree Stratum (Plot size: 30-ft radius)

Sapling Stratum (Plot size: 30-ft radius) 1. Acer rubrum
2 Quercus nigra

Shrub Stratum (Plot size: 30-ft radius

Herb Stratum (Plot size: 30-ft radius)

2. Liquidambar styraciflua

3. Smilax rotundifolia

4. Vaccinium agustifolium 5

_{5.} Arundinaria gigantea <u>5 Y</u>

2. Liquidambar styraciflua 5

3. Ilex opaca 5 Y

1. Acer rubrum

1. Vitis rotundifolia

1 Pinus taeda

2. Quercus nigra

Absolute	Dominant	In diantas		mpling Point: Wet	
	Species?		Number of Dominant Species That Are OBL, FACW, or FAC	1.4	(A)
			Total Number of Dominant Species Across All Strata:	15	(B)
			Percent of Dominant Species That Are OBL, FACW, or FAC		(A/B)
30	= Total Cov		Prevalence Index workshee	t:	
	total cover:	_	Total % Cover of:	Multiply by:	_
_ 20 70 01	10101 00101		OBL species	x 1 =	_
5	Υ	FAC	FACW species	x 2 =	_
5 5	Y	FAC	FAC species	x 3 =	_
5	<u>Y</u>	FAC	FACU species	x 4 =	_
			UPL species	x 5 =	_
			Column Totals:	(A)	_ (B)
			Prevalence Index = B/A	. =	
15	= Total Cov	er	Hydrophytic Vegetation Indi		
_ 20% of	total cover:	3	1 - Rapid Test for Hydrop		
			2 - Dominance Test is >5		
5	<u>Y</u>	FAC	3 - Prevalence Index is ≤	3.0 ¹	
5	<u>Y</u>	FAC	Problematic Hydrophytic	Vegetation¹ (Expla	in)
5	<u>Y</u>	FAC		(,
			¹ Indicators of hydric soil and was be present, unless disturbed of		must
			Definitions of Five Vegetation	on Strata:	
	= Total Cov total cover:	_	Tree – Woody plants, excluding approximately 20 ft (6 m) or m (7.6 cm) or larger in diameter	nore in height and 3	
5	Υ	FAC	(7.0 cm) or larger in diameter	at breast neight (D	Б П).
<u>5</u> 5	-		Sapling – Woody plants, excl		
5	<u>Y</u>	FAC FAC	approximately 20 ft (6 m) or m than 3 in. (7.6 cm) DBH.	iore in neight and i	ess
			, , ,		
<u>5</u>	<u>Y</u>	FACU FACW	Shrub – Woody plants, exclu- approximately 3 to 20 ft (1 to)		
			Herb - All herbaceous (non-w		
			herbaceous vines, regardless plants, except woody vines, le		
			3 ft (1 m) in height.		•
			Woody vine – All woody vine	s. regardless of he	iaht.
				-, 	
25					
	= Total Cov				
_ ^{20%} of	total cover:	<u> </u>			
10	٧	FAC			
10	<u></u>	FAC			
5	<u></u>				
<u>5</u>	<u> </u>	FAC			
20			Hydrophytic		
20 20% of	= Total Cov		Vegetation Present? Yes	/ No I	

Remarks: (If observed, list morphological adaptations below).

50% of total cover: 10

Hydrophytic vegetation was observed.

Woody Vine Stratum (Plot size: 30-ft radius) 1. Smilax rotundifolia

² Vitis rotundifolia

3. Toxicodendron radicans

SOIL

Sampling Point: Wet A-PFC

Profile Desc Depth	ription: (Describ Matrix	e to the dep	th needed to docu	ment the ox Featur		r or confirr	n the absence	of indicators.)
(inches)	Color (moist)	%	Color (moist)	<u> %</u>	Type ¹	Loc ²	<u>Texture</u>	<u>Remarks</u>
1-6"	10YR 5/2	98	10YR 6/8	2	<u>C</u>	<u>M</u>	LC	
6-12"	10YR 4/2	98	10YR 6/8	2	С	М	LC	
12-20"	10YR 4/1	98	10YR 6/8	2	_ <u>C</u>		LC	
					_			
			=Reduced Matrix, M LRRs, unless othe			erains.		PL=Pore Lining, M=Matrix. for Problematic Hydric Soils ³ :
Histosol		icable to all	Polyvalue B			(IPP S T I		fuck (A9) (LRR O)
_	oipedon (A2)		Thin Dark S					Muck (A10) (LRR S)
	istic (A3)		Loamy Muc				I F	ed Vertic (F18) (outside MLRA 150A,B)
	en Sulfide (A4)		Loamy Gley					ont Floodplain Soils (F19) (LRR P, S, T)
I — — I	d Layers (A5)	D. T. III)	Depleted Ma					llous Bright Loamy Soils (F20)
11 1 -	Bodies (A6) (LRR ucky Mineral (A7) (Redox Dark Depleted Da		` '			RA 153B) arent Material (TF2)
	esence (A8) (LRR		Redox Depr		. ,		1 1	hallow Dark Surface (TF12)
17 1	ıck (A9) (LRR P, T		Marl (F10) (LRR U)	` ′			(Explain in Remarks)
11 1	d Below Dark Surfa	ace (A11)	Depleted O					
	ark Surface (A12) rairie Redox (A16)	/MI DA 450	Iron-Mangai A) Umbric Surf					ators of hydrophytic vegetation and land hydrology must be present,
	fairle Redox (AT6) Nucky Mineral (S1)	•	Delta Ochrid					ess disturbed or problematic.
	Gleyed Matrix (S4)	(= =, =,	Reduced Ve			•		
14 1 -	Redox (S5)		Piedmont FI	oodplain	Soils (F19	9) (MLRA 1 -	49A)	
	Matrix (S6)		Anomalous	Bright Lo	amy Soils	(F20) (MLF	RA 149A, 153C,	, 153D)
	rface (S7) (LRR P, Layer (if observed						<u> </u>	
Type:		4,.						
Depth (in							Hydric Soil	Present? Yes
							1,	
'''''''' F	lydric soils wer	e observe	a.					

