

**SWINE COMPREHENSIVE NUTRIENT MANAGEMENT PLAN**  
GA CNMP Generator, Version 06.4, Updated 10/01/2007

Farm Name: Innovative Swine Farm  
Owner: Agriment Sludge Solutions, LLC  
Address: P.O. Box 1096 Beulaville, NC 28518

Telephone No: 910-289-0395  
Fax: 252-568-2750  
E-mail: agrimentservices@yahoo.com

Farm Physical Address: 3023 Highway 41 South  
Cordele, Georgia 31015

"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted, is to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

Owner/Operator

Agriment Sludge Solutions LLC by Ronnie Kennedy <sup>ROR</sup>  
[Signature] date 6/18/18

Certified Planner

GA Dept. of Agriculture #

[Signature] date 6/18/18  
TSP-03-23971 NMP-600

Certified Planner Contact

phone 910-289-0395 e-mail agrimentservices@yahoo.com

Review:

GA Dept. of Agriculture \_\_\_\_\_ date \_\_\_\_\_

Approval:

GA Dept. Nat. Res. EPD \_\_\_\_\_ date \_\_\_\_\_

**Farm Information****Site Location:**

The farm is located south of Cordele on Highway 41, about 2.2 miles south of the Highway 300 intersection. The Innovative Farm sign is on the east side of the road.

**Farm Description:**

This farm is a 4,800 Animal Swine Farrowing-Weanling that generates 15,374,400 gallons of waste per year. This production facility has waste storage capacities of approximately 180 days. This Swine Farm is a shallow pit and flush combination system. The waste is flushed in an Anaerobic Lagoon System.

Estimated Pounds of Plant Available Nitrogen Generated per year

Broadcast: 18,475

Incorporated: 22,170

Injected: 22,170

Irrigated: 18,475

**YEAR 1**

Max. Available PAN: 18,475 lbs

Actual PAN Applied: 19,037 lbs

PAN Surplus/Deficit: -562 lbs

Actual Volume Applied: 15,841,576 gallons

Volume Surplus/Deficit: -467,179 gallons

Do animals have direct access to surface water while in confinement? No.

Coordinates of Largest Building or Lagoon:

Latitude 31°53'28.43"N Longitude 83°45'3.60"W

**Map Attached:**

Site Location Map: Yes.

Soils Map: Yes.

Topographic Map: Yes.

Farm Map: Yes.

## **Waste Handling Systems on the Farm**

### **System1: Anaerobic Lagoon - 1 Cell**

1. Liner description: No engineered liner, built according to NRCS recommendations.
2. Size: The anaerobic lagoon is an earthen structure, built in 1980. The lagoon was designed by SCS (now NRCS) and they supervised the construction. It is approximately 480 feet by 310 feet and is about 14 feet deep, or approximately 3.4 acres in area. The total lagoon volume is 1,795,226 cubic feet
3. This system is designed to hold a 25yr/24hr storm event.
4. Capacity: a. Total to maximum fill height (ft<sup>3</sup>): 1,456,213  
b. Pumpable (Storage) (ft<sup>3</sup>): 338,951
5. Total storage time: 180 days
6. All surface water diverted.
7. Leakage (prevention and inspection): All berms/diversions inspected for leaks, proper vegetative over, tree growth, and rodent damage at least monthly.
8. Operating Levels (liquid systems) :  
Maximum liquid level (ft below overflow): 1.6  
Stop pumping level (ft below overflow): 3.9  
  
A gauge is present in the lagoon.
9. Solid separation: None

Note2: The lagoon will be maintained at a level not less than 1.6 feet below the lowest point in the dam. This is one foot of freeboard plus .6 feet for the storage of a 25 year/ 24 hour storm. The stop pump level is 3.9 feet below the lowest point in the dam.

**Manure nutrient generation calculation**

See Nutrient Management Plan For Animal Waste Utilization

## **Land application**

### **Land application methods:**

#### **Method 1: Big Gun Irrigation**

1. There are 1 systems of this type.
2. Description: Irrigation reel is a Reel Rain with SR150 Big Gun located on the cart.

#### **Method 2: Liquid tanker**

1. There are 1 systems of this type.
2. Description: Manure tanker is a Houle 6300 gallon spreader.

**Field application:**

See Nutrient Management Plan For Animal Waste Utilization

**Land Application Summary:**

See Nutrient Management Plan For Animal Waste Utilization

**Off Farm Application**

No Off Farm application.



### Emergency Action Plan

***As part of this plan, the following is made available and each employee is trained and aware of the following procedures. All that apply are checked:***

Y	Emergency Phone Number List Posted at Each Phone (required)
Y	General Farm Information Sheet and Facility Map
N	Location of Pre-Arranged Emergency Supply Equipment and Supplies
Y	Runoff Retention Plan (required)
Y	Fire Emergency Information and Response Plan
N	Power Outage Information
N	Information and Medical Emergency Response Procedures

### General Emergency Action Plan

Farm name and phone number:	Innovative Swine Farm 910-289-0395
Exact location/address:	3023 Highway 41 South Cordele, Georgia 31015
Directions to the farm:	The farm is located south of Cordele on Highway 41, about 2.2 miles south of the Highway 300 intersection. The Innovative Farm sign is on the east side of the road.

### Fire Emergency Response Information

Farm Fire Protection District	Crisp County
911 Coordinates for farm	3023 Hwy 41 South
Is there a disconnect between the meter base and the buildings?	Yes
If so, where?	There is a transfer switch and disconnect located behind the existing generator, which is on the east side of the 2nd farrowing barn.
Size of Electrical Service	2-200 amp service
Do you have a standby alternator?	Yes
Give the location (sketch preferable) of electrical panels in buildings	See attachment General Farm Map
Location and size of propane tanks	See attachment General Farm Map
Other fuels and locations	See attachment General Farm Map
Are there hazardous materials stored in facilities	No
If yes, provide the location(s) and list of materials	

### Known medical conditions for EMS personnel:

Name	Condition(s)

## Emergency Phone List and Manure Spill Procedure

### In Case Of Manure Spill:

1) Shut off all flow in to storage areas, lagoons, or land application areas.

2) Contact Farm Supervisors:

	Name	Phone
Primary contact (Owner/Operator):	Ronnie Kennedy	252-568-2648
Second contact:	Dempsey Smith	252-775-1201

3) Contact Emergency or Assistance Agencies:

General Emergency Response: 911

Spill Reporting: 1-800-241-4113

	Name	Phone
Local fire department:	Crisp. Co. Fire Dept.	229-276-2660
Local police department:	Crisp. Co. Sheriff's Office	229-276-2600
Local EPD:	Southwest District (Albany)	229-430-4144
Local health department:	Crisp Co. Health Dept.	229-276-2680
Pumping assistance:	Ronnie Kennedy	910-289-0395
Local NRCS office:	Crisp Co. USDA Service Center	229-273-4148
Extension office:	Crisp Co. Extension Service	229-276-2612
Additional help:		
Gas company:	Ferrell Gas	229-273-1624
Power company:	Crisp Co. Power	229-273-3820
Additional emergency response procedures:		
All employees are made aware of the emergency response procedures.		

Be prepared to provide the following information during emergency:

- *Your name.*
- *Description of Emergency.*
- *Estimated amounts of spill, area covered, distance traveled from storage area.*
- *Whether manure has reached ditches, waterways, streams or crossed property lines.*
- *Any obvious damage: employee injury, fish kill, or property damage.*
- *What is being done and what assistance is needed.*

4) Contain spill, prevent further movement.

5) Begin clean-up and complete report documents and procedures.

### Mortality management

Typical annual mortality rates(animals/yr)				
Estimate description	4800			
Disposal practice methods (%)				
Burial/Pit	Composting	Incineration	Rendering	Other
		100%		
Catastrophic mortality plan	Animals during catastrophic event would be buried in accordance with G.D.A. Rules.			
Dept. Agriculture Permit Number				

### Closure Plan

When the lagoon is no longer needed, we plan to close it down by removing pipes that empty into the lagoon, removing as much waste as possible, and either converting it to a pond or restoring the ground to its approximate original shape. The waste will be applied on agricultural land at agronomic rates in a manner that will not allow runoff into streams or neighboring property. All exposed earth will be revegetated to prevent erosion.

Appendix A

**Records kept on farm**

**Yields** (Records of actual crop yields harvested from fields where manure is applied)

**Soil tests** (Copies of all soil test results from fields where manure is applied)

**Manure analysis** (Copies of all manure analyses)

**Water quality monitoring** (if required by permit – required for all NPDES permits for liquid manure systems and for some LAS permits when designated by EPD)

**Land application** (records of each application event)

**Off-farm shipment records**

**Inspection checklists** (for lagoons/manure storage structures/diversions)  
(Weekly if NPDES permit, monthly otherwise)

**Equipment calibration and maintenance**

(Records of **Annual calibration for all application equipment** and any maintenance event that might affect the performance of application equipment, i.e. replacement of nozzles, rebuilding of pumps)

**Any changes made to Nutrient Management Plan**

(Including Field nutrient budget sheets, changes in application equipment, number of animals)

**Daily Rainfall Records**

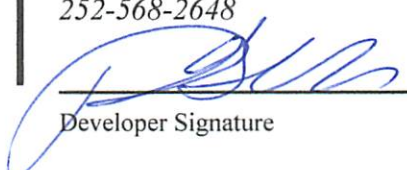
**Nutrient Management Plan For Animal Waste Utilization**  
**03-22-2018**

**This plan has been prepared for:**

*Innovative Swine Farm  
Agriment Sludge Solutions, LLC  
P.O. Box 1096  
Beulaville, NC 28518  
(910) 289-0395*

**This plan has been developed by:**

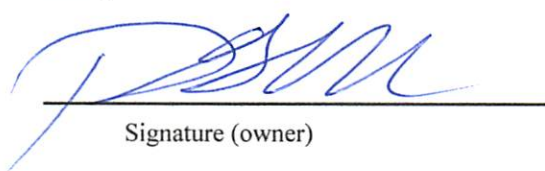
*Ronnie G. Kennedy Jr.  
Agriment Services, Inc.  
PO Box 1096  
Beulaville, NC 28518  
252-568-2648*

  
Developer Signature

**Type of Plan: Nitrogen Only with Manure Only**

**Owner/Manager/Producer Agreement**

I (we) understand and agree to the specifications and the operation and maintenance procedures established in this nutrient management plan which includes an animal waste utilization plan for the farm named above. I have read and understand the Required Specifications concerning animal waste management that are included with this plan.

