Phosphorus Loss Assessment Tool Completion

Name of Facility: Small Acres Dairy Facility Number: 45-7

Owner(s) Name: Mike Corn Phone No: (828) 684-0475

Mailing Address: 735 Butler Bridge Road, Fletcher, NC 28732

Check the appropriate box below, and sign at the bottom:

☐ **No** fields received a high or very high rating.

☐ **Yes,** the fields listed below received a high or very high rating:

Field Number		Size (Acres)	Rating (High or Very High)
Tr 34170	Field 10	8.10	High
	11	3.90	High
Tr 34172	Field 1	6.00	High
	2	11.33	High
Tr 605	Field 1	12.90	High
	2	16.50	High

Please use as many additional attachment forms (PLAT-A-12-15-05) as needed for additional fields. →

By completing the above section and any additional attachments and by signing this form, the facility owner and Technical Specialist acknowledge all application fields were evaluated using the Phosphorus Loss Assessment Tool. All necessary calculations were completed to conduct the Assessment. A copy will be kept on site with the Certified Animal Waste Management Plan. Any future modifications must be approved by a technical specialist and filed with the Soil and Water Conservation District prior to implementation. Waste plans with fields having a high or very high rating will have to be modified to address phosphorus loss by the next permit cycle beginning July, 2007.

Owner Name: Michael R Corn

Owner Signature: Michael R Corn Date: 10-1-12

Technical Specialist Name: Jonathan C. Wallin

Technical Specialist Signature: Jon C Wallin Date: 10-1-12

Affiliation: Henderson Co. Soil + Water Conservation Phone No: (828) 697-4949

Submit this form to:
NC Division of Water Quality
Aquifer Protection Section
Animal Feeding Operations Unit
1636 Mail Service Center
Raleigh, NC 27699-1636

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OCT 04 2012
Aquifer Protection Section

Field Number	Size (Acres)	Rating (High or Very High)
Tr 34228 Field 2	14.17	High
Field 1	6.72	High

NCANAT Version: 2.04

PLAT Results For: Henderson 8/30/2012 11:07:08 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	221
Field Number:	2
Soil Series:	HyB: Hayesville loam, 2 to 7 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - high residue
BMPs:	Buffer Width Width = 50 ft.
Fertilizers:	Dairy-Lagoon sludge
	Yearly Applied Amount: 14.6 1000 gal
	Lb P2O5: 22.46 lb
	Application Method: All other surface
applications	
Soil Loss:	3.1 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	119
WV_Factor (USER)	.90
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	8
SOLUBLE P	=	4
LEACHATE P	=	0
SOURCE P	=	25
TOTAL P RATING	=	37 (MEDIUM)

NCANAT Version: 2.04

PLAT Results For: Henderson 8/30/2012 11:08:30 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	221
Field Number:	3
Soil Series:	HyB: Hayesville loam, 2 to 7 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - high residue
BMPs:	Buffer Width Width = 50 ft.
Fertilizers:	Dairy-Lagoon sludge
	Yearly Applied Amount: 14.6 1000 gal
	Lb P2O5: 22.46 lb
	Application Method: All other surface
applications	
Soil Loss:	3.1 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	98
WV_Factor (USER)	.95
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	6
SOLUBLE P	=	3
LEACHATE P	=	0
SOURCE P	=	25
TOTAL P RATING	=	34 (MEDIUM)

NCANAT Version: 2.04

PLAT Results For: Henderson 9/4/2012 10:55:36 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	29
Field Number:	1
Soil Series:	To: Toxaway silt loam
Crop:	Corn (Silage) : Conservation Tillage - high residue
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 32.56 ton
	Lb P2O5: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	.14 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	143
WV_Factor (USER)	.87
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	14
LEACHATE P	=	0
SOURCE P	=	27
TOTAL P RATING	=	42 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:14:55 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	33632
Field Number:	3
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Pasture) :
BMPs:	Buffer Width Width = 10 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 59.77 1000 gal
	Lb P2O5: 1.6 lb
	Application Method: All other surface
applications	
Soil Loss:	.74 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	13
WV_Factor (USER)	1.06
Artificial Drainage System:	YES
Drainage Spacing:	100 ft
Drainage Depth:	36 in