WETLAND DETERMINATION DATA FORM – Atlantic and Gulf Coastal Plain Region

Project/Site: Steeplechase IP Site	_ City/County: Camden/K	<u>Kershaw</u>	Sampling Date: 4-22-14
Applicant/Owner: Kershaw County		State: SC	Sampling Point: Up A-PFO
Investigator(s): Chris Daves & Chris Handley-S&ME	_ Section, Township, Range	e:	
Landform (hillslope, terrace, etc.): Hillslope	_ Local relief (concave, conv	vex, none): concave	Slope (%): <2%
Subregion (LRR or MLRA): LRR-P Lat: 34.2			Datum: NAD83
Soil Map Unit Name: Persanti Sandy Loam (PsA)		NWI classifica	
Are climatic / hydrologic conditions on the site typical for this time of	vear? Yes 🗸 No	(If no, explain in Re	
		rmal Circumstances" p	
		ed, explain any answer	
SUMMARY OF FINDINGS – Attach site map showing	`		•
Hydronhytic Vegetation Present?	7		
Hydrophytic Vegetation Present? Hydric Soil Present? Yes No Yes	Is the Sampled Are	rea	7 [
Wetland Hydrology Present?	within a Wetland?	Yes	No 🗸
Remarks:			
Data point taken within upland adjacent to Wetland A	on the southwestern s	side.	
HYDROLOGY			
Wetland Hydrology Indicators:		Secondary Indicat	tors (minimum of two required)
Primary Indicators (minimum of one is required; check all that apply	/)	Surface Soil (Cracks (B6)
Surface Water (A1) Aquatic Fauna (E	313)	Sparsely Veg	etated Concave Surface (B8)
High Water Table (A2) Marl Deposits (B		Drainage Pat	, ,
Saturation (A3) Hydrogen Sulfide	, ,	Moss Trim Li	, ,
	oheres along Living Roots (C	· = ·	Nater Table (C2)
Sediment Deposits (B2) Presence of Red Prift Deposits (B3) Recent Iron Red	uced fron (C4) uction in Tilled Soils (C6)	Crayfish Burn	ows (C8) sible on Aerial Imagery (C9)
Algal Mat or Crust (B4) Thin Muck Surface	, ,	Geomorphic I	
Iron Deposits (B5) Other (Explain in	, ,	Shallow Aquit	
Inundation Visible on Aerial Imagery (B7)	,	FAC-Neutral	` '
Water-Stained Leaves (B9)		Sphagnum m	oss (D8) (LRR T, U)
Field Observations:			
Surface Water Present? Yes No Depth (inche			
Water Table Present? Yes No Depth (inche	I		
Saturation Present? Yes No Depth (inche (includes capillary fringe)	es): Wetlar	nd Hydrology Presen	t? Yes No V
Describe Recorded Data (stream gauge, monitoring well, aerial pho	otos, previous inspections), if	f available:	
Remarks:			
Wetland hydrology was not observed.			

Sampling Point: Up A-	A-P	FΟ
-----------------------	-----	----

To the State of South radius		Dominant		Dominance Test worksheet:
Tree Stratum (Plot size: 30-ft radius) 1. Pinus taeda	% Cover 30	Species?	FAC	Number of Dominant Species That Are OBL, FACW, or FAC: 9 (A)
2				Total Number of Dominant Species Across All Strata: 10 (B)
4				Percent of Dominant Species That Are OBL, FACW, or FAC: 90 (A/B)
·		= Total Co		Prevalence Index worksheet:
50% of total cover:				Total % Cover of: Multiply by:
Sapling Stratum (Plot size: 30-ft radius)			·	OBL species x 1 =
1. Acer rubrum	10	Υ	FAC	FACW species x 2 =
2. Quercus nigra	F	<u>Y</u>	FAC	FAC species x 3 =
3.				FACU species x 4 =
4				UPL species x 5 =
5				Column Totals: (A) (B)
6				
·-	15	= Total Cov		Prevalence Index = B/A =
50% of total cover: 7.5			_	Hydrophytic Vegetation Indicators:
Shrub Stratum (Plot size: 30-ft radius	20 70 01	total cover		1 - Rapid Test for Hydrophytic Vegetation
1. Acer rubrum	5	Υ	FAC	2 - Dominance Test is >50%
2 Pinus taeda	5	\overline{Y}	FAC	3 - Prevalence Index is ≤3.0 ¹
	5	<u>Y</u>	FAC	Problematic Hydrophytic Vegetation¹ (Explain)
	5	Y	FAC	4
· · · · · · · · · · · · · · · · · · ·				Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
5			-	Definitions of Five Vegetation Strata:
6		= Total Co		Definitions of Five Vegetation Strata.
50% of total cover: 10				Tree – Woody plants, excluding woody vines,
Herb Stratum (Plot size: 30-ft radius)	20 % 01	total cover	• —	approximately 20 ft (6 m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).
1 Vaccinium angustifolium	15	Υ	FACU	
2. Vitis rotundifolia		<u>Y</u>		Sapling – Woody plants, excluding woody vines, approximately 20 ft (6 m) or more in height and less
<u></u>				than 3 in. (7.6 cm) DBH.
3				Shrub – Woody plants, excluding woody vines,
4 5				approximately 3 to 20 ft (1 to 6 m) in height.
6				Herb – All herbaceous (non-woody) plants, including
7				herbaceous vines, regardless of size, and woody
8				plants, except woody vines, less than approximately 3 ft (1 m) in height.
9				Sit (1 m) in neight.
10				Woody vine - All woody vines, regardless of height.
11				
	20	= Total Co		
50% of total cover: <u>10</u>		total cover		
Woody Vine Stratum (Plot size: 30-ft radius)	20 /0 01	total cover	· <u>- </u>	
1. Vitis rotundifolia	5	Υ	FAC	
	<u> </u>			
2				
3				
4				
o	5			Hydrophytic Vegetation
50% of total cover: 2.5		= Total Cover		Present? Yes No No
Remarks: (If observed, list morphological adaptations beld		iolai cover	· <u>-</u>	
remains. (II observed, list morphological adaptations bett	νν).			
Hydrophytic vegetation was observed.				

Sampling Point: Up A-PFO

SOIL

Profile Desc	ription: (Describe	to the depti	h needed to docun	nent the indi	cator or con	firm the absence	e of indicators	s.)
Depth	Matrix		Redo	r Features				
(inches)	Color (moist)	%	Color (moist)	<u>%</u> <u>T</u>	ype ¹ Loc			Remarks
1-20"	10YR 5/3	100				LC	. <u> </u>	
-	-						-	
								_
1						2, ,,	- 	
			Reduced Matrix, MS					ing, M=Matrix.
		cable to all L	RRs, unless other.					atic Hydric Soils ³ :
Histosol				low Surface (Muck (A9) (LF	
· — ·	pipedon (A2)		Thin Dark Su			l f	Muck (A10) (L	-
	stic (A3)		Loamy Mucky		(LRR O)			8) (outside MLRA 150A,B)
	n Sulfide (A4)		Loamy Gleye Depleted Mat				•	n Soils (F19) (LRR P, S, T)
	l Layers (A5)) T III	Redox Dark	. ,				oamy Soils (F20)
	Bodies (A6) (LRR in licky Mineral (A7) (L		Depleted Dar	` '	' \	_ `	. RA 153B) Parent Materia	L(TE2)
	esence (A8) (LRR I		Redox Depre		,	1 1		Surface (TF12)
7	ick (A9) (LRR P, T)		Marl (F10) (L	, ,			(Explain in Re	
	d Below Dark Surfac		Depleted Och	•	RA 151)		(Explain in IX	indiks)
	ark Surface (A12)	50 (/ 111/)	Iron-Mangane		-	. P. T) ³ Indi	cators of hydr	ophytic vegetation and
	rairie Redox (A16) (MLRA 150A					-	gy must be present,
	lucky Mineral (S1)		Delta Ochric					or problematic.
	Bleyed Matrix (S4)	, ,	Reduced Ver					,
Sandy R	ledox (S5)		Piedmont Flo	odplain Soils	(F19) (MLR /	\ 149A)		
Stripped	Matrix (S6)		Anomalous B	right Loamy S	30ils (F20) (N	ILRA 149A, 1530	C, 153D)	
	rface (S7) (LRR P,							
Restrictive	Layer (if observed)	1:						
Туре:								
Depth (in	ches):					Hydric Soi	I Present?	Yes No
Remarks: L	ydric soils were	not obse	rvad					
• '	lydric 30ii3 Were	, HOLODGO	vou.					