  
Signature (owner)


3-22-18  
Date

\_\_\_\_\_  
Signature (manager or producer)

\_\_\_\_\_  
Date

**This plan meets the minimum standards and specifications of the U.S. Department of Agriculture - Natural Resources Conservation Service or the standard of practices adopted by the Soil and Water Conservation Commission.**

**Plan Approved By:**

  
Technical Specialist Signature

3-22-18  
Date

**Nutrients applied in accordance with this plan will be supplied from the following source(s):**

Commercial Fertilizer is not included in this plan.

S9	Swine Farrowing-Weanling Lagoon Liquid waste generated 15,374,400 gals/year by a 4,800 animal Swine Farrowing-Weanling Lagoon Liquid operation. This production facility has waste storage capacities of approximately 180 days.				
Estimated Pounds of Plant Available Nitrogen Generated per Year					
Broadcast	18475				
Incorporated	22170				
Injected	22170				
Irrigated	18475				
	Max. Avail. PAN (lbs)*	Actual PAN Applied (lbs)	PAN Surplus/ Deficit (lbs)	Actual Volume Applied (Gallons)	Volume Surplus/ Deficit (Gallons)
Year 1	18,475	19037	-562	15,841,579	-467,179

Note: In source ID, S means standard source, U means user defined source.

\* Max. Available PAN is calculated on the basis of the actual application method(s) identified in the plan for this source

The table shown below provides a summary of the crops or rotations included in this plan for each field. Realistic Yield estimates are also provided for each crop in the plan. In addition, the Leaching Index for each field is shown, where available.

### Planned Crops Summary

Tract	Field	Total Acres	Useable Acres	Leaching Index (LI)	Soil Series	Crop Sequence	RYE
612	UN10HW	4.94	4.94	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN12HW	14.15	14.15	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN3	13.21	12.82	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN3HW	1.51	1.51	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN5	2.19	1.81	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN5HW	1.68	1.68	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN6HW	1.20	1.20	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN7	6.39	5.11	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN7HW	1.41	1.41	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN8	6.81	5.44	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN8HW	1.20	1.20	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN9	2.67	2.47	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons
612	UN9HW	0.65	0.65	N/A	Cowarts	Small Grain Overseed	1.0 Tons
						Hybrid Bermudagrass Hay	5.5 Tons

PLAN TOTALS: 58.01 54.39

## Narrative

3-15-2018

See attached crop sheet for Hybrid Bermuda Hay for Nitrogen Rate. 300 lb rate average came from recommendations of 200 - 400 lbs per acre.

Fields UN3,5,7,8,&9 are wettable acres only and will be applied with Big Gun Irrigation. See attached acreage calculation for the breakdown of each irrigation pull. Fields UN3,5,7,8,&9 HW area will be applied with Liquid Tanker. This is acreage is the remaining areas that can't be wet with Big Gun Irrigation.

Fields UN6,UN10,&UN12 HW area will be applied with Liquid Tanker Only.

This plan uses soil series of Cowarts for all fields because Esto soil series wasn't a option in the waste program. Therefore see the following for the correct soil series:

UN3,5,8,9,10,&12 are all Esto Sandy Loam Soils 2 to 5%

UN6&7 are both Cowarts Loamy Sand 5 to 8%

**\*\*\*ALTHOUGH THIS NUTRIENT MANAGEMENT PLAN HAS YEAR 1 ABOVE THE WASTE UTILIZATION TABLES IT IS TO BE USED CONTINUOUSLY FOR WASTE APPLICATION UNTIL A NEW PLAN TAKES ITS PLACE.\*\*\***



<i>LI</i>	<i>Potential Leaching</i>	<i>Technical Guidance</i>
< 2	Low potential to contribute to soluble nutrient leaching below the root zone.	None
>= 2 & <= 10	Moderate potential to contribute to soluble nutrient leaching below the root zone.	Nutrient Management (590) should be planned.
> 10	High potential to contribute to soluble nutrient leaching below the root zone.	Nutrient Management (590) should be planned. Other conservation practices that improve the soils available water holding capacity and improve nutrient use efficiency should be considered. Examples are Cover Crops (340) to scavenge nutrients, Sod-Based Rotations (328), Long-Term No-Till (778), and edge-of-field practices such as Filter Strips (393) and Riparian Forest Buffers (391).

The Waste Utilization table shown below summarizes the waste utilization plan for this operation. This plan provides an estimate of the number of acres of cropland needed to use the nutrients being produced. The plan requires consideration of the realistic yields of the crops to be grown, their nutrient requirements, and proper timing of applications to maximize nutrient uptake.

This table provides an estimate of the amount of nitrogen required by the crop being grown and an estimate of the nitrogen amount being supplied by manure or other by-products, commercial fertilizer and residual from previous crops. An estimate of the quantity of solid and liquid waste that will be applied on each field in order to supply the indicated quantity of nitrogen from each source is also included. A balance of the total manure produced and the total manure applied is included in the table to ensure that the plan adequately provides for the utilization of the manure generated by the operation.

**Waste Utilization Table**

**Year 1**

Tract	Field	Source ID	Soil Series	Total Acres	Use. Acres	Crop	RYE	Applic. Period	Nitrogen PA Nutrient Req'd (lbs/A)	Comm. Fert. Nutrient Applied (lbs/A)	Res. (lbs/A)	Applic. Method	Manure PA Nutrient Applied (lbs/A)	Liquid Manure Applied (acre)	Solid Manure Applied (acre)	Liquid Manure Applied (Field)	Solid Manure Applied (Field)
									N	N	N		N	1000 gal/A	Tons	1000 gals	tons
612	UN10HW	S9	Cowarts	4.94	4.94	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	205.55	0.00
612	UN10HW	S9	Cowarts	4.94	4.94	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	1,233.27	0.00
612	UN12HW	S9	Cowarts	14.15	14.15	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	588.76	0.00
612	UN12HW	S9	Cowarts	14.15	14.15	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	3,532.56	0.00
612	UN3	S9	Cowarts	13.21	12.82	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Irrig.	50	41.61	0.00	533.42	0.00
612	UN3	S9	Cowarts	13.21	12.82	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Irrig.	300	249.65	0.00	3,200.52	0.00
612	UN3HW	S9	Cowarts	1.51	1.51	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	62.83	0.00
612	UN3HW	S9	Cowarts	1.51	1.51	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	376.97	0.00
612	UN5	S9	Cowarts	2.19	1.81	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Irrig.	50	41.61	0.00	75.31	0.00
612	UN5	S9	Cowarts	2.19	1.81	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Irrig.	300	249.65	0.00	451.87	0.00
612	UN5HW	S9	Cowarts	1.68	1.68	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	69.90	0.00
612	UN5HW	S9	Cowarts	1.68	1.68	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	419.41	0.00
612	UN6HW	S9	Cowarts	1.20	1.20	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	49.93	0.00
612	UN6HW	S9	Cowarts	1.20	1.20	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	299.58	0.00
612	UN7	S9	Cowarts	6.39	5.11	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Irrig.	50	41.61	0.00	212.62	0.00
612	UN7	S9	Cowarts	6.39	5.11	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Irrig.	300	249.65	0.00	1,275.72	0.00

**Waste Utilization Table**
**Year 1**

Tract	Field	Source ID	Soil Series	Total Acres	Use. Acres	Crop	RYE	Applic. Period	Nitrogen PA Nutrient Req'd (lbs/A)	Comm. Fert. Nutrient Applied (lbs/A)	Res. (lbs/A)	Applic. Method	Manure PA Nutrient Applied (lbs/A)	Liquid Manure Applied (acre)	Solid Manure Applied (acre)	Liquid Manure Applied (Field)	Solid Manure Applied (Field)
									N	N	N		N	1000 gal/A	Tons	1000 gals	tons
612	UN7HW	S9	Cowarts	1.41	1.41	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	58.67	0.00
612	UN7HW	S9	Cowarts	1.41	1.41	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	352.01	0.00
612	UN8	S9	Cowarts	6.81	5.44	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Irrig.	50	41.61	0.00	226.35	0.00
612	UN8	S9	Cowarts	6.81	5.44	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Irrig.	300	249.65	0.00	1,358.10	0.00
612	UN8HW	S9	Cowarts	1.20	1.20	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	49.93	0.00
612	UN8HW	S9	Cowarts	1.20	1.20	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	299.58	0.00
612	UN9	S9	Cowarts	2.67	2.47	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Irrig.	50	41.61	0.00	102.77	0.00
612	UN9	S9	Cowarts	2.67	2.47	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Irrig.	300	249.65	0.00	616.64	0.00
612	UN9HW	S9	Cowarts	0.65	0.65	Small Grain Overseed	1.0 Tons	10/1-3/31	50	0	0	Broad.	50	41.61	0.00	27.05	0.00
612	UN9HW	S9	Cowarts	0.65	0.65	Hybrid Bermudagrass Hay	5.5 Tons	3/1-9/30	*300	0	0	Broad.	300	249.65	0.00	162.27	0.00
Total Applied, 1000 gallons																15,841.58	
Total Produced, 1000 gallons																15,374.40	
Balance, 1000 gallons																-467.18	
Total Applied, tons																	0.00
Total Produced, tons																	0.00
Balance, tons																	0.00

Notes: 1. In the tract column, ~ symbol means leased, otherwise, owned. 2. Symbol \* means user entered data.

The Irrigation Application Factors for each field in this plan are shown in the following table. Infiltration rate varies with soils. If applying waste nutrients through an irrigation system, you must apply at a rate that will not result in runoff. This table provides the maximum application rate per hour that may be applied to each field selected to receive wastewater. It also lists the maximum application amount that each field may receive in any one application event.

#### Irrigation Application Factors

Tract	Field	Soil Series	Application Rate (inches/hour)	Application Amount (inches)
612	UN3	Cowarts	0.40	1.0
612	UN5	Cowarts	0.40	1.0
612	UN7	Cowarts	0.40	1.0
612	UN8	Cowarts	0.40	1.0
612	UN9	Cowarts	0.40	1.0

The following Lagoon Sludge Nitrogen Utilization table provides an estimate of the number of acres needed for sludge utilization for the indicated accumulation period. These estimates are based on average nitrogen concentrations for each source, the number of animals in the facility and the plant available nitrogen application rates shown in the second column.