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	0
LEACHATE P	=	0
SOURCE P	=	5
TOTAL P RATING	=	5 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 12:59:01 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34170
Field Number:	10
Soil Series:	To: Toxaway silt loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 20 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.49 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.46 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	331
WV_Factor (USER)	.98
Soil Test 28" - 32"	2
WV_Factor (DATABASE)	1
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	45
LEACHATE P	=	1
SOURCE P	=	29
TOTAL P RATING	=	76 (HIGH)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 12:56:16 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34170
Field Number:	11
Soil Series:	To: Toxaway silt loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 30 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.49 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.46 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	424
WV_Factor (USER)	1.04
Soil Test 28" - 32"	2
WV_Factor (DATABASE)	1
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	54
LEACHATE P	=	1
SOURCE P	=	29
TOTAL P RATING	=	85 (HIGH)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 12:51:42 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34171
Field Number:	9
Soil Series:	Ro: Rosman loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 25 ft.
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 30.93 ton
	Lb P2O5: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	.84 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	194
WV_Factor (USER)	.84
Soil Test 28" - 32"	2
WV_Factor (DATABASE)	1
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	12
LEACHATE P	=	1
SOURCE P	=	14
TOTAL P RATING	=	28 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 7/7/2011 3:28:48 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	
Tract Number:	34172
Field Number:	1
Soil Series:	Ko: Kinkora loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 8 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	1.2 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	131
WV_Factor (USER)	.91
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	47
LEACHATE P	=	0
SOURCE P	=	48
TOTAL P RATING	=	96 (HIGH)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 1:06:54 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34172
Field Number:	12
Soil Series:	Ro: Rosman loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 70 ft.
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 32.56 ton
	Lb P205: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	.84 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	131
WV_Factor (USER)	.91
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	7
LEACHATE P	=	0
SOURCE P	=	15
TOTAL P RATING	=	23 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 7/7/2011 3:29:11 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	
Tract Number:	34172
Field Number:	2
Soil Series:	Ko: Kinkora loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 8 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	2.3 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	131
WV_Factor (USER)	.91
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	2
SOLUBLE P	=	47
LEACHATE P	=	0
SOURCE P	=	48
TOTAL P RATING	=	97 (HIGH)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 1:06:13 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34172
Field Number:	3
Soil Series:	Ro: Rosman loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 70 ft.
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 32.56 ton
	Lb P2O5: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	.84 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	131
WV_Factor (USER)	.91
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	7
LEACHATE P	=	0
SOURCE P	=	15
TOTAL P RATING	=	23 (LOW)

ANAT Version: 2.04

AT Results For: Henderson 9/4/2012 11:28:16 AM

INPUTS

Lendar Year:	2012
unty:	Henderson
oducer Identifier:	Small Acres
act Number:	34228
eld Number:	1
il Series:	Co: Codorus loam (Arkaqua)
op:	Corn (Silage) : Conservation Tillage - high residue
rtilizers:	Dairy-slurry
	Yearly Applied Amount: 11.486 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
olications	
il Loss:	1.1 t/ac/yr
ceiving Slope Distance	0-9 ft
il Test 0" - 4"	166
WV_Factor (USER)	.90
il Test 28" - 32"	0
WV_Factor (DATABASE)	1
ificial Drainage System:	NO
drologic Condition:	GOOD

OUTPUTS

RTICULATE P	=	5
UBLE P	=	29
CHATE P	=	0
RCE P	=	36
TAL P RATING	=	70 (HIGH)