WETLAND DETERMINATION DATA FORM – Atlantic and Gulf Coastal Plain Region

Project/Site: Steeplechase IP Site	_ City/County: Camden/Kersh	<u>1aw </u>	Sampling Date: 4-22-14
Applicant/Owner: Kershaw County	St	tate: SC S	Sampling Point: Wet A-PSS
Investigator(s): Chris Daves & Chris Handley-S&ME	_ Section, Township, Range:		
Landform (hillslope, terrace, etc.): Base of hillslope	_ Local relief (concave, convex, no	one): concave	Slope (%): <2%
Subregion (LRR or MLRA): LRR-P Lat: 34.2	2230 Long: <u>-</u> 80	0.5820	Datum: NAD83
Soil Map Unit Name: Pantego Loam (Pe)		NWI classificat	
Are climatic / hydrologic conditions on the site typical for this time of	vear? Yes V No (If	— f no, explain in Rer	
			esent? Yes V No
		plain any answers	
SUMMARY OF FINDINGS – Attach site map showing			•
Hydrophytic Vegetation Present? Yes V No	1		
Hydrophytic Vegetation Present? Hydric Soil Present? Yes No No	Is the Sampled Area		1 —
Wetland Hydrology Present?	within a Wetland?	Yes	No
Remarks:			
Data point taken within Wetland A on the northeaster	n side.		
HYDROLOGY			
Wetland Hydrology Indicators:			ors (minimum of two required)
Primary Indicators (minimum of one is required; check all that apply		Surface Soil C	` '
Surface Water (A1) Aquatic Fauna (E	· -		tated Concave Surface (B8)
High Water Table (A2) Marl Deposits (B Saturation (A3) Hydrogen Sulfide		Drainage Patte Moss Trim Line	, ,
	pheres along Living Roots (C3)		ater Table (C2)
Sediment Deposits (B2) Presence of Red		Crayfish Burro	` '
	uction in Tilled Soils (C6)		ble on Aerial Imagery (C9)
Algal Mat or Crust (B4) Thin Muck Surface	ce (C7)	Geomorphic P	osition (D2)
Iron Deposits (B5) Other (Explain in	Remarks)	Shallow Aquita	ard (D3)
Inundation Visible on Aerial Imagery (B7)		FAC-Neutral T	` '
Water-Stained Leaves (B9)		Sphagnum mo	ss (D8) (LRR T, U)
Field Observations:	,		
Surface Water Present? Yes No Depth (inche	· —		
Water rable riesent:		.dualam. Duaaant	Vec V Ne
Saturation Present? Yes V No Depth (inche (includes capillary fringe)	ss): wetland Hy	/drology Present?	? Yes No
Describe Recorded Data (stream gauge, monitoring well, aerial pho	otos, previous inspections), if availa	able:	
Domodes			
Remarks: Wetland hydrology was observed.			
, , , , , , , , , , , , , , , , , , , ,			

Sampling	Point:	Wet	A-PSS
Samuumu	FUILL.		

- 30-ft radius		Dominant		Dominance Test worksheet:
<u>Tree Stratum</u> (Plot size: <u>30-ft radius</u>) 1	% Cover	Species?	<u>Status</u>	Number of Dominant Species That Are OBL, FACW, or FAC: (A)
2.				
3				Total Number of Dominant Species Across All Strata: 7 (B)
4				Percent of Dominant Species
5				That Are OBL, FACW, or FAC: 100 (A/B)
6				Prevalence Index worksheet:
		= Total Cov		Total % Cover of: Multiply by:
50% of total cover:	20% of	total cover		OBL species x 1 =
Sapling Stratum (Plot size: 30-ft radius	30	Υ	FΔC	FACW species x 2 =
Liquidambar styraciflua				FAC species x 3 =
2				FACU species x 4 =
3				UPL species x 5 =
4				Column Totals: (A) (B)
5				
6				Prevalence Index = B/A =
15		= Total Cov	_	Hydrophytic Vegetation Indicators:
50% of total cover: 15 Shrub Stratum (Plot size: 30-ft radius)	20% of	total cover		1 - Rapid Test for Hydrophytic Vegetation
1. Liquidambar styraciflua	5	Υ	FAC	2 - Dominance Test is >50%
				3 - Prevalence Index is ≤3.0 ¹
2				Problematic Hydrophytic Vegetation ¹ (Explain)
3				
4				Indicators of hydric soil and wetland hydrology must
5				be present, unless disturbed or problematic.
6				Definitions of Five Vegetation Strata:
2.5		= Total Cov		Tree – Woody plants, excluding woody vines,
50% of total cover: 2.5	20% of	total cover	:	approximately 20 ft (6 m) or more in height and 3 in. (7.6 cm) or larger in diameter at breast height (DBH).
Herb Stratum (Plot size: 30-ft radius 1. Liquidambar styraciflua	10	Υ	FAC	(7.5 cm) of larger in diameter at breast neight (BBH).
				Sapling – Woody plants, excluding woody vines,
•		<u>Y</u>		approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.
3				
4				Shrub – Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 m) in height.
5				
6				Herb – All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, and woody
1				plants, except woody vines, less than approximately
8				3 ft (1 m) in height.
9				Woody vine - All woody vines, regardless of height.
10				
11	20			
50% after an 10		= Total Cov total cover		
50% of total cover: 10 Woody Vine Stratum (Plot size: 30-ft radius)	∠∪% of	total cover	. —	
1. Lonicera japonica	10	Υ	FAC	
2 Vitis rotundifolia	10	<u>·</u> Y	FAC	
3 Gelsemium sempervirens	5	<u>'</u>	FAC	
			1710	
4				
5	25	= Total Cov		Hydrophytic Vegetation
50% of total cover: 12.5		= Total Cov total cover		Present? Yes No No
		total cover	· 	
Remarks: (If observed, list morphological adaptations belo	w).			
Hydrophytic vegetation was observed.				

SOIL

Sampling Point: Wet A-PSS

Profile Desc	cription: (Describe	to the dep	th needed to docur	nent the	indicator	or confir	m the absence of	findicators.)
Depth	Matrix			x Feature	es	. 1		_
(inches)	Color (moist)		Color (moist)	. <u>%</u>	Type ¹	Loc ²	Texture	Remarks
1-6"	10YR 3/2	98	10YR 4/6	2	<u> </u>	<u> M</u>	<u>LS</u>	
6-12"	10YR 4/2	95	10YR 6/8	5	<u>C</u>	M	<u> </u>	
12-20"	10YR 4/2	95	10YR 6/8	5	С	M	S	
				-	_			
l ———								
						-		
¹ Type: C=C	oncentration. D=De	pletion. RM	=Reduced Matrix, M	S=Maske	d Sand G	rains.	² Location: P	L=Pore Lining, M=Matrix.
			LRRs, unless other					or Problematic Hydric Soils ³ :
Histosol			Polyvalue Be			LRR S. T.	U) 1 cm Muc	ck (A9) (LRR O)
_	pipedon (A2)		Thin Dark Su					ck (A10) (LRR S)
	stic (A3)		Loamy Muck				I f	Vertic (F18) (outside MLRA 150A,B)
Hydroge	en Sulfide (A4)		Loamy Gleye	ed Matrix	(F2)		Piedmon	t Floodplain Soils (F19) (LRR P, S, T)
ır	d Layers (A5)		Depleted Ma					us Bright Loamy Soils (F20)
	Bodies (A6) (LRR		Redox Dark	,	*			(153B)
	ıcky Mineral (A7) (L		1 I		. ,		1 1	ent Material (TF2)
	esence (A8) (LRR		Redox Depre		-8)			allow Dark Surface (TF12)
	ick (A9) (LRR P, T) d Below Dark Surfa		Marl (F10) (L		ANI DA	154)	Other (E)	xplain in Remarks)
	ark Surface (A12)	ce (ATT)	Iron-Mangan		•	,	PT) ³ Indicate	ors of hydrophytic vegetation and
	rairie Redox (A16)	MLRA 150						nd hydrology must be present,
	flucky Mineral (S1)	•	Delta Ochric	, ,	,			s disturbed or problematic.
	Sleyed Matrix (S4)		Reduced Ver				3)	·
Sandy F	Redox (S5)		Piedmont Flo	odplain (Soils (F19) (MLRA 1	49A)	
	l Matrix (S6)		Anomalous E	Bright Loa	my Soils	(F20) (ML	RA 149A, 153C, 1	53D)
	rface (S7) (LRR P,							
Restrictive	Layer (if observed):						
Depth (in	ches):						Hydric Soil Pi	resent? Yes No
Remarks: H	lydric soils were	observe	d.					