Lagoon sludge contains nutrients and organic matter remaining after treatment and application of the effluent. At clean out, this material must be utilized for crop production and applied at agronomic rates. In most cases, the priority nutrient is nitrogen but other nutrients including phosphorous, copper and zinc can also be limiting. Since nutrient levels are generally very high, application of sludge must be carefully applied.

Sites must first be evaluated for their suitability for sludge application. Ideally, effluent spray fields should not be used for sludge application. If this is not possible, care should be taken not to load effluent application fields with high amounts of copper and zinc so that additional effluent cannot be applied. On sites vulnerable to surface water moving to streams and lakes, phosphorous is a concern. Soils containing very high phosphorous levels may also be a concern.

**Lagoon Sludge Nitrogen Utilization Table**

Crop	Maximum PA-N Rate lb/ac	Maximum Sludge Application Rate 1000 gal/ac	Minimum Acres 5 Years Accumulation	Minimum Acres 10 Years Accumulation	Minimum Acres 15 Years Accumulation
<b>Swine Farrowing-Weanling Lagoon Sludge - Standard</b>					
Corn 120 bu	150	14.69	127.45	254.89	382.34
Hay 6 ton R.Y.E.	300	29.38	63.72	127.45	191.17
Soybean 40 bu	160	15.67	119.48	238.96	358.44

The Available Waste Storage Capacity table provides an estimate of the number of days of storage capacity available at the end of each month of the plan. Available storage capacity is calculated as the design storage capacity in days minus the number of days of net storage volume accumulated. The start date is a value entered by the user and is defined as the date prior to applying nutrients to the first crop in the plan at which storage volume in the lagoon or holding pond is equal to zero.

Available storage capacity should be greater than or equal to zero and less than or equal to the design storage capacity of the facility. If the available storage capacity is greater than the design storage capacity, this indicates that the plan calls for the application of nutrients that have not yet accumulated. If available storage capacity is negative, the estimated volume of accumulated waste exceeds the design storage volume of the structure. Either of these situations indicates that the planned application interval in the waste utilization plan is inconsistent with the structure's temporary storage capacity.

#### Available Waste Storage Capacity

Source Name	Swine Farrowing-Weanling Lagoon Liquid		Design Storage Capacity (Days)
Start Date	9/1		180
Plan Year	Month	Available Storage Capacity (Days) *	
1	1	63	
1	2	46	
1	3	55	
1	4	73	
1	5	90	
1	6	124	
1	7	141	
1	8	158	
1	9	160	
1	10	137	
1	11	118	
1	12	95	

\* Available Storage Capacity is calculated as of the end of each month.

**\*\*\*ALTHOUGH THIS NUTRIENT MANAGEMENT PLAN HAS YEAR 1 ABOVE THE WASTE UTILIZATION TABLES IT IS TO BE USED CONTINUOUSLY FOR WASTE APPLICATION UNTIL A NEW PLAN TAKES ITS PLACE.\*\*\***

## **Required Specifications For Animal Waste Management**

- 1. Animal waste shall not reach surface waters of the state by runoff, drift, manmade conveyances, direct application, or direct discharge during operation or land application. Any discharge of waste that reaches surface water is prohibited.**
- 2. There must be documentation in the design folder that the producer either owns or has an agreement for use of adequate land on which to properly apply the waste. If the producer does not own adequate land to properly dispose of the waste, he/she shall provide evidence of an agreement with a landowner, who is within a reasonable proximity, allowing him/her the use of the land for waste application. It is the responsibility of the owner of the waste production facility to secure an update of the Nutrient Management Plan when there is a change in the operation, increase in the number of animals, method of application, receiving crop type, or available land.**
- 3. Animal waste shall be applied to meet, but not exceed, the nitrogen needs for realistic crop yields based upon soil type, available moisture, historical data, climatic conditions, and level of management, unless there are regulations that restrict the rate of applications for other nutrients.**
- 4. Animal waste shall be applied to land eroding less than 5 tons per acre per year. Waste may be applied to land eroding at more than 5 tons per acre per year but less than 10 tons per acre per year provided grass filter strips are installed where runoff leaves the field (see USDA, NRCS Field Office Technical Guide Standard 393 -Filter Strips).**
- 5. Odors can be reduced by injecting the waste or by disking after waste application. Waste should not be applied when there is danger of drift from the land application field.**
- 6. When animal waste is to be applied on acres subject to flooding, waste will be soil incorporated on conventionally tilled cropland. When waste is applied to conservation tilled crops or grassland, the waste may be broadcast provided the application does not occur during a season prone to flooding (see "Weather and Climate in Georgia" for guidance).**

- 7. Liquid waste shall be applied at rates not to exceed the soil infiltration rate such that runoff does not occur offsite or to surface waters and in a method which does not cause drift from the site during application. No ponding should occur in order to control odor and flies.**
- 8. Animal waste shall not be applied to saturated soils, during rainfall events, or when the soil surface is frozen.**
- 9. Animal waste shall be applied on actively growing crops in such a manner that the crop is not covered with waste to a depth that would inhibit growth. The potential for salt damage from animal waste should also be considered.**
- 10. Nutrients from waste shall not be applied in fall or winter for spring planted crops on soils with a high potential for leaching. Waste/nutrient loading rates on these soils should be held to a minimum and a suitable winter cover crop planted to take up released nutrients. Waste shall not be applied more than 30 days prior to planting of the crop or forages breaking dormancy.**
- 11. Animal waste shall not be applied closer than 100 feet to wells.**
- 12. Animal waste shall not be applied closer than 200 feet of dwellings other than those owned by the landowner.**
- 13. Waste shall be applied in a manner not to reach other property and public right-of-ways.**
- 14. Animal waste shall not be discharged into surface waters, drainage ways, or wetlands by a discharge or by over-spraying. Animal waste may be applied to prior converted cropland provided the fields have been approved as a land application site by a "technical specialist". Animal waste shall not be applied on grassed waterways that discharge directly into water courses, and on other grassed waterways, waste shall be applied at agronomic rates in a manner that causes no runoff or drift from the site.**
- 15. Domestic and industrial waste from wash down facilities, showers, toilets, sinks, etc., shall not be discharged into the animal waste management system.**



- 16. A protective cover of appropriate vegetation will be established on all disturbed areas (lagoon embankments, berms, pipe runs, etc.). Areas shall be fenced, as necessary, to protect the vegetation. Vegetation such as trees, shrubs, and other woody species, etc., are limited to areas where considered appropriate. Lagoon areas should be kept mowed and accessible. Berms and structures should be inspected regularly for evidence of erosion, leakage, or discharge.**
- 17. If animal production at the facility is to be suspended or terminated, the owner is responsible for obtaining and implementing a "closure plan" which will eliminate the possibility of an illegal discharge, pollution, and erosion.**
- 18. Waste handling structures, piping, pumps, reels, etc., should be inspected on a regular basis to prevent breakdowns, leaks, and spills. A regular maintenance checklist should be kept on site.**
- 19. Animal waste can be used in a rotation that includes vegetables and other crops for direct human consumption. However, if animal waste is used on crops for direct human consumption, it should only be applied pre-plant with no further applications of animal waste during the crop season.**
- 20. Highly visible markers shall be installed to mark the top and bottom elevations of the temporary storage (pumping volume) of all waste treatment lagoons. Pumping shall be managed to maintain the liquid level between the markers. A marker will be required to mark the maximum storage volume for waste storage ponds.**
- 21. Waste shall be tested within 60 days of utilization and soil shall be tested at least annually at crop sites where waste products are applied. Nitrogen shall be the rate-determining nutrient, unless other restrictions require waste to be applied based on other nutrients, resulting in a lower application rate than a nitrogen based rate. Zinc and copper levels in the soils shall be monitored and alternative crop sites shall be used when these metals approach excessive levels. pH shall be adjusted and maintained for optimum crop production. Soil and waste analysis records shall be kept for a minimum of five years. Poultry dry waste application records shall be maintained for a minimum of three years. Waste application records for all other waste shall be maintained for five(5) years.**

**22. Dead animals will be disposed of in a manner that meets Georgia regulations.**

## Crop Notes

The following crop note applies to field(s): UN10HW, UN12HW, UN3, UN3HW, UN5, UN5HW, UN6HW, UN7, UN7HW, UN8, UN8HW, UN9, UN9HW  
Bermudagrass Coastal Plain, Mineral Soil, Poorly Drained to Somewhat Poorly Drained.

Adaptation: Effective artificial drainage MUST be in place to achieve Realistic Yield Expectations provided for these soils.

In the Coastal Plain, hybrid bermudagrass sprigs can be planted Mar. 1 to Mar. 31. Cover sprigs 1" to 3" deep (1.5" optimal). Sprigs should be planted quickly after digging and not allowed to dry in sun and wind. For Coastal and Tifton 78 plant at least 10 bu/ac in 3' rows, spaced 2' to 3' in the row. Generally a rate of 30 bu/ac is satisfactory to produce full groundcover in one or two years under good growing conditions. Tifton 44 spreads slowly, so use at least 40 bu/ac in 1.5' to 2' rows spaced 1' to 1.5' in row. For broadcast/disked-in sprigs use about 60 bu/ac. Soil test for the amounts of lime, phosphorus, potassium and micronutrients to apply preplant and for annual maintenance. Apply 60 to 100 lb/ac N in the establishment year in split applications in April and July. For established stands apply 180 to 240 lb/ac N annually in split applications, usually in April and following the first and second hay cuts. Reduce N rates by 25% for grazing. Refer to NCSU Technical Bulletin 305 Production and Utilization of Pastures and Forages in North Carolina for more information or consult your regional agronomist or extension agent for assistance.