NCANAT Version: 2.04

PLAT Results For: Henderson 9/4/2012 11:27:51 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34228
Field Number:	2
Soil Series:	Co: Codorus loam (Arkaqua)
Crop:	Corn (Silage) : Conservation Tillage - high residue
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.486 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	1.1 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	166
WV_Factor (USER)	.90
Soil Test 28" - 32"	0
WV_Factor (DATABASE)	1
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	5
SOLUBLE P	=	29
LEACHATE P	=	0
SOURCE P	=	36
TOTAL P RATING	=	70 (HIGH)

ANAT Version: 2.04

AT Results For: Henderson 9/4/2012 11:01:54 AM

INPUTS

lendar Year:	2012
unty:	Henderson
oducer Identifier:	Small Acres
act Number:	34295
eld Number:	2
il Series:	To: Toxaway silt loam
op:	Corn (Silage) : Conservation Tillage - high residue
rtilizers:	Dairy-slurry
	Yearly Applied Amount: 11.486 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
plications	
il Loss:	.14 t/ac/yr
ceiving Slope Distance	0-9 ft
il Test 0" - 4"	42
WV_Factor (USER)	.88
tificial Drainage System:	NO
drologic Condition:	GOOD

OUTPUTS

RTICULATE P	=	0
LUBLE P	=	4
ACHATE P	=	0
JRCE P	=	19
TAL P RATING	=	23 (LOW)

NCANAT Version: 2.04

PLAT Results For: Henderson 8/30/2012 11:03:11 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34492
Field Number:	1
Soil Series:	FaE: Fannin silt loam, 15 to 25 percent slopes
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 50 ft.
Fertilizers:	Dairy-Lagoon sludge
	Yearly Applied Amount: 6.89 1000 gal
	Lb P2O5: 22.46 lb
	Application Method: All other surface
applications	
Soil Loss:	.59 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	9
WV_Factor (USER)	.96
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	0
LEACHATE P	=	0
SOURCE P	=	7
TOTAL P RATING	=	7 (LOW)

NCANAT Version: 2.04

PLAT Results For: Henderson 8/30/2012 11:04:47 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34492
Field Number:	2
Soil Series:	FaE: Fannin silt loam, 15 to 25 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - high residue
BMPs:	Buffer Width Width = 50 ft.
Fertilizers:	Dairy-Lagoon sludge
	Yearly Applied Amount: 17.97 1000 gal
	Lb P2O5: 22.46 lb
	Application Method: All other surface
applications	
Soil Loss:	.60 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	81
WV_Factor (USER)	1
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	2
LEACHATE P	=	0
SOURCE P	=	31
TOTAL P RATING	=	33 (MEDIUM)