WETLAND DETERMINATION DATA FORM - Atlantic and Gulf Coastal Plain Region

Project/Site: Steeplechase IP Site	_ City/County: Cam	nden/Kershaw	Sampling Date: 4-22-14
Applicant/Owner: Kershaw County		State: SC	Sampling Point: Up A-PSS
Investigator(s): Chris Daves & Chris Handley-S&ME	_ Section, Township,	, Range:	
Landform (hillslope, terrace, etc.): Hillslope	_ Local relief (concav	ve, convex, none): CONCAVE	9 Slope (%): <2%
Subregion (LRR or MLRA): LRR-P Lat: 34.2		Long: -80.5820	Datum: NAD83
Soil Map Unit Name: Pantego Loam (Pe)			cation: PFO1A
Are climatic / hydrologic conditions on the site typical for this time of y	year? Yes	No (If no, explain in R	
		Are "Normal Circumstances"	
		(If needed, explain any answe	<u> </u>
SUMMARY OF FINDINGS – Attach site map showin			
Command of Find Mode - Attach site map showing		it locations, transects	, important reatures, etc.
Hydrophytic Vegetation Present?	Is the Samp	pled Area	<u> </u>
Hydric Soil Present? Yes No	within a We	etland? Yes	No 🗸
Wetland Hydrology Present? Yes No Remarks:			
Data point taken within upland adjacent to Wetland A	on the northeas	tern side.	
HYDROLOGY			
Wetland Hydrology Indicators:		Secondary Indica	ators (minimum of two required)
Primary Indicators (minimum of one is required; check all that apply)	Surface Soil	Cracks (B6)
Surface Water (A1) Aquatic Fauna (B	13)	Sparsely Ve	getated Concave Surface (B8)
High Water Table (A2) Marl Deposits (B1		Drainage Pa	
Saturation (A3) Hydrogen Sulfide	, ,	Moss Trim L	` ,
	heres along Living R	• • = •	Water Table (C2)
Sediment Deposits (B2)	, ,	Crayfish Bur	` '
	ction in Tilled Soils (· <u> </u>	isible on Aerial Imagery (C9)
Algal Mat or Crust (B4) Thin Muck Surfac	` '		Position (D2)
Iron Deposits (B5) Other (Explain in	Remarks)	Shallow Aqu	itard (D3)
Inundation Visible on Aerial Imagery (B7)		FAC-Neutral	, ,
Water-Stained Leaves (B9)		Sphagnum n	moss (D8) (LRR T, U)
Field Observations:			
Curiace Water Frescht: Tes No Deptir (inche			
Water Table Present? Yes No Depth (inche Saturation Present? Yes No Depth (inche		Wetland Hydrology Preser	nt? Yes No
(includes capillary fringe)			it? fes No
Describe Recorded Data (stream gauge, monitoring well, aerial pho	tos, previous inspect	ions), if available:	
Remarks:			
Wetland hydrology was not observed.			
, 3,			

- 30-ft radius		Dominant		Dominance Test worksheet:	
Tree Stratum (Plot size: 30-ft radius) 1	% Cover	Species?	<u>Status</u>	Number of Dominant Species That Are OBL, FACW, or FAC: 7 (A)	,
2.					
3.				Total Number of Dominant Species Across All Strata: (B)	`
				Species Across Air Strata.	,
4				Percent of Dominant Species That Are ORL FACW or FAC: 64	
5 6				That Are OBL, FACW, or FAC: 04 (A/	B)
0		= Total Cov		Prevalence Index worksheet:	
50% of total cover:				Total % Cover of: Multiply by:	
Sapling Stratum (Plot size: 30-ft radius	20 /0 01	total cover	·	OBL species x 1 =	
1. Liquidambar styraciflua	10	Υ	FAC	FACW species x 2 =	
- Prunus serotina	10	\overline{Y}	FACU	FAC species x 3 =	
3 Acer rubrum			FAC	FACU species x 4 =	
<u> </u>			FAC	UPL species x 5 =	
4				Column Totals: (A) (E	3)
5					
6				Prevalence Index = B/A =	
50% of total cover: 15		= Total Cov total cover	_	Hydrophytic Vegetation Indicators:	
Shrub Stratum (Plot size: 30-ft radius)	20% 01	total cover		1 - Rapid Test for Hydrophytic Vegetation	
1. Rubus cuneifolius	10	Υ	FACU	2 - Dominance Test is >50%	
	5	<u>'</u>	FAC	3 - Prevalence Index is ≤3.0 ¹	
2. Acer rubrum				Problematic Hydrophytic Vegetation ¹ (Explain)	
3. Rhus copallinum	5	<u>Y</u>	UPL		
4. Liquidambar styraciflua	5	<u>Y</u>	FAC	¹ Indicators of hydric soil and wetland hydrology must	
5				be present, unless disturbed or problematic.	
6				Definitions of Five Vegetation Strata:	
		= Total Cov		Tree – Woody plants, excluding woody vines,	
50% of total cover: <u>12.5</u>	20% of	total cover	5	approximately 20 ft (6 m) or more in height and 3 in.	
Herb Stratum (Plot size: 30-ft radius)	_		- 40	(7.6 cm) or larger in diameter at breast height (DBH).	
1.Lonicera japonica	5	<u>Y</u>	FAC_	Sapling – Woody plants, excluding woody vines,	
2. Rubus cuneifolius	<u>5</u>	<u>Y</u>	<u>FACU</u>	approximately 20 ft (6 m) or more in height and less	
3				than 3 in. (7.6 cm) DBH.	
4				Shrub – Woody plants, excluding woody vines,	
5				approximately 3 to 20 ft (1 to 6 m) in height.	
6				Herb - All herbaceous (non-woody) plants, including	J
7				herbaceous vines, regardless of size, and woody	
8				plants, except woody vines, less than approximately 3 ft (1 m) in height.	
9					
10				Woody vine – All woody vines, regardless of height.	
11.					
	10	= Total Cov	er		
50% of total cover: 5	20% of	total cover	2		
Woody Vine Stratum (Plot size: 30-ft radius)					
1. Smilax rotundifolia	5	Υ	FAC		
2 Vitis rotundifolia	5	Y	FAC		
3.					
4					
5					
···	10	= Total Cov	er	Hydrophytic Vegetation	
50% of total cover: 5		total cover		Present? Yes No No	
Remarks: (If observed, list morphological adaptations belo		.o.ui covei			
Tromains. (ii observed, list morphological adaptations belo	w.j.				
Hydrophytic vegetation was observed.					