The following crop note applies to field(s): UN10HW, UN12HW, UN3, UN3HW, UN5, UN5HW, UN6HW, UN7, UN7HW, UN8, UN8HW, UN9, UN9HW  
Small Grain: CP, Mineral Soil, low-leachable

In the Coastal Plain, oats and barley should be planted from October 15-October 30; and rye from October 15-November 20. For barley, plant 22 seed/drill row foot and increase the seeding rate by 5% for each week seeding is delayed beyond the optimum time. See the seeding rates table for applicable seeding rate modifications in the current NCSU "Small Grain Production Guide". Also, increase the initial seeding rate by at least 10% when planting no-till. Oats should be planted at 2 bushels/acre and rye at 1-1 1/2 bushels/acre. Plant all these small grains at 1-1 1/2" deep. Adequate depth control is essential. Review the NCSU Official Variety "green book" and information from private companies to select a high yielding variety with the characteristics needed for your area and conditions. Apply no more than 30 lbs/acre N at planting. Phosphorus and potash recommended by a soil test can also be applied at this time. The remaining N should be applied during the months of February-March.



United States Department of Agriculture

Natural Resources Conservation Service  
1468 Carpenter Road, South  
Room C 101  
Tifton Ga. 31793

DELIVERY CONFIRMATION REQUESTED

Agriment Sludge Solutions LLC  
P O Box 1096  
Beulaville NC 28518-1096

7-21-17

Dear Mr. Kennedy

This is to notify you that the Natural Resources Conservation Service (NRCS) made a **Preliminary Highly Erodible Land and/or Wetland Determination** on the tract(s) and field(s) listed below as was requested by you with an AD-1026 form. The determination for the area requested has been labeled on the enclosed map and CPA-026E and is only for Food Security Act purposes. A copy of your determination has been included in this correspondence for your review. The comments section below gives specific information regarding the determination made on your land. If you have any questions or concerns regarding this determination as it has been documented, please do not hesitate to contact me for discussion.

Tract(s) and Field(s): T612 UN1,2,3,4,5,6,7,8,9,10,11,12

Date of Request: 7-13-17

Activity/Purpose of request: Determination

Date of Determination: 7-21-17

Comments:

Fields that have been labeled NHEL (Not Highly Erodible Land) can be cropped without any special requirements.

Areas labeled NW (Non-Wetland) are areas that do not contain wetlands as defined by the Food Security Act. Land clearing, including stump removal, is acceptable in this area.

Areas labeled W (Wetland) meet the definition of wetland and typically have not been manipulated by altering hydrology and/or removing woody vegetation including stumps. Trees may be cut in these areas but stumps CANNOT be removed and production of an agricultural commodity CANNOT be made possible or it may result in non-compliance and potential loss of USDA benefits.

IF YOU DISAGREE with the NRCS determination, you can exercise appeal rights within the next 30 days. There are two ways you may appeal the NRCS Preliminary HELC/WC Determination:

1. **Request a field visit** - NRCS will meet you at the site to review the data we gathered to make our determination. This field visit will be your opportunity to ask questions about the specifics of your determination. The NRCS will allow you to provide any additional technical information to our findings, and will consider if it provides a basis for NRCS to change its preliminary determination. If the information gathered from the field review does not change the technical determination from being adverse, I must forward the determination and the case record materials pertaining to this determination to the State Conservationist for further review. The State Conservationist will review the determination to ensure that the facts included in the record support the determination and that the determination is in conformance with the regulation. The State Conservationist will then issue the Final Technical Determination and provide you with additional appeal rights.
2. **Request mediation** - Mediation is a process in which a trained, impartial person helps us look at mutual concerns, consider options, and determine if we can agree on a solution. The mediator has no decision making authority, but may be able to help us reach a mutually agreeable decision.

This NRCS determination will be considered **Final** in 30 days. Once the determination becomes a **Final HELC/WC Determination** it can be appealed to the Farm Service Agency (FSA) County Committee or the National Appeals Division (NAD). If you wish to appeal immediately to the County Committee or NAD, you may request **Immediate Finality** by sending the State Conservationist a letter explaining that you want the status of the determination to be changed to "Final" in less than 30 days. If you want to exercise this right, the NRCS must have your request in writing in less than 30 days from the date of this letter. You may submit that request to:

*Helping People Help the Land*

An Equal Opportunity Provider and Employer



United States Department  
of Agriculture

Natural Resources  
Conservation Service

NRCS-CPA-026e  
9/2012

## HIGHLY ERODIBLE LAND AND WETLAND CONSERVATION DETERMINATION

Name	Agriment Sludge Solutions LLC	Request 7-13-17	County: Crisp
Address:	P O Box 1096 Beulaville NC 28518-1096	Date:	
Agency or Person Requesting Determination:	Producer	Tract No: 612	FSA Farm <sup>924</sup> No.:

### Section I - Highly Erodible Land

Is a soil survey now available for making a highly erodible land determination?	Yes
Are there highly erodible soil map units on this farm?	Yes

Fields in this section have undergone a determination of whether they are highly erodible land (HEL) or not; fields for which an HEL Determination has not been completed are not listed. In order to be eligible for USDA benefits, a person must be using an approved conservation system on all HEL.

Field(s)	HEL(Y/N)	Sodbust (Y/N)	Acres	Determination Date
UN1	No	No	.2	7-21-17
UN2	No	No	.6	7-21-17
UN3	No	No	14.9	7-21-17
UN4	No	No	20.6	7-21-17
UN5	No	No	2.4	7-21-17

The Highly Erodible Land determination was completed in the Office

### Section II - Wetlands

Fields in this section have had wetland determinations completed. See the Definition of Wetland Label Codes for additional information regarding allowable activities under the wetland conservation provisions of the Food Security Act and/or when wetland determinations are necessary to determine USDA program eligibility.

Field(s)	Wetland Label*	Occurrence Year (CW)	Acres	Determination Date	Certification Date
UN1	NW		.2	7-21-17	
UN2	W		.6	7-21-17	
UN3	NW		14.9	7-21-17	
UN4	W		20.6	7-21-17	
UN5	NW		2.4	7-21-17	

The wetland determination was completed in the Office It was Mailed to the person on

Remarks:

See supplemental page for remarks.

I certify that the above determinations are correct and were conducted in accordance with policies and procedures contained in the National Food Security Act Manual.

Signature Designated Conservationist	Date
britt shane parker Digitally signed by britt shane parker Date: 2017.07.21 13:14:53 -04'00'	7-21-17

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, gender, religion, age, disability, political beliefs, sexual orientation, and marital or family status. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at 202-720-2600 (voice and TDD). To file a complaint of discrimination, write USDA, Assistant Secretary for Civil Rights, 1400 Independence Avenue, S.W., Stop 9410, Washington, DC 20250-9410, or call toll-free at (866) 632-9992 (English) or (800) 877-8339 (TDD) or (866) 377-8642 (English Federal-relay) or (800) 845-6136 (Spanish Federal-relay). USDA is an equal opportunity provider, employer, and lender.



## CPA-026e Supplemental Worksheet

### Section I - Highly Erodible Land

<u>Field(s)</u>	<u>HEL(Y/N)</u>	<u>Sodbust(Y/N)</u>	<u>Acres</u>	<u>Determination Date</u>
UN6	No	No	1.8	7-21-17
UN7	No	No	7.6	7-21-17
UN8	No	No	6.5	7-21-17
UN9	No	No	2.5	7-21-17
UN10	No	No	5.1	7-21-17
UN11	No	No	.1	7-21-17
UN12	No	No	21.6	7-21-17

### Section II - Wetlands

<u>Field(s)</u>	<u>Wetland Label*</u>	<u>Occurrence Year (CW)**</u>	<u>Acres</u>	<u>Preliminary Determination Date</u>	<u>Final Certification Date</u>
UN6	NW		1.8	7-21-17	
UN7	NW		7.6	7-21-17	
UN8	NW		6.5	7-21-17	
UN9	NW		2.5	7-21-17	
UN10	NW		5.1	7-21-17	
UN11	W		.1	7-21-17	
UN12	NW		21.6	7-21-17	

Remarks:

Only the requested area was evaluated. The determination for the requested area supersedes any prior determination for the designated area only. Refer to the previous determination on file for information on the rest of the tract.

This delineation/determination has been conducted for the purpose of implementing the wetland conservation provisions of the Food Security Act of 1985. This determination/delineation may not be valid for identifying the extent of the USACE's CWA jurisdiction of this site. If you intend to conduct any activity that constitutes a discharge of dredge or fill material into wetland or other waters, you should request a jurisdictional determination from the local office of the USACE prior to starting work.

In addition, the participant is responsible for ensuring compliance with all other federal, state, and local laws before commencing any land-disturbing or habitat-disturbing activity, such as those regarding threatened and endangered species, protection of cultural resources, and/or water quality issues (non-exempt stream buffer requirements).

**Terrence Rudolph**  
State Conservationist, USDA, NRCS 355  
East Hancock Ave, Mail Stop 200  
Athens, Georgia 30601

If you wish to appeal the Final HELC/WC Determination, it must be filed within 30 Days of the determination becoming final. There are two ways you may appeal the NRCS Final Determination:

1. **Appeal to the County FSA Committee** - To have an appeal hearing with the FSA County Committee, you must send the Committee a written request including a brief statement explaining specifically why you believe the NRCS determination is incorrect within 30 days. The Committee can uphold the final technical determination, or request a review by the NRCS State Conservationist. You may contact the FSA the following address:

**Crisp County FSA Committee**  
County Executive Director  
110 13th Ave W Suite A  
Cordele Ga 31015  
229-273-4148

2. **Appeal to the National Appeals Division (NAD)** - To have an appeal hearing with NAD, you must send their regional office a written request for appeal including a brief statement explaining specifically why you believe the NRCS determination is incorrect within 30 days. You may contact the NAD regional office at the following address:

**USDA National Appeals Division**  
Southern Regional Office  
Post Office Box 1508  
Cordele, Tennessee 38088  
Telephone: 1-800-552-5377 TTY: 1-800-627-8332 Fax: (901) 544-0363

The NRCS determination only indicates whether or not the activity you proposed will affect your eligibility for USDA program benefits. This determination applies only to the requested areas delineated on the attached map. More information regarding determinations on the rest of tract may be found on the previous determination on file in the local NRCS office. If you plan to alter any areas without an existing, valid determination on file, you must request NRCS to perform another determination for those areas by filing an updated AD-1026 with the Farm Service Agency.