NCANAT Version: 2.04

PLAT Results For: Henderson 8/30/2012 10:54:21 AM

INPUTS

Calendar Year:	2012
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	34492
Field Number:	3
Soil Series:	Co: Codorus loam (Arkaqua)
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 50 ft.
Fertilizers:	Dairy-Lagoon sludge
	Yearly Applied Amount: 15.59 1000 gal
	Lb P2O5: 22.46 lb
	Application Method: All other surface
applications	
Soil Loss:	.077 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	43
WV_Factor (USER)	.92
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	5
LEACHATE P	=	0
SOURCE P	=	40
TOTAL P RATING	=	45 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 1:08:05 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	544
Field Number:	1
Soil Series:	Ro: Rosman loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 82.4 1000 gal
	Lb P2O5: 1.6 lb
	Application Method: All other surface
applications	
Soil Loss:	.84 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	66
WV_Factor (USER)	.99
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	3
LEACHATE P	=	0
SOURCE P	=	11
TOTAL P RATING	=	14 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 1:09:28 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	547
Field Number:	1
Soil Series:	EnB: Elsinboro loam, 0 to 3 percent slopes
Crop:	Fescue (Pasture) :
BMPs:	Buffer Width Width = 50 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 13.37 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	3.5 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	69
WV_Factor (USER)	.88
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	2
SOLUBLE P	=	2
LEACHATE P	=	0
SOURCE P	=	14
TOTAL P RATING	=	18 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:37:15 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	549
Field Number:	1
Soil Series:	Ro: Rosman loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 32.56 ton
	Lb P2O5: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	0.84 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	19
WV_Factor (USER)	.98
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	1
LEACHATE P	=	0
SOURCE P	=	15
TOTAL P RATING	=	16 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:40:29 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	549
Field Number:	2
Soil Series:	Co: Codorus loam (Arkaqua)
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 15.26 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.08 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	26
WV_Factor (USER)	.9
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	3
LEACHATE P	=	0
SOURCE P	=	30
TOTAL P RATING	=	33 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:49:39 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	549
Field Number:	3
Soil Series:	Co: Codorus loam (Arkaqua)
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 10 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	2 t/ac/yr
Receiving Slope Distance	100-149 ft
Soil Test 0" - 4"	26
WV_Factor (USER)	.9
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	6
LEACHATE P	=	0
SOURCE P	=	40
TOTAL P RATING	=	46 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 12:50:13 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	580
Field Number:	5
Soil Series:	DeA: Delanco (Dillard) loam, 0 to 2 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 25 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 6.65 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	1.7 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	69
WV_Factor (USER)	.88
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	17
LEACHATE P	=	0
SOURCE P	=	27
TOTAL P RATING	=	45 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 7/7/2011 2:52:33 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	
Tract Number:	605
Field Number:	1
Soil Series:	Ko: Kinkora loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 70 ft.
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 18 ton
	Lb P2O5: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	2.3 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	137
WV_Factor (USER)	1.03
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	3
SOLUBLE P	=	43
LEACHATE P	=	0
SOURCE P	=	52
TOTAL P RATING	=	98 (HIGH)

NCANAT Version: 2.02

PLAT Results For: Henderson 7/7/2011 3:23:59 PM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	
Tract Number:	605
Field Number:	2
Soil Series:	Ko: Kinkora loam
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 8 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	2.3 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	137
WV_Factor (USER)	1.03
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	2
SOLUBLE P	=	43
LEACHATE P	=	0
SOURCE P	=	48
TOTAL P RATING	=	93 (HIGH)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:18:22 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	639
Field Number:	2
Soil Series:	DeA: Delanco (Dillard) loam, 0 to 2 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 10 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 8.5 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.92 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	50
WV_Factor (USER)	.9
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	12
LEACHATE P	=	0
SOURCE P	=	36
TOTAL P RATING	=	49 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:18:22 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	639
Field Number:	5
Soil Series:	DeA: Delanco (Dillard) loam, 0 to 2 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 10 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 8.5 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.92 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	50
WV_Factor (USER)	.9
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	12
LEACHATE P	=	0
SOURCE P	=	36
TOTAL P RATING	=	49 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:21:50 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	639
Field Number:	6
Soil Series:	BaB: Bradson gravelly loam, 2 to 7 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.49 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	1.7 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	66
WV_Factor (USER)	1.16
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	1
SOLUBLE P	=	2
LEACHATE P	=	0
SOURCE P	=	22
TOTAL P RATING	=	25 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:23:14 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	639
Field Number:	7
Soil Series:	BaB: Bradson gravelly loam, 2 to 7 percent slopes
Crop:	Corn (Silage) : Conservation Tillage - minimum residue
BMPs:	Buffer Width Width = 10 ft.
Fertilizers:	Dairy-scraped
	Yearly Applied Amount: 32.56 ton
	Lb P2O5: 6.25 lb
	Application Method: All other surface
applications	
Soil Loss:	1.7 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	69
WV_Factor (USER)	.96
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	5
SOLUBLE P	=	3
LEACHATE P	=	0
SOURCE P	=	32
TOTAL P RATING	=	40 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:53:02 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	859
Field Number:	1
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.81 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.034 t/ac/yr
Receiving Slope Distance	100-149 ft
Soil Test 0" - 4"	34
WV_Factor (USER)	.97
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	2
LEACHATE P	=	0
SOURCE P	=	11
TOTAL P RATING	=	13 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:53:51 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	859
Field Number:	2
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 70 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.81 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.034 t/ac/yr
Receiving Slope Distance	100-149 ft
Soil Test 0" - 4"	34
WV_Factor (USER)	.97
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	2
LEACHATE P	=	0
SOURCE P	=	11
TOTAL P RATING	=	13 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:54:14 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	859
Field Number:	3
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.81 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.034 t/ac/yr
Receiving Slope Distance	100-149 ft
Soil Test 0" - 4"	34
WV_Factor (USER)	.97
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	2
LEACHATE P	=	0
SOURCE P	=	11
TOTAL P RATING	=	13 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 10:55:19 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	859
Field Number:	4
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.81 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.034 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	69
WV_Factor (USER)	.88
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	4
LEACHATE P	=	0
SOURCE P	=	11
TOTAL P RATING	=	15 (LOW)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:00:38 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	859
Field Number:	6
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.81 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.033 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	286
WV_Factor (USER)	.81
Soil Test 28" - 32"	2
WV_Factor (DATABASE)	1
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	18
LEACHATE P	=	1
SOURCE P	=	11
TOTAL P RATING	=	30 (MEDIUM)