Sampling Point: Up A-PSS

SOIL

Profile Desc	ription: (Describe to	the depth	needed to docur	nent the ir	ndicator	or confirn	n the absence	of indicators.)
Depth	Matrix			x Features				
(inches)	Color (moist)	%	Color (moist)	<u></u> %	Type ¹	Loc ²	<u>Texture</u>	<u>Remarks</u>
1-20"	10YR 4/4						<u>LS</u>	
-	-							
¹ Type: C=Co	oncentration, D=Deplet	ion, RM=Re	educed Matrix, M	S=Masked	Sand Gra	ains.		PL=Pore Lining, M=Matrix.
Hydric Soil I	ndicators: (Applicab	le to all LR	Rs, unless other	wise note	ed.)		Indicators	for Problematic Hydric Soils ³ :
Histosol	(A1)		Polyvalue Be	low Surfac	e (S8) (L	.RR S, T, L	J)1 cm M	luck (A9) (LRR O)
Histic Ep	pipedon (A2)	1	Thin Dark Sເ	rface (S9)	(LRR S,	T, U)	2 cm M	luck (A10) (LRR S)
Black Hi	stic (A3)		Loamy Muck				Reduce	ed Vertic (F18) (outside MLRA 150A,B)
Hydroge	n Sulfide (A4)		Loamy Gleye				Piedmo	ont Floodplain Soils (F19) (LRR P, S, T)
	l Layers (A5)		Depleted Ma	trix (F3)				lous Bright Loamy Soils (F20)
	Bodies (A6) (LRR P, T	r, u)	Redox Dark	Surface (F	6)			RA 153B)
	cky Mineral (A7) (LRR		Depleted Dai	k Surface	(F7)		Red Pa	arent Material (TF2)
	esence (A8) (LRR U)		Redox Depre				1 1	hallow Dark Surface (TF12)
T I	ck (A9) (LRR P, T)		Marl (F10) (L					Explain in Remarks)
	d Below Dark Surface ((A11)	Depleted Oc		MLRA 1	51)	_ ``	•
Thick Da	rk Surface (A12)		Iron-Mangan	ese Masse	s (F12) (LRR O, P,	, T) ³ Indica	ators of hydrophytic vegetation and
Coast Pr	rairie Redox (A16) (ML	.RA 150A)	Umbric Surfa	ce (F13) (I	LRR P, T	, U)	wetl	and hydrology must be present,
Sandy M	lucky Mineral (S1) (LR	R O, S)	Delta Ochric	(F17) (ML	RA 151)		unle	ess disturbed or problematic.
	leyed Matrix (S4)		Reduced Ver			0A, 150B))	
🌅 Sandy R	edox (S5)		Piedmont Flo	odplain So	oils (F19)	(MLRA 14	19A)	
1 1 1	Matrix (S6)	ſ	_				RA 149A, 153C,	, 153D)
Dark Sui	rface (S7) (LRR P, S,	T, U) -						
Restrictive I	ayer (if observed):							
Type:			_					
Depth (inc	ches):						Hydric Soil	Present? Yes No
Remarks: ப	ydric soils were n	ot oboom						
П	yand sons were n	ot observ	ea.					

WETLAND DETERMINATION DATA FORM – Atlantic and Gulf Coastal Plain Region

Project/Site: Steeplechase IP Site	_ City/County: Camde	en/Kershaw	Sampling Date: 4-25-14
Applicant/Owner: Kershaw County		State: SC	Sampling Point: Wet B
Investigator(s): Chris Daves & Chris Handley-S&ME	Section, Township, Ra	ange:	
Landform (hillslope, terrace, etc.): Base of hillslope	Local relief (concave,	convex, none): concave	Slope (%): <2%
Subregion (LRR or MLRA): LRR-P Lat: 34.			Datum: NAD83
Soil Map Unit Name: Persanti Sandy Loam (PsA)		NWI classifica	
Are climatic / hydrologic conditions on the site typical for this time of	year? Yes V No		
		"Normal Circumstances" pr	
			<u> </u>
Are Vegetation Soil or Hydrology naturally	problematic? (If ne	eeded, explain any answers	in Remarks.)
SUMMARY OF FINDINGS – Attach site map showi	ng sampling point l	locations, transects,	important features, etc.
Hydrophytic Vegetation Present? Hydric Soil Present? Wetland Hydrology Present? Remarks: Data point taken within Wetland B on the southwest	Is the Sampled within a Wetlan		_ No
HYDROLOGY		Constitution to the disease	
Wetland Hydrology Indicators: Primary Indicators (minimum of one is required; check all that app	W	Secondary Indicate Surface Soil C	ors (minimum of two required)
Surface Water (A1) Aquatic Fauna (etated Concave Surface (B8)
✓ High Water Table (A2) Marl Deposits (I	,	Drainage Patt	
Saturation (A3) Hydrogen Sulfid		Moss Trim Lin	
Water Marks (B1) Oxidized Rhizos	pheres along Living Roots	ts (C3) Dry-Season V	Vater Table (C2)
Sediment Deposits (B2) Presence of Re	luced Iron (C4)	Crayfish Burro	ows (C8)
Drift Deposits (B3)	luction in Tilled Soils (C6)) Saturation Vis	sible on Aerial Imagery (C9)
Algal Mat or Crust (B4) Thin Muck Surfa	` '	Geomorphic F	` '
Iron Deposits (B5) Other (Explain i	ı Remarks)	Shallow Aquit	` '
Inundation Visible on Aerial Imagery (B7) Water-Stained Leaves (B9)		FAC-Neutral	oss (D8) (LRR T, U)
Field Observations:		Spriagrium)35 (D0) (LKK 1, U)
Surface Water Present? Yes V No Depth (inch	_{es):} 1"		
Water Table Present? Yes V No Depth (inch	es): 0"		
Saturation Present? Yes No Depth (inch	es): 0" We	etland Hydrology Present	? Yes 🔽 No 🔙
(includes capillary fringe) Describe Recorded Data (stream gauge, monitoring well, aerial ph		s) if available:	
Describe Recorded Data (stream gauge, monitoring well, aerial pr	otos, previous inspections	s), ii avallable.	
Remarks:			
Wetland hydrology was observed.			

VEGETATION	(Five S	Strata) –	Use	scientific	names	of plants
VEGETATION	II IAE C	Jualas —	030	SCICITUIL	Halles	oi piarits.