The 2014 Farm Bill connected producer eligibility for Federal crop insurance premium subsidy to compliance with the HEL provisions who are currently not in compliance with the HEL provisions have 2 retroactive years to develop and comply with an NRCS-approved conservation plan to remain eligible for Federal crop insurance premium subsidy. Producers who are subject to HEL compliance for the first time due to the 2014 Farm Bill have 5 retroactive years to develop and comply with an NRCS-approved conservation plan when producing an agricultural commodity on HEL. If you are unsure about your status as a previous USDA participant, please inquire at your local Farm Service Agency office. The 2014 Farm Bill connected producer eligibility for Federal crop insurance premium subsidy to compliance with the wetland conservation provisions. Eligibility for most USDA programs is lost for any wetland conversions that have occurred after December 23, 1985. However, only wetland conversions that occur after February 7, 2014, result in ineligibility for Federal crop insurance premium subsidy.

Wetland determinations by NRCS are for Food Security Act purposes only and do not identify the U.S. Army Corps of Engineers' jurisdiction. If you will conduct any activity that constitutes a discharge or fill material into wetlands or other waters, you must obtain a separate determination from the Corps of Engineers before starting the work. If needed, please contact me and I will provide you with copies of your wetland determination to provide to the Corps. It is your responsibility to ensure your activity meets the regulatory requirements of other agencies. The NRCS wetland determination is not a permit to install, modify, or alter wetlands and does not limit any endorsement of the activity by NRCS. You may contact your local U.S. Army Corps of Engineers' office at the following location and phone number: Savannah, GA; Phone: 800-448-2402

If you need guidance or technical assistance regarding any conservation practices or programs, please contact your local NRCS office for assistance. If you have any questions or concerns regarding this determination, please contact me directly.

Office phone: 478-783-1391 ext. 3  
Email: britt.parker@ga.usda.gov

Sincerely,

**britt shane**  
State partner  
Digitally signed by britt  
Date: 2017.07.21 13:06:31  
+0700

Designated Conservationist for HELC/WC Compliance

Enclosures:  
Wetland Determination Map  
Form CPA-026E

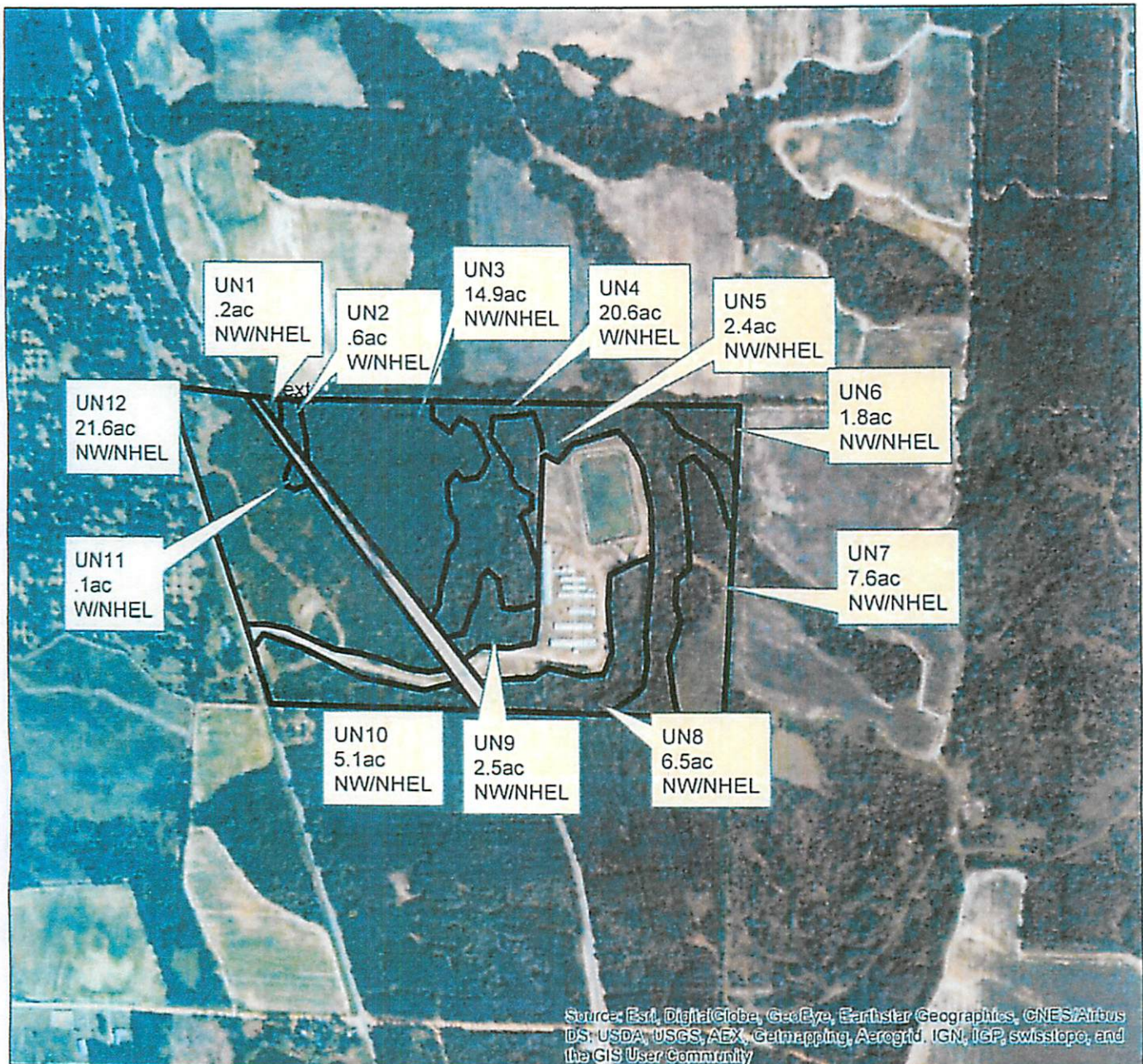
## \*DEFINITIONS OF WETLAND LABELS

AW	<b>Artificial Wetland:</b> An area that was formerly a non-wetland area under natural conditions but now exhibits wetland characteristics because of the influence of human activities. These areas are exempt from the Food Security Act of 1985, as amended. This label includes irrigation induced wetlands.
CC	<b>Commenced Conversion:</b> A wetland, farmed wetland, farmed wetland pasture, or converted wetland on which the conversion began but was not completed before December 23, 1985, was approved by FSA to continue, and the conversion was completed by January 1, 1995.
CPD	<b>COE Permit with Mitigation:</b> A converted wetland authorized by a permit issued under Section 404 of the Clean Water Act. Production of agricultural commodities is allowed subject to conditions of the permit.
CMW	<b>Categorical Minimal Effect:</b> A wetland that meets specific categories of conversion activities that have been determined by NRCS to have minimal effect, individually and cumulatively, on the functions and values of the wetland and the wetlands in the watershed.
CW	<b>Converted Wetland:</b> A wetland converted between December 23, 1985, and November 28, 1990. Production of an agricultural commodity or additional manipulation of these areas will yield USDA benefit ineligibility. Also, these areas are wetlands converted after December 23, 1985, by a county, drainage district, or similar entity. For these instances, production of an agricultural commodity or forage for mechanical harvest or additional manipulation will cause ineligibility for USDA program benefits.
CW+year	<b>Converted Wetland + (year the conversion occurred):</b> A wetland converted after November 28, 1990, where the USDA program participant is ineligible for benefits until the wetland is restored or mitigated unless an exemption applies.
CWNA	<b>Converted Wetland Non-Agricultural Use:</b> A wetland converted after November 28, 1990, to a use other than agricultural commodity production. Label not used for certified wetland determinations completed after 2/2008.
CWTE	<b>Converted Wetland Technical Error:</b> A wetland converted or commenced after December 23, 1985, based on an incorrect NRCS determination. This label does not apply to obvious wetlands as defined in the National Food Security Act Manual.
FW	<b>Farmed Wetland:</b> A wetland that was manipulated and planted before December 23, 1985, but still meets inundation or saturation criteria. These areas may be farmed and maintained as documented before December 23, 1985, as long as they are not abandoned (i.e., management or maintenance for commodity production ceased for 5 consecutive years).
FWP	<b>Farmed Wetland Pasture or Hayland:</b> A wetland that is used for pasture or haying, was manipulated and planted before December 23, 1985, but still meets the inundation or saturation criteria. These areas may be farmed and maintained as documented before December 23, 1985, as long as they are not abandoned (i.e., management or maintenance for commodity production ceased for 5 consecutive years).
MIW	<b>Mitigation Exemption:</b> A converted wetland, farmed wetland or farmed wetland pasture of which the acreage, functions and values lost have been compensated for through an NRCS-approved mitigation plan.
MW	<b>Minimal Effect Exemption:</b> A converted wetland that is exempt from the wetland conservation provisions of the Food Security Act of 1985, as amended, based on an NRCS determination that the conversion has or will have a minimal effect, individually and cumulatively, on the functions and values of the wetland and the wetlands in the watershed.
MWM	<b>Mitigation Site:</b> The site of wetland restoration, enhancement, or creation serving as mitigation for the mitigation exemption (MIW) site.
NI	<b>Not Inventoried:</b> An area where no wetland determination has been conducted. Label not used for certified wetland determinations completed after 2/2008.
NW	<b>Non-Wetland:</b> An area that does not contain a wetland. Also includes wetlands converted before December 23, 1985, but a commodity crop was not produced and the area does not meet wetland criteria (not been abandoned).
PC	<b>Prior-Converted Cropland:</b> A wetland converted to cropland before December 23, 1985, and as of December 23, 1985, was capable of being cropped and did not meet farmed wetland hydrology criteria. These areas are not subject to the wetland conservation provisions of the Food Security Act of 1985, as amended, unless further drainage manipulation affects adjacent wetlands.
PC/NW	<b>Prior Converted Cropland/Non-Wetland:</b> An area that contains both PC and NW.
TP	<b>Third-Party Exemption:</b> A wetland converted after December 23, 1985, by a third party who is not associated with the participant, and the conversion is not a result of a scheme or device. A third party does not include predecessors in interest on the tract, drainage districts, or other local government entities.
W	<b>Wetland:</b> An area meeting wetland criteria that was not converted after December 23, 1985. These areas include farmed wetlands and farmed wetland pasture that have been abandoned.
WX	<b>Manipulated Wetlands:</b> A wetland manipulated after December 23, 1985, but the manipulation was not for the purpose of making production possible and production was not made possible. These areas include wetlands manipulated by drainage maintenance agreements.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all of its programs and services on the basis of race, color, national origin, age, disability, and where applicable, sex, marital status, familial status, personal status, religion, sexual orientation, political beliefs, genetic information, reprisal, or because all or part of an individual's income is derived from any public assistance program (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at (202) 720-2600 (voice and TDD). To file a complaint of discrimination, write to USDA, Assistant Secretary for Civil Rights, Office of the Assistant Secretary for Civil Rights, 1400 Independence Avenue, S.W., Stop 9410, Washington, DC 20250-9410, or call toll-free at (866) 632-9992 (English) or (866) 677-8339 (TDD) or (866) 377-8642 (English Federal-relay) or (800) 845-6136 (Spanish Federal-relay). USDA is an equal opportunity provider, employer, and lender.