/EGETATION (Five Strata) – Use scientific na	mes of pla	ants.		Sampling Point: Wet B
- 30-ft radius		Dominant		Dominance Test worksheet:
<u>Tree Stratum</u> (Plot size: <u>30-ft radius</u>) 1		Species?		Number of Dominant Species That Are OBL, FACW, or FAC: 4 (A)
2				Total Number of Dominant Species Across All Strata: 4 (B)
4				Percent of Dominant Species
5				That Are OBL, FACW, or FAC: $\frac{100}{100}$ (A/B)
6		= Total Cov		Prevalence Index worksheet:
50% of total cover:				Total % Cover of: Multiply by:
Sapling Stratum (Plot size: 30-ft radius)	20 70 0.	10101 00101	·	OBL species x 1 =
1.				FACW species x 2 =
2.				FAC species x 3 =
3.				FACU species x 4 =
4				UPL species x 5 =
5.				Column Totals: (A) (B)
6				Prevalence Index = B/A =
		= Total Cov		Hydrophytic Vegetation Indicators:
50% of total cover:	20% of	ftotal cover	:	1 - Rapid Test for Hydrophytic Vegetation
Shrub Stratum (Plot size: 30-ft radius)				2 - Dominance Test is >50%
1. Pinus taeda	5	<u>Y</u>	FAC_	3 - Prevalence Index is ≤3.0 ¹
2				Problematic Hydrophytic Vegetation¹ (Explain)
3				
4				¹ Indicators of hydric soil and wetland hydrology must
5				be present, unless disturbed or problematic.
6				Definitions of Five Vegetation Strata:
		= Total Co		Tree – Woody plants, excluding woody vines,
50% of total cover: <u>2.5</u>	20% of	ftotal cover	: 1	approximately 20 ft (6 m) or more in height and 3 in.
Herb Stratum (Plot size: 30-ft radius)	40	V	ODI	(7.6 cm) or larger in diameter at breast height (DBH).
1. Scirpus cyperinus	_ 10	<u>Y</u>	OBL	Sapling – Woody plants, excluding woody vines,
2. Juncus biflorus	- 5	<u>Y</u>	FAC	approximately 20 ft (6 m) or more in height and less than 3 in. (7.6 cm) DBH.
3. Cyperus strigosus	_ <u>5</u>	<u>Y</u>	FACW	
4				Shrub – Woody plants, excluding woody vines, approximately 3 to 20 ft (1 to 6 m) in height.
5				
6				Herb – All herbaceous (non-woody) plants, including herbaceous vines, regardless of size, <u>and</u> woody
7				plants, except woody vines, less than approximately
8				3 ft (1 m) in height.
9				Woody vine – All woody vines, regardless of height.
10				
11	20	= Total Co		
50% of total cover: 10				
Woody Vine Stratum (Plot size: 30-ft radius)	20% 01	total cover	. —	
1				
3.				
4				
···				Hadran badia
₩ ,	- —	= Total Cov	 /er	Hydrophytic Vegetation
50% of total cover:				Present? Yes No No

Sampling Point: Wet B

SOIL

Profile Desc	ription: (Describe	to the dept	h needed to docum	nent the	indicator	or confirm	n the absence o	f indicators.)
Depth	<u>Matrix</u>			<u> Feature</u>		. 2	- .	
(inches)	Color (moist)	<u>%</u>	Color (moist) 10YR 5/8	<u>%</u>	Type ¹	Loc ²	Texture	Remarks
1-6"	10YR 4/2	80	10YR 5/8	20	<u> C </u>	<u>M</u>	<u>L</u> -	
6-20"	10YR 5/2	50	1018 5/8	50	<u>C</u>	<u>M</u>	LC	
		- <u> </u>	_		-			_
17			Deduced Metric MC				21	N. Dana Limin a. M. Matrix
			Reduced Matrix, MS LRRs, unless other			ains.		PL=Pore Lining, M=Matrix. or Problematic Hydric Soils ³ :
Histosol		able to all	Polyvalue Bel		-	RRSTI		ick (A9) (LRR O)
_	ipedon (A2)		Thin Dark Sui					ick (A10) (LRR S)
Black Hi			Loamy Mucky				T T	d Vertic (F18) (outside MLRA 150A,B)
	n Sulfide (A4)		Loamy Gleye		(F2)			nt Floodplain Soils (F19) (LRR P, S, T)
	Layers (A5)		Depleted Mat	, ,	==,		_	ous Bright Loamy Soils (F20)
1 1 -	Bodies (A6) (LRR P cky Mineral (A7) (LI		Redox Dark S Depleted Dark					A 153B) ent Material (TF2)
	esence (A8) (LRR L		Redox Depre				1 1	allow Dark Surface (TF12)
T	ck (A9) (LRR P, T)	,	Marl (F10) (LI	,	-,			explain in Remarks)
	l Below Dark Surfac	e (A11)	Depleted Och					
	rk Surface (A12)		Iron-Mangane				•	tors of hydrophytic vegetation and
	airie Redox (A16) (I lucky Mineral (S1) (I		Umbric Surfaction Delta Ochric (, U)		nd hydrology must be present, is disturbed or problematic.
	leyed Matrix (S4)	LKK 0, 3)	Reduced Verl			OA. 150B)		is disturbed of problematic.
_	edox (S5)		Piedmont Flo		•			
	Matrix (S6)		Anomalous B	right Loa	my Soils (F20) (MLF	RA 149A, 153C, 1	153D)
	face (S7) (LRR P, \$							
_	.ayer (if observed)							
Type:	.l \ .		<u> </u>					resent? Yes No No
Depth (inc	·						Hydric Soil P	resent? Yes No No
Remarks: H	ydric soils were	observed	d.					

WETLAND DETERMINATION DATA FORM – Atlantic and Gulf Coastal Plain Region

Project/Site: Steeplechase IP Site	_ City/County: Camden/Ke	ershaw	Sampling Date: 4-25-14
Applicant/Owner: Kershaw County		State: SC	Sampling Point: Up B
Investigator(s): Chris Daves & Chris Handley-S&ME	Section, Township, Range:		
Landform (hillslope, terrace, etc.): Hillslope	_ Local relief (concave, conve	x, none): concave	Slope (%): <2%
Subregion (LRR or MLRA): LRR-P Lat: 34.3	2180 Long:	-80.5860	Datum: NAD83
Soil Map Unit Name: Persanti Sandy Loam (PsA)		NWI classific	
Are climatic / hydrologic conditions on the site typical for this time of	year? Yes 🗸 No	(If no, explain in Re	emarks.)
		nal Circumstances" p	resent? Yes V No
		I, explain any answer	
SUMMARY OF FINDINGS – Attach site map showing	·		•
Hydrophytic Vegetation Present? Yes V	Is the Sampled Area	1	
Hydric Soil Present? Yes No	within a Wetland?	Yes	No 🗸
Wetland Hydrology Present? Yes No			
Remarks: Data point taken in upland adjacent to Wetland B on	the southwestern side		
Bata point taken in apiana adjacent to violana B on	the southwestern side.		
HYDROLOGY			
Wetland Hydrology Indicators:		Secondary Indica	tors (minimum of two required)
Primary Indicators (minimum of one is required; check all that apply	y)	Surface Soil	Cracks (B6)
Surface Water (A1) Aquatic Fauna (B	,		getated Concave Surface (B8)
High Water Table (A2) Marl Deposits (B		Drainage Pat	, ,
Saturation (A3) Hydrogen Sulfide	` ,	Moss Trim Li	` ,
Water Marks (B1) Sediment Deposits (B2) Presence of Red	pheres along Living Roots (C3)	Crayfish Burr	Water Table (C2)
	uction in Tilled Soils (C6)		sible on Aerial Imagery (C9)
Algal Mat or Crust (B4) Thin Muck Surfa	, ,	Geomorphic	
Iron Deposits (B5) Other (Explain in	, ,	Shallow Aqui	
Inundation Visible on Aerial Imagery (B7)		FAC-Neutral	Test (D5)
Water-Stained Leaves (B9)		Sphagnum m	noss (D8) (LRR T, U)
Field Observations:			
Surface Water Present? Yes No Depth (inch			
Water Table Present? Yes No Depth (inch			
Saturation Present? Yes No Depth (inchi	es): Wetland	l Hydrology Presen	t? Yes No
Describe Recorded Data (stream gauge, monitoring well, aerial ph	otos, previous inspections), if a	vailable:	
Remarks:			
Wetland hydrology was not observed.			
, , , , , , , , , , , , , , , , , , , ,			

VEGETATION ((Five Strata)	 Use scientific 	names of plants.
VECEIAIION	i ive Olialaj	— 03C 30ICHIIIIC	names of plants.

% Cover	Dominant Species?	Status	Dominance Test worksheet: Number of Dominant Species That Are OBL, FACW, or FAC: Total Number of Dominant Species Across All Strata: 2	(A)
			That Are OBL, FACW, or FAC: 2 Total Number of Dominant 2	(A)
			')	
			')	
				(B)
:			Percent of Dominant Species	
:	 = Total Cov		That Are OBL, FACW, or FAC: 100	(A/B)
	= Total Cov			
20% of		er	Prevalence Index worksheet:	
	total cover:		Total % Cover of: Multiply by:	_
			OBL species x 1 =	
			FACW species x 2 =	
			FAC species x 3 =	
			Column Totals: (A)	_ (B)
			Provolonos Indox - P/A -	
	= Total Cov	 er		_
20 70 01	10141 00101			
10	Υ	FAC	1 	
			Problematic Hydrophytic Vegetation (Explai	n)
				nust
			· · · ·	
10			Definitions of Five Vegetation Strata:	
		_	Tree – Woody plants, excluding woody vines,	
20% of	total cover:			
5	V	FΔC	(7.5 GH) Of larger in diameter at breast neight (b	D11).
			1 '' '	ess
			approximately 5 to 20 it (1 to 6 iii) iii height.	
			3 ft (1 m) in height.	,
			Woody vine. All woody vines regardless of he	aht
			vvoody ville – All woody villes, regardless of fler	giit.
5 :	= Total Cov	er		
20% of	total cover:	1		
			Lhidranhidia	
	= Total Cov	 er		
			Present? Yes No No	
	total cover.			
	20% of 10	= Total Cov 20% of total cover: 10	= Total Cover = Total Cover 20% of total cover: 10	FACU species x 4 =

rofile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.) Matthic Remarks Remarks	SOIL								Sampling Point: Up B
Color (moist)		cription: (Describe	to the dep	oth needed to docu	ment the	indicator	or confir	m the absence	<u> </u>
3" 10YR 4/2 100 SL 3-20" 10YR 5/3 70 10YR 5/8 30 C M LC	Depth						1 - 2	T	D
Type: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. C				Color (moist)		_ Type	Loc=		Remarks
ype: C=Concentration, D=Depletion, RM=Reduced Matrix, MS=Masked Sand Grains. ydric Soll Indicators: (Applicable to all LRRs, unless otherwise noted.) Histosol (A1) Histosol (A2) Black Histic (A3) Corganic Bodies (A6) (LRR P, T, U) Depleted Bolow Surface (S9) (LRR S, T, U) Loamy Mucky Mineral (F1) (LRR O) Muck Presence (A8) (LRR P, T, U) Depleted Below Dark Surface (F7) Redox Dark Surface (F7) Redox Depressions (F8) Mark (F10) (LRR U) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Gleyed Matrix (S6) Dark Surface (F13) (MLRA 150B) Sandy Redox (S5) Stripped Matrix (S6) Dark Surface (F10) (MLRA 150B) Peldmont Floodplain Soils (F20) (MLRA 149A) Anomalous Bright Loamy Soils (F20) Westland hydrology must be present, unless disturbed or problematic. Redox Or R Surface (F10) (MLRA 149A) Sandy Redox (S5) Stripped Matrix (S6) Dark Surface (F17) (MLRA 149A) Anomalous Bright Loamy Soils (F20) (MLRA 149A) Anomalous Bright Loamy Soils (F20) (MLRA 149A) Fredman Tievablain in Remarks) Peldman Tievablain in Remarks Pick Mark 150B, 153D) Peldman Tievablain in Remarks Pick Mark 150B, 153D)				10VP 5/8					
ydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.) Histosol (A1) Histosol (A2) Histosol (A2) Histosol (A2) Black Histic Epipedon (A2) Hydric Soil Fini Dark Surface (S9) (LRR S, T, U) Hydric Soil Present? Yes Polyvalue Below Surface (S8) (LRR S, T, U) Histosol (A2) Thin Dark Surface (S9) (LRR S, T, U) Loamy Mucky Mineral (F1) (LRR O) Loamy Mucky Mineral (F1) (LRR O) Loamy Gleyed Matrix (F2) Depleted Matrix (F3) Organic Bodies (A6) (LRR P, T, U) 5 cm Mucky Mineral (A7) (LRR P, T, U) Depleted Dark Surface (F6) Muck Presence (A8) (LRR U) Thick Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR P, S, T, U) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes I cm Muck (A9) (LRR O) 1 cm Muck (A9) (LRR O, P) Redox Dark Surface (F7) Mari (F10) (LRR O, P, T) Depleted Dark Surface (F11) (MLRA 151) Iron-Manganese Masses (F12) (LRR O, P, T) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR O, S) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes No	3-20"	10YR 5/3	_ 70	10110 3/0	_ 30		<u> M</u>	<u>LC</u>	
ydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.) Histosol (A1) Histosol (A2) Histosol (A2) Histosol (A2) Black Histic Epipedon (A2) Hydric Soil Fini Dark Surface (S9) (LRR S, T, U) Hydric Soil Present? Yes Polyvalue Below Surface (S8) (LRR S, T, U) Histosol (A2) Thin Dark Surface (S9) (LRR S, T, U) Loamy Mucky Mineral (F1) (LRR O) Loamy Mucky Mineral (F1) (LRR O) Loamy Gleyed Matrix (F2) Depleted Matrix (F3) Organic Bodies (A6) (LRR P, T, U) 5 cm Mucky Mineral (A7) (LRR P, T, U) Depleted Dark Surface (F6) Muck Presence (A8) (LRR U) Thick Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR P, S, T, U) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes I cm Muck (A9) (LRR O) 1 cm Muck (A9) (LRR O, P) Redox Dark Surface (F7) Mari (F10) (LRR O, P, T) Depleted Dark Surface (F11) (MLRA 151) Iron-Manganese Masses (F12) (LRR O, P, T) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR O, S) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes No									
ydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.) Histosol (A1) Histosol (A2) Histosol (A2) Histosol (A2) Black Histic Epipedon (A2) Hydric Soil Fini Dark Surface (S9) (LRR S, T, U) Hydric Soil Present? Yes Polyvalue Below Surface (S8) (LRR S, T, U) Histosol (A2) Thin Dark Surface (S9) (LRR S, T, U) Loamy Mucky Mineral (F1) (LRR O) Loamy Mucky Mineral (F1) (LRR O) Loamy Gleyed Matrix (F2) Depleted Matrix (F3) Organic Bodies (A6) (LRR P, T, U) 5 cm Mucky Mineral (A7) (LRR P, T, U) Depleted Dark Surface (F6) Muck Presence (A8) (LRR U) Thick Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR P, S, T, U) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes I cm Muck (A9) (LRR O) 1 cm Muck (A9) (LRR O, P) Redox Dark Surface (F7) Mari (F10) (LRR O, P, T) Depleted Dark Surface (F11) (MLRA 151) Iron-Manganese Masses (F12) (LRR O, P, T) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR O, S) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes No						_			
ydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.) Histosol (A1) Histosol (A2) Histosol (A2) Histosol (A2) Black Histic Epipedon (A2) Hydric Soil Fini Dark Surface (S9) (LRR S, T, U) Hydric Soil Present? Yes Polyvalue Below Surface (S8) (LRR S, T, U) Histosol (A2) Thin Dark Surface (S9) (LRR S, T, U) Loamy Mucky Mineral (F1) (LRR O) Loamy Mucky Mineral (F1) (LRR O) Loamy Gleyed Matrix (F2) Depleted Matrix (F3) Organic Bodies (A6) (LRR P, T, U) 5 cm Mucky Mineral (A7) (LRR P, T, U) Depleted Dark Surface (F6) Muck Presence (A8) (LRR U) Thick Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR P, S, T, U) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes I cm Muck (A9) (LRR O) 1 cm Muck (A9) (LRR O, P) Redox Dark Surface (F7) Mari (F10) (LRR O, P, T) Depleted Dark Surface (F11) (MLRA 151) Iron-Manganese Masses (F12) (LRR O, P, T) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Dark Surface (S7) (LRR O, S) Sandy Redox (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes No	Type: C=C	encentration D=Da	nlotion PM		S-Mooko	- Cond Cr	· ·	² l continu	DI - Doro Lining M-Motriy
Histosol (A1) Histic Epipedon (A2) Black Histic (A3) Hydrogen Sulfide (A4) Stratified Layers (A5) Organic Bodies (A6) (LRR P, T, U) Muck Presence (A8) (LRR P, T, U) Depleted Dark Surface (F7) Muck (A9) (LRR P, T) Depleted Below Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Medox (S5) Sandy Redox (S5) Dark Surface (S7) (LRR P, S, T, U) Depth (inches): Depth (inches): Depth (inches): Depth (Inches): Hydric Soil Present? Yes No Reduced Vertic (A9) (LRR O, P) Depted Matrix (F2) Depted Matrix (F2) Priedmont Floodplain Soils (F19) (LRR O, P) Priedmont Floodplain Soils (F20) Reduced Vertic (F18) (outside MLRA 150A, E Priedmont Floodplain Soils (F20) Reduced Vertic (F18) (outside MLRA 150A, E Reduced Vertic (F18) (MLRA 0, I Reduced Vertic (F18) (MLRA 150A, I Reduced Vertic (F18) (MLRA 151B, I Reduced Vertic (F18) (MLRA 151B, I Reduced Vertic (F18) (MLRA 151B, I Reduced Vertic (F18) (MLRA 150A, I50B, I Reduced Vertic (F18) (MLRA 149A, I53C, I53D) No Very Shallow Dark Surface (TF12) Very Shallow Dark Su							ams.		
Black Histic (A3) Hydrogen Sulfide (A4) Stratified Layers (A5) Organic Bodies (A6) (LRR P, T, U) Som Mucky Mineral (A7) (LRR P, T, U) Depleted Dark Surface (F6) It m Muck (A9) (LRR P, T) Depleted Below Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Sandy Redox (S5) Stripped Matrix (S6) Dark Surface (S7) (LRR P, S, T, U) Stripped Matrix (S6) Dark Surface (S7) (LRR P, S, T, U) Stripped (inches): Depleted Dark Surface (F7) Mark (F10) (LRR U) Depleted Dark Surface (F7) Mark (F10) (LRR U) Depleted Dark Surface (F7) Mark (F10) (LRR U) Depleted Ochric (F11) (MLRA 151) Iron-Manganese Masses (F12) (LRR O, P, T) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Redox (S5) Sandy Redox (S5) Stripped Matrix (S6) Dark Surface (S7) (LRR P, S, T, U) Sestrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes No	_						LRR S, T,		
Hydrogen Sulfide (A4) Stratified Layers (A5) Organic Bodies (A6) (LRR P, T, U) 5 cm Mucky Mineral (A7) (LRR P, T, U) Depleted Dark Surface (F6) Muck Presence (A8) (LRR U) 1 cm Muck (A9) (LRR P, T) Depleted Below Dark Surface (A11) Thick Dark Surface (A12) Coast Prairie Redox (A16) (MLRA 150A) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Gleyed Matrix (S4) Sandy Redox (S5) Stripped Matrix (S6) Depleted Matrix (F2) Depleted Matrix (F3) Redox Dark Surface (F6) Mard (F10) (LRR U) Depleted Dark Surface (F7) Redox Depressions (F8) Marl (F10) (LRR U) Depleted Ochric (F11) (MLRA 151) Iron-Manganese Masses (F12) (LRR O, P, T) Sandy Mucky Mineral (S1) (LRR O, S) Sandy Gleyed Matrix (S4) Sandy Redox (S5) Stripped Matrix (S6) Dark Surface (S7) (LRR P, S, T, U) estrictive Layer (if observed): Type: Depth (inches): Hydric Soil Present? Yes No	_ ,	, ,		1 1 -		. , .		· 🖂	, , ,
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Appendix C