Agency: USDA-NRCS



Prepared with assistance from USDA-Natural Resources Conservation Service



480 0 480 960 1,440 1,920 Feet



3/7/2018

Innovative Swine													
Acreage Calculations													
			Width	Length	Lane	Lane	Acres	Start End	Start End	Stop End	Stop End	Section	Total
Field #	Pull #	Section	(ft.)	(ft.)	Spacing	Spacing %	(midsection)	Table	(ac.)	Table	(ac.)	Pull Acres	Pull Acres
UN3	1	100%	300	538	210	70%	3.15	EE70-B	0.740	EE70-C	0.000	3.89	4.54
		50%	300	119	210	70%	0.35	N/A	0.000	EE70-G*50%	0.300	0.65	
	2	50%	300	45	210	70%	0.11	EI70-B*50%	0.330	N/A	0.000	0.44	3.78
		100%	300	570	210	70%	2.75	EI70-B/2	0.330	EI70-G*50%	0.260	3.34	
	3	50%	300	45	210	70%	0.11	EI70-B*50%	0.330	N/A	0.000	0.44	2.49
		100%	300	358	210	70%	1.73	EI70-B/2	0.330	N/A	0.000	2.06	
	4	50%	300	45	210	70%	0.11	EI70-B*50%	0.330	N/A	0.000	0.44	1.54
		100%	300	160	210	70%	0.77	EI70-B*50%	0.330	N/A	0.000	1.10	
	5	50%	300	35	210	70%	0.10	EE70-B*50%	0.370	N/A	0.000	0.47	0.47
	6	50%	300	90	Single	N/A	0.28	E90+B*50%	0.330	N/A	0.000	0.61	2.47
UN9		100%	300	247	Single	N/A	1.53	E90+B*50%	0.330	N/A	0.000	1.86	
UN8	7	65%	300	554	Single	N/A	2.23	E90+B*65%	0.429	E90+G*50%	0.275	2.94	2.94
	8	68%	300	421	Single	N/A	1.77	E90+B*68%	0.449	E90+G*50%	0.275	2.50	2.50
UN7	9	65%	300	618	Single	N/A	2.49	E90+B*65%	0.429	E90+G*50%	0.275	3.19	3.19
	10	50%	300	425	Single	N/A	1.32	E90+B*50%	0.330	E90+G*50%	0.275	1.92	1.92
UN5	11	65%	300	275	Single	N/A	1.11	E90+B*65%	0.429	E90+G*50%	0.275	1.81	1.81
Total Pull Acres:												27.65	

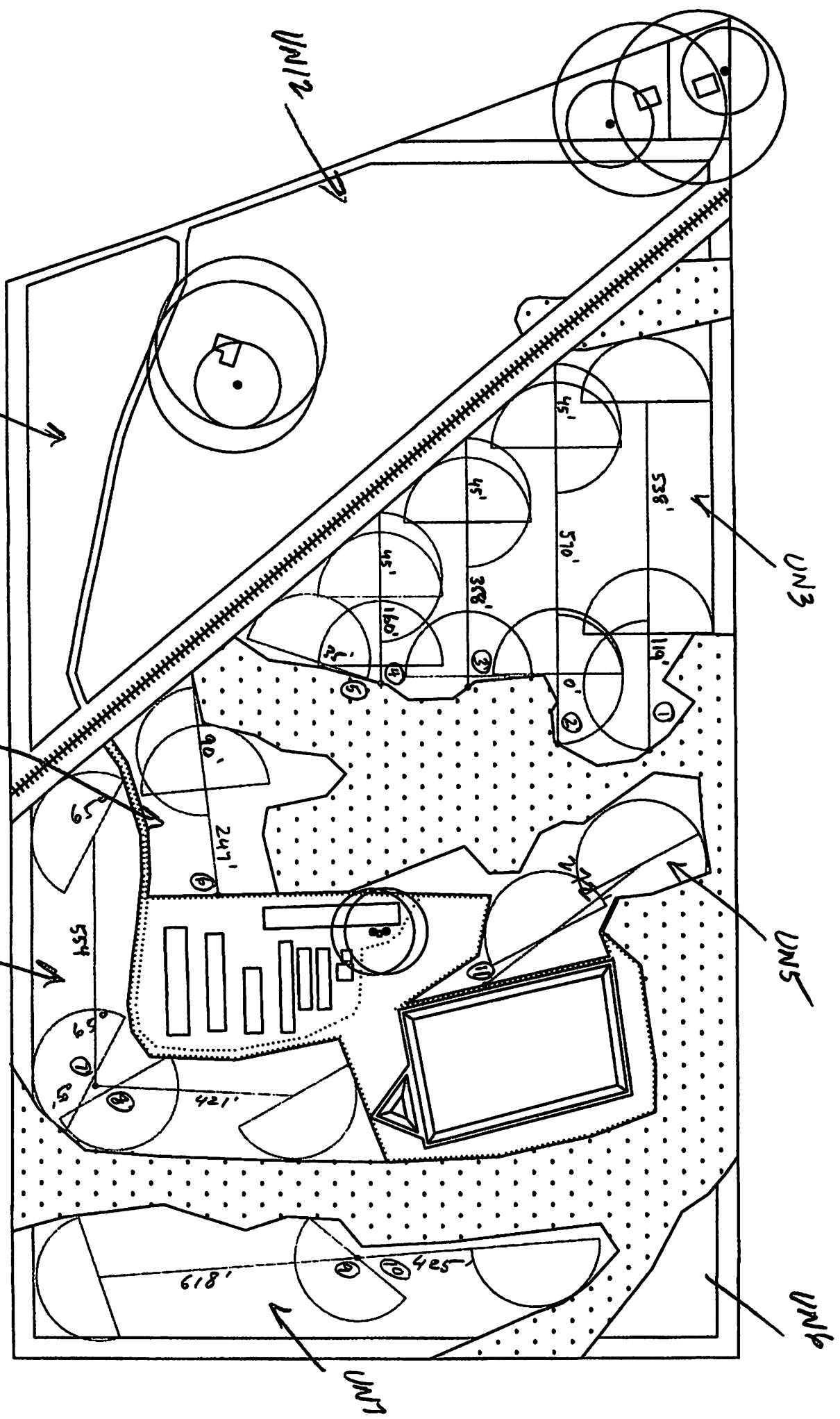
Hand-drawn site map showing a proposed development area. The map includes several units and their associated buffers:

- Unit 12 (UN12):** 14,15 sq. ft. with buffers. 200' Buffer.
- Unit 3 (UN3):** 14,71 sq. ft. (Hw 15 sq. ft.). 100' Buffer.
- Unit 9 (UN9):** 3,065 sq. ft. (Hw 1,065 sq. ft.). 50' Buffer.
- Unit 8 (UN8):** 8,011 sq. ft. (Hw 1,201 sq. ft.). 50' Buffer.
- Unit 5 (UN5):** 3,118 sq. ft. (Hw 1,118 sq. ft.). 100' Buffer.
- Unit 6 (UN6):** 1,201 sq. ft. 50' Buffer.
- Unit 7 (UN7):** 7,801 sq. ft. (Hw 1,141 sq. ft.). 50' Buffer.
- Unit 10 (UN10):** 4,941 sq. ft. with buffers. 200' Buffer.
- Unit 11 (UN11):** 1,201 sq. ft. 50' Buffer.
- Unit 13 (UN13):** 1,201 sq. ft. 50' Buffer.
- Unit 14 (UN14):** 1,201 sq. ft. 50' Buffer.
- Unit 15 (UN15):** 1,201 sq. ft. 50' Buffer.
- Unit 16 (UN16):** 1,201 sq. ft. 50' Buffer.
- Unit 17 (UN17):** 1,201 sq. ft. 50' Buffer.
- Unit 18 (UN18):** 1,201 sq. ft. 50' Buffer.
- Unit 19 (UN19):** 1,201 sq. ft. 50' Buffer.
- Unit 20 (UN20):** 1,201 sq. ft. 50' Buffer.
- Unit 21 (UN21):** 1,201 sq. ft. 50' Buffer.
- Unit 22 (UN22):** 1,201 sq. ft. 50' Buffer.
- Unit 23 (UN23):** 1,201 sq. ft. 50' Buffer.
- Unit 24 (UN24):** 1,201 sq. ft. 50' Buffer.
- Unit 25 (UN25):** 1,201 sq. ft. 50' Buffer.
- Unit 26 (UN26):** 1,201 sq. ft. 50' Buffer.
- Unit 27 (UN27):** 1,201 sq. ft. 50' Buffer.
- Unit 28 (UN28):** 1,201 sq. ft. 50' Buffer.
- Unit 29 (UN29):** 1,201 sq. ft. 50' Buffer.
- Unit 30 (UN30):** 1,201 sq. ft. 50' Buffer.
- Unit 31 (UN31):** 1,201 sq. ft. 50' Buffer.
- Unit 32 (UN32):** 1,201 sq. ft. 50' Buffer.
- Unit 33 (UN33):** 1,201 sq. ft. 50' Buffer.
- Unit 34 (UN34):** 1,201 sq. ft. 50' Buffer.
- Unit 35 (UN35):** 1,201 sq. ft. 50' Buffer.
- Unit 36 (UN36):** 1,201 sq. ft. 50' Buffer.
- Unit 37 (UN37):** 1,201 sq. ft. 50' Buffer.
- Unit 38 (UN38):** 1,201 sq. ft. 50' Buffer.
- Unit 39 (UN39):** 1,201 sq. ft. 50' Buffer.
- Unit 40 (UN40):** 1,201 sq. ft. 50' Buffer.
- Unit 41 (UN41):** 1,201 sq. ft. 50' Buffer.
- Unit 42 (UN42):** 1,201 sq. ft. 50' Buffer.
- Unit 43 (UN43):** 1,201 sq. ft. 50' Buffer.
- Unit 44 (UN44):** 1,201 sq. ft. 50' Buffer.
- Unit 45 (UN45):** 1,201 sq. ft. 50' Buffer.
- Unit 46 (UN46):** 1,201 sq. ft. 50' Buffer.
- Unit 47 (UN47):** 1,201 sq. ft. 50' Buffer.
- Unit 48 (UN48):** 1,201 sq. ft. 50' Buffer.
- Unit 49 (UN49):** 1,201 sq. ft. 50' Buffer.
- Unit 50 (UN50):** 1,201 sq. ft. 50' Buffer.
- Unit 51 (UN51):** 1,201 sq. ft. 50' Buffer.
- Unit 52 (UN52):** 1,201 sq. ft. 50' Buffer.
- Unit 53 (UN53):** 1,201 sq. ft. 50' Buffer.
- Unit 54 (UN54):** 1,201 sq. ft. 50' Buffer.
- Unit 55 (UN55):** 1,201 sq. ft. 50' Buffer.
- Unit 56 (UN56):** 1,201 sq. ft. 50' Buffer.
- Unit 57 (UN57):** 1,201 sq. ft. 50' Buffer.
- Unit 58 (UN58):** 1,201 sq. ft. 50' Buffer.
- Unit 59 (UN59):** 1,201 sq. ft. 50' Buffer.
- Unit 60 (UN60):** 1,201 sq. ft. 50' Buffer.
- Unit 61 (UN61):** 1,201 sq. ft. 50' Buffer.
- Unit 62 (UN62):** 1,201 sq. ft. 50' Buffer.
- Unit 63 (UN63):** 1,201 sq. ft. 50' Buffer.
- Unit 64 (UN64):** 1,201 sq. ft. 50' Buffer.
- Unit 65 (UN65):** 1,201 sq. ft. 50' Buffer.
- Unit 66 (UN66):** 1,201 sq. ft. 50' Buffer.
- Unit 67 (UN67):** 1,201 sq. ft. 50' Buffer.
- Unit 68 (UN68):** 1,201 sq. ft. 50' Buffer.
- Unit 69 (UN69):** 1,201 sq. ft. 50' Buffer.
- Unit 70 (UN70):** 1,201 sq. ft. 50' Buffer.
- Unit 71 (UN71):** 1,201 sq. ft. 50' Buffer.
- Unit 72 (UN72):** 1,201 sq. ft. 50' Buffer.
- Unit 73 (UN73):** 1,201 sq. ft. 50' Buffer.
- Unit 74 (UN74):** 1,201 sq. ft. 50' Buffer.
- Unit 75 (UN75):** 1,201 sq. ft. 50' Buffer.
- Unit 76 (UN76):** 1,201 sq. ft. 50' Buffer.
- Unit 77 (UN77):** 1,201 sq. ft. 50' Buffer.
- Unit 78 (UN78):** 1,201 sq. ft. 50' Buffer.
- Unit 79 (UN79):** 1,201 sq. ft. 50' Buffer.
- Unit 80 (UN80):** 1,201 sq. ft. 50' Buffer.
- Unit 81 (UN81):** 1,201 sq. ft. 50' Buffer.
- Unit 82 (UN82):** 1,201 sq. ft. 50' Buffer.
- Unit 83 (UN83):** 1,201 sq. ft. 50' Buffer.
- Unit 84 (UN84):** 1,201 sq. ft. 50' Buffer.
- Unit 85 (UN85):** 1,201 sq. ft. 50' Buffer.
- Unit 86 (UN86):** 1,201 sq. ft. 50' Buffer.
- Unit 87 (UN87):** 1,201 sq. ft. 50' Buffer.
- Unit 88 (UN88):** 1,201 sq. ft. 50' Buffer.
- Unit 89 (UN89):** 1,201 sq. ft. 50' Buffer.
- Unit 90 (UN90):** 1,201 sq. ft. 50' Buffer.
- Unit 91 (UN91):** 1,201 sq. ft. 50' Buffer.
- Unit 92 (UN92):** 1,201 sq. ft. 50' Buffer.
- Unit 93 (UN93):** 1,201 sq. ft. 50' Buffer.
- Unit 94 (UN94):** 1,201 sq. ft. 50' Buffer.
- Unit 95 (UN95):** 1,201 sq. ft. 50' Buffer.
- Unit 96 (UN96):** 1,201 sq. ft. 50' Buffer.
- Unit 97 (UN97):** 1,201 sq. ft. 50' Buffer.
- Unit 98 (UN98):** 1,201 sq. ft. 50' Buffer.
- Unit 99 (UN99):** 1,201 sq. ft. 50' Buffer.
- Unit 100 (UN100):** 1,201 sq. ft. 50' Buffer.

3/2/2018 8:54:24 AM, 1:296.816

7612

INNOVATIVE SWINE







March 23, 2018

## Wetlands

- |                                |                                   |          |
|--------------------------------|-----------------------------------|----------|
| Estuarine and Marine Deepwater | Freshwater Emergent Wetland       | Lake     |
| Estuarine and Marine Wetland   | Freshwater Forested/Shrub Wetland | Other    |
|                                | Freshwater Pond                   | Riverine |

This map is for general reference only. The US Fish and Wildlife Service is not responsible for the accuracy or currentness of the base data shown on this map. All wetlands related data should be used in accordance with the layer metadata found on the Wetlands Mapper web site.



Labels Field Areas - What Crop - In Etc

# Innovative Swine Farm

Field Boundaries, Wells, & Buffers



Legend	
	Buffer
	Field (UN10) 4.94ac.
	Field (UN12) 14.15ac.
	Field (UN3) 14.71ac.
	Field (UN9) 3.32ac.
	Field (UN5) 3.87ac.
	Field (UN6) 1.20ac.
	Field (UN7) 7.80ac.
	Field (UN8) 8.01ac.
	Field (UN9) 3.32ac.
	Innovative Swine
	Property Line

Google Earth

© 2018 Google

1000 ft






# Innovative Swine Farm

## Soil Map

**Legend**

 Innovative Swine







## Innovative Swine Property Map







### Overview



### Legend

-  Parcels
-  Parcel Numbers
-  Address Numbers
-  Roads
-  Railroads
-  Streams and River (Large)

### Flood Map

-  A - 100 Year Flood Area - Areas of 1% annual chance flood also known as the base flood. Base Flood Elevations (BFE) have not been determined.
-  AE - 100 Year Flood Area - Areas of 1% annual chance flood also known as the base flood. Determined by detailed methods with Base Flood Elevations (BFE).
-  VE: Coastal SFHA with BFE & velocity wave action - Coastal flood zone with velocity hazard (wave action); Base Flood Elevations determined.
-  X: 500 Year Flood - Areas of 0.2% annual chance flood

Parcel ID 035 024  
 Class Code Agricultural  
 Taxing District UNINCORPORATED  
 UNINCORPORATED  
 Acres 106.01

Owner AGRIMENT SLUDGE SOLUTIONS LLC  
 P O BOX 1096  
 BEULAVILLE NC 28518  
 Physical Address 3023 S HWY 41  
 Assessed Value Value \$245668

Last 2 Sales		Price	Reason	Qual
Date	10/22/2012	\$61000	FM	Q
Date	9/21/2012	0	LG	U





USDA Farm: 924  
 FSA Tract: 612  
 Crisp County

**Wetland Determination Identifiers**

- Restricted Use
- Limited Restrictions
- Exempt from Conservation Compliance Provisions

Wetland identifiers do not represent the size, shape, or specific determination of the area. Refer to your original determinations (CPA-426 and attached maps) for exact wetland boundaries and labels, or contact NRCS.