Previous USACE JD Letter SAC 2001-34608-5JK, dated May 29, 2009



DEPARTMENT OF THE ARMY

CHARLESTON DISTRICT, CORPS OF ENGINEERS 69A Hagood Avenue CHARLESTON, SOUTH CAROLINA 29403-5107

May 29, 2009

Regulatory Division

Allen W. Conger MACTEC Engineering and Consulting, Inc. 720 Gracern Road, Suite 132 Columbia, South Carolina 29210

SUBJECT: SAC-2001-34608-5JK, Kershaw County

Dear Mr. Conger:

This is in response to your letter of September 5, 2008, requesting a wetland determination, on behalf of Mr. Nelson Lindsay, Kershaw County Economic Development, for a 458 acre tract located south of and adjoining to Black River Road, S-28-12, north of Interstate 20, and east of U.S. Highway 521, Kershaw County, South Carolina. The project area is depicted on the survey plat you submitted which was prepared by J. Henry Walker, III, S.C. P.L.S. No. 14532, dated May 29, 1996, and entitled "Wetland Survey Prepared for Kershaw County of Wetlands on Gravel Hill Site".

This plat depicts surveyed boundaries of wetlands or other waters of the United States as established by your office. You have requested that this office verify the accuracy of this mapping as a true representation of wetlands or other waters of the United States within the regulatory authority of this office. The property in question contains 108.063 acres of federally defined jurisdictional freshwater wetlands or other waters of the United States subject to the jurisdiction of this office. The location and configuration of these areas are reflected on the plat referenced above.

Based on an on-site inspection and a review of aerial photography and soil survey information, it has been determined that the surveyed jurisdictional boundaries shown on the referenced plat are an accurate representation of jurisdictional areas within our regulatory authority. This office should be contacted prior to performing any work in these areas. Enclosed is a form describing the basis of jurisdiction for the areas in question. You should also be aware that these areas may be subject to restrictions or requirements of other state or local governmental entities.

If a permit application is forthcoming as a result of this delineation, a copy of this letter, as well as the verified survey plat, should be submitted as part of the application. Otherwise, a delay could occur in confirming that a delineation was performed for the permit project area.

Please be advised that this determination is valid for five (5) years from the date of this letter unless new information warrants revision of the delineation before the expiration date. All actions concerning this determination must be complete within this time frame, or an additional delineation must be conducted. This **approved** jurisdictional determination is an appealable action under the Corps of Engineers administrative appeal procedures defined at 33 CFR 331. The

administrative appeal options, process and appeals request form is attached for your convenience and use.

In future correspondence concerning this matter, please refer to SAC-2001-34608-5JK. You may still need state or local assent. Prior to performing any work, you should contact the South Carolina Department of Health and Environmental Control, Bureau of Water. A copy of this letter is being forwarded to them for their information.

If you have any questions concerning this matter, please contact Leslie L. Parker at 803-253-3444.

Respectfully,

Brice McKoy

Chief, Northwest Branch

Enclosures:

Basis for Jurisdiction Notification of Appeal Options

Copy Furnished:

Mr. Chuck Hightower
South Carolina Department of
Health and Environmental Control
Bureau of Water
2600 Bull Street
Columbia, South Carolina 29201