Farmland Ac.: 106.13  
 Cropland Ac.: 3.32

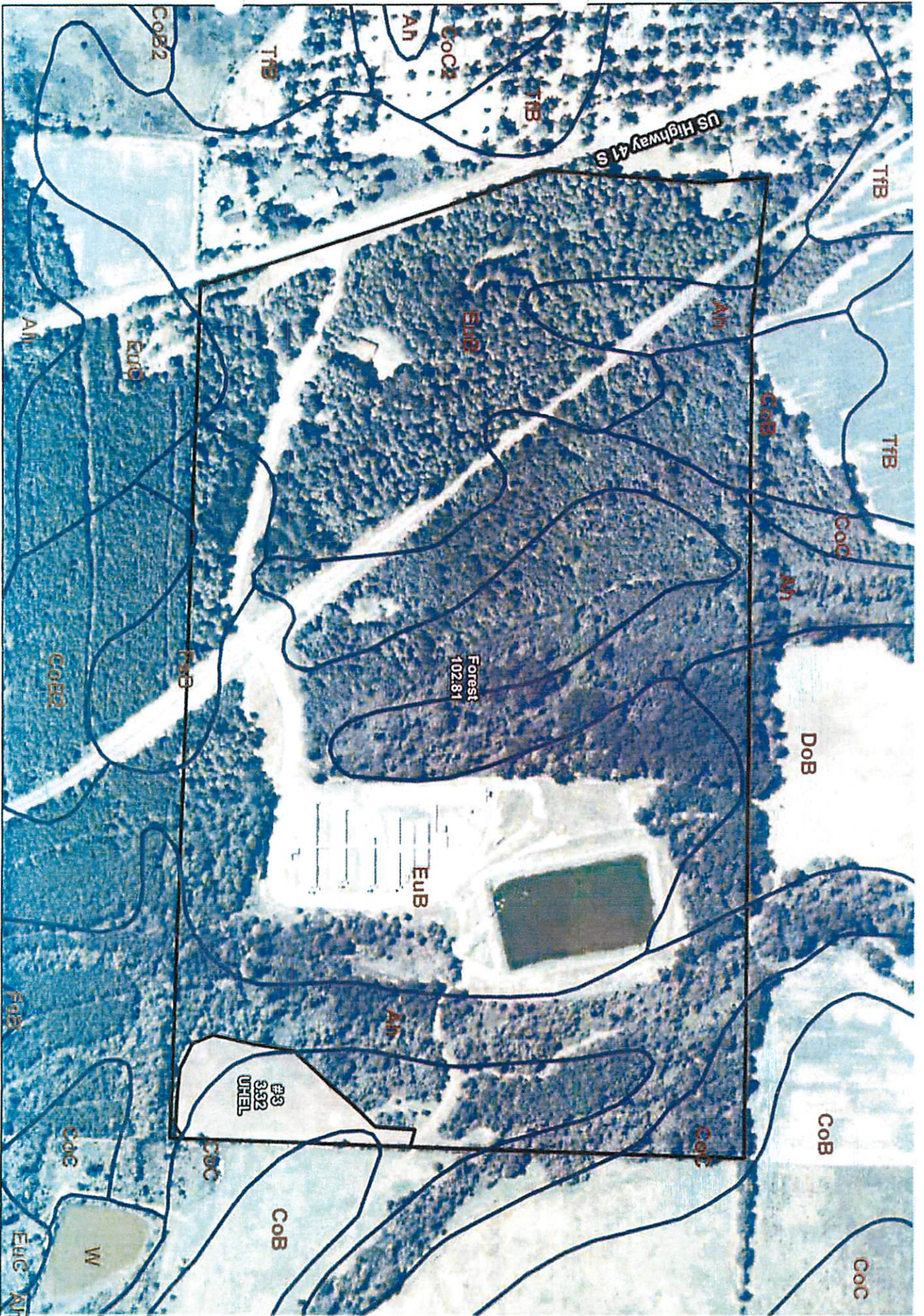
0 210 420 Feet



Crop Year: \_\_\_\_\_

Map Created: 07/14/2017

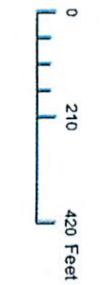




USDA Farm: 924  
 FSA Tract: 612  
 Crisp County

Wetland Determination Identifiers  
 ● Wetland  
 ● Water  
 ● Exempt from Conservation Compliance Provisions  
 Wetland boundaries do not represent the size, shape, or specific determination of the wetland. Refer to your original determination (CWA-002 and associated maps) for more information. Wetland boundaries and labels are shown in black.

Farmland Ac.: 106.13  
 Cropland Ac.: 3.32



Crop Year: \_\_\_\_  
 Map Created: 07/14/2011



# Soil Map—Crisp and Turner Counties, Georgia



Natural Resources  
Conservation Service

Web Soil Survey  
National Cooperative Soil Survey

6/21/2018  
Page 1 of 3

## MAP LEGEND




















### Area of Interest (AOI)

-  Area of Interest (AOI)

### Soils


-  Soil Map Unit Polygons
-  Soil Map Unit Lines
-  Soil Map Unit Points

### Special Point Features

-  Blowout
-  Borrow Pit
-  Clay Spot
-  Closed Depression
-  Gravel Pit
-  Gravelly Spot
-  Landfill
-  Lava Flow
-  Marsh or swamp
-  Mine or Quarry
-  Miscellaneous Water
-  Perennial Water
-  Rock Outcrop
-  Saline Spot
-  Sandy Spot
-  Severely Eroded Spot
-  Sinkhole
-  Slide or Slip
-  Sodic Spot

-  Spoil Area
-  Stony Spot
-  Very Stony Spot
-  Wet Spot
-  Other
-  Special Line Features

### Water Features

-  Streams and Canals

### Transportation

-  Rails
-  Interstate Highways
-  US Routes
-  Major Roads
-  Local Roads

### Background

-  Aerial Photography

## MAP INFORMATION

The soil surveys that comprise your AOI were mapped at 1:20,000.

Warning: Soil Map may not be valid at this scale.

Enlargement of maps beyond the scale of mapping can cause misunderstanding of the detail of mapping and accuracy of soil line placement. The maps do not show the small areas of contrasting soils that could have been shown at a more detailed scale.

Please rely on the bar scale on each map sheet for map measurements.

Source of Map: Natural Resources Conservation Service

Web Soil Survey URL:

Coordinate System: Web Mercator (EPSG:3857)

Maps from the Web Soil Survey are based on the Web Mercator projection, which preserves direction and shape but distorts distance and area. A projection that preserves area, such as the Albers equal-area conic projection, should be used if more accurate calculations of distance or area are required.

This product is generated from the USDA-NRCS certified data as of the version date(s) listed below.

Soil Survey Area: Crisp and Turner Counties, Georgia

Survey Area Data: Version 13, Sep 15, 2017

Soil map units are labeled (as space allows) for map scales 1:50,000 or larger.

Date(s) aerial images were photographed: Apr 15, 2014—Nov 9, 2017

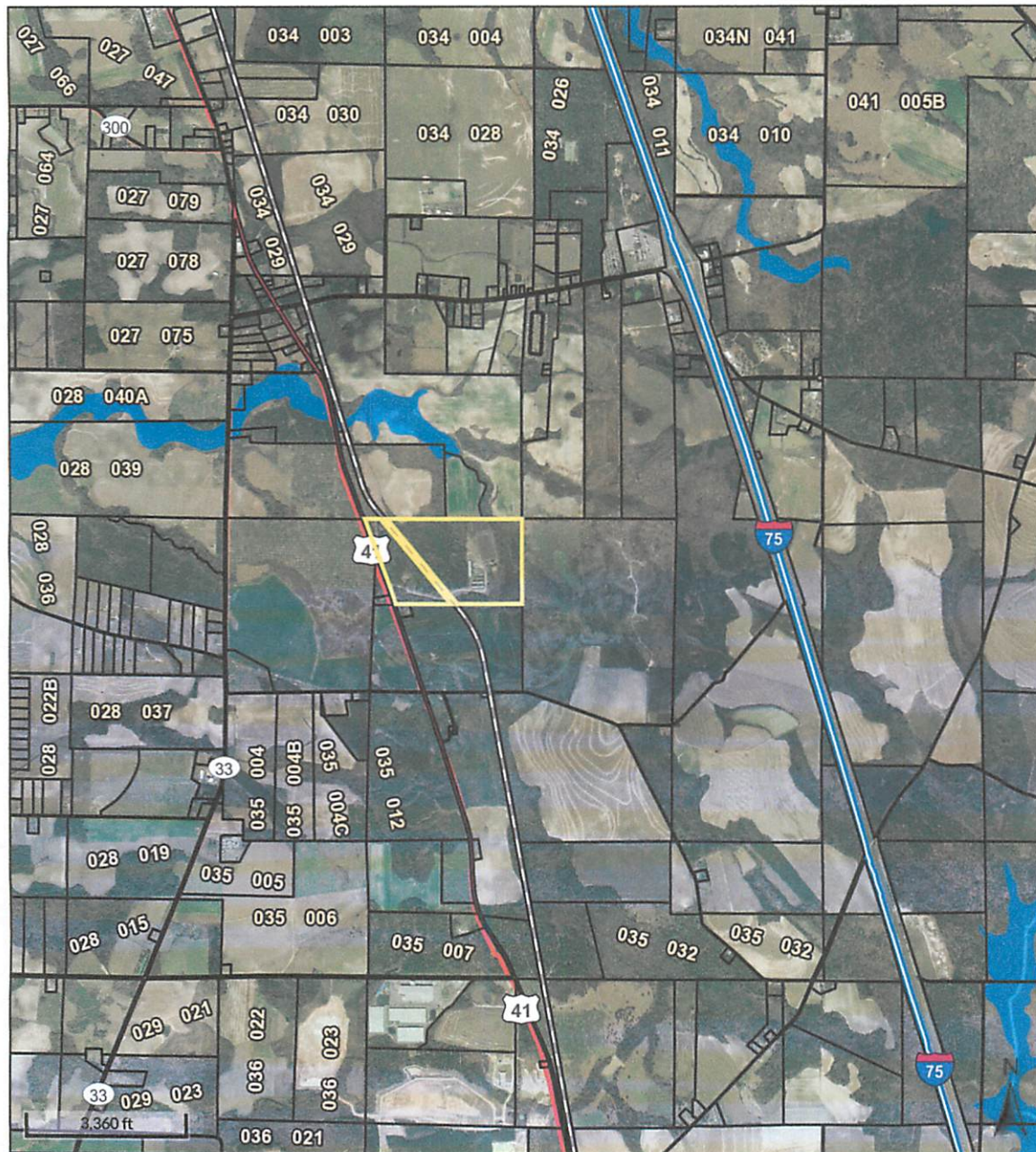
The orthophoto or other base map on which the soil lines were compiled and digitized probably differs from the background imagery displayed on these maps. As a result, some minor shifting of map unit boundaries may be evident.



## Map Unit Legend

Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
Ah	Alapaha loamy sand, 0 to 2 percent slopes, occasionally flooded	28.4	26.3%
CoB	Cowarts loamy sand, 2 to 5 percent slopes	2.8	2.6%
CoB2	Cowarts sandy loam, 2 to 5 percent slopes, eroded	0.0	0.0%
CoC	Cowarts loamy sand, 5 to 8 percent slopes	8.9	8.3%
DoB	Dothan loamy sand, 2 to 5 percent slopes	2.4	2.2%
EuB	Esto sandy loam, 2 to 5 percent slopes	61.3	57.0%
EuC	Esto sandy loam, 5 to 8 percent slopes	0.4	0.4%
FsB	Fuquay loamy sand, 0 to 5 percent slopes	3.4	3.1%
<b>Totals for Area of Interest</b>		<b>107.6</b>	<b>100.0%</b>







## Innovative Swine-Streams and Rivers







### Overview



### Legend

-  Parcels
-  Parcel Numbers
-  Roads
-  Railroads
-  Streams and River (Large)
-  Lakes

### Flood Map

-  A - 100 Year Flood Area - Areas of 1% annual chance flood also known as the base flood. Base Flood Elevations (BFE) have not been determined.
-  AE - 100 Year Flood Area - Areas of 1% annual chance flood also known as the base flood. Determined by detailed methods with Base Flood Elevations (BFE).
-  VE: Coastal SFHA with BFE & velocity wave action - Coastal flood zone with velocity hazard (wave action); Base Flood Elevations determined.
-  X: 500 Year Flood - Areas of 0.2% annual chance flood

Date created: 3/23/2018  
Last Data Uploaded: 3/22/2018 8:49:16 PM



Developed by  
The Schneider Corporation