NCANAT Version: 2.02

PLAT Results For: Henderson 6/21/2011 11:04:54 AM

INPUTS

Calendar Year:	2011
County:	Henderson
Producer Identifier:	Small Acres
Tract Number:	859
Field Number:	7
Soil Series:	To: Toxaway silt loam
Crop:	Fescue (Hay) :
BMPs:	Buffer Width Width = 100 ft.
Fertilizers:	Dairy-slurry
	Yearly Applied Amount: 11.81 1000 gal
	Lb P2O5: 14.1 lb
	Application Method: All other surface
applications	
Soil Loss:	.033 t/ac/yr
Receiving Slope Distance	0-9 ft
Soil Test 0" - 4"	286
WV_Factor (USER)	.81
Soil Test 28" - 32"	2
WV_Factor (DATABASE)	1
Artificial Drainage System:	NO
Hydrologic Condition:	GOOD

OUTPUTS

PARTICULATE P	=	0
SOLUBLE P	=	18
LEACHATE P	=	1
SOURCE P	=	11
TOTAL P RATING	=	30 (MEDIUM)

STATE OF NORTH CAROLINA
DEPARTMENT OF AGRICULTURE AND CONSUMER SERVICES
DIVISION OF SOIL AND WATER CONSERVATION
WESTERN HEADQUARTERS
1301 FANNING BRIDGE ROAD, FLETCHER, NC 28732 PHONE: (828) 687-6987

SMALL ACRES
SITE PLAN

HENDERSON COUNTY, NORTH

REVISIONS			
NO.	BY	DATE	DESCRIPTION
1			
2			
3			
4			
5			

PROJECT #:	small_ac_dairy	SCALE:	1 INCH = 60 FEET
DRAWN BY:	J. YOUNG	DATE:	DECEMBER 7, 2012
CHECKED BY:		DATE:	
SHEET NO.	1 OF 1	FILENAME:	site_map_rev.dwg

NCDA&CS Agronomic Division Phone: (919)733-2655 Web site: www.ncagr.gov/agronomi/ **Report No: 34156**

Soil Test Report

SERVING N.C. RESIDENTS FOR OVER 60 YEARS

Grower: **Small Acres Dairy-Mike Corn**
735 Butler Bridge Rd
Fletcher, NC 28732

Copies To:

Farm:

Henderson County

Received: 03/31/2011 **Completed:** 04/08/2011 Links to Helpful Information

Agronomist Comments

3, S, 12

Field Information		Applied Lime			Recommendations												
Sample No.	*Last Crop*	*Mo*	*Yr*	*T/A*	*Crop or Year*		*Lime*	*N*	*P2O5*	*K2O*	*Mg*	*S*	*Cu*	*Zn*	*B*	*Mn*	*See Note*
1					1st Crop:	Small Grains	1.3T	80-100	20-40	70-90	0	0	0	0	.0	0	3
					2nd Crop:	Corn,Silage	0	180-220	30-50	130-150	0	0	0	0	.0	0	3

Test Results

Soil Class	*HM%*	*W/V*	*CEC*	*BS%*	*Ac*	*pH*	*P-I*	*K-I*	*Ca%*	*Mg%*	*Mn-I*	*Mn-AI(1)*	*Mn-AI(2)*	*Zn-I*	*Zn-AI*	*Cu-I*	*S-I*	*SS-I*	*NO3-N*	*NH4-N*	*Na*
MIN	1.19	0.90	5.2	54.0	2.4	5.3	50	31	40.0	12.0	404	252	259	137	137	96	59				0.1

Field Information		Applied Lime			Recommendations												
Sample No.	*Last Crop*	*Mo*	*Yr*	*T/A*	*Crop or Year*		*Lime*	*N*	*P2O5*	*K2O*	*Mg*	*S*	*Cu*	*Zn*	*B*	*Mn*	*See Note*
2					1st Crop:	Small Grains	.3T	80-100	0	10-30	0	0	0	0	.0	0	3
					2nd Crop:	Corn,Silage	0	180-220	10-30	50-70	0	0	0	0	.0	0	3

Test Results

Soil Class	*HM%*	*W/V*	*CEC*	*BS%*	*Ac*	*pH*	*P-I*	*K-I*	*Ca%*	*Mg%*	*Mn-I*	*Mn-AI(1)*	*Mn-AI(2)*	*Zn-I*	*Zn-AI*	*Cu-I*	*S-I*	*SS-I*	*NO3-N*	*NH4-N*	*Na*
MIN	1.49	0.96	9.0	79.0	1.9	5.9	69	69	57.0	18.0	126	86	93	70	70	89	42				0.1

Field Information		Applied Lime			Recommendations												
Sample No.	*Last Crop*	*Mo*	*Yr*	*T/A*	*Crop or Year*		*Lime*	*N*	*P2O5*	*K2O*	*Mg*	*S*	*Cu*	*Zn*	*B*	*Mn*	*See Note*
3					1st Crop:	Small Grains	0	80-100	0	0	0	0	0	0	.0	pH$	3
					2nd Crop:	Corn,Silage	0	180-220	10-30	30-50	0	0	0	0	.0	pH$	3

Test Results

Soil Class	*HM%*	*W/V*	*CEC*	*BS%*	*Ac*	*pH*	*P-I*	*K-I*	*Ca%*	*Mg%*	*Mn-I*	*Mn-AI(1)*	*Mn-AI(2)*	*Zn-I*	*Zn-AI*	*Cu-I*	*S-I*	*SS-I*	*NO3-N*	*NH4-N*	*Na*
MIN	0.27	1.16	8.0	91.0	0.7	6.7	66	87	62.0	24.0	186	111	118	86	86	70	31				0.2

Field Information		Applied Lime			Recommendations												
Sample No.	*Last Crop*	*Mo*	*Yr*	*T/A*	*Crop or Year*		*Lime*	*N*	*P2O5*	*K2O*	*Mg*	*S*	*Cu*	*Zn*	*B*	*Mn*	*See Note*
4					1st Crop:	Small Grains	1.9T	80-100	100-120	0	0	0	0	0	.0	0	3
					2nd Crop:							0					

Test Results

Soil Class	*HM%*	*W/V*	*CEC*	*BS%*	*Ac*	*pH*	*P-I*	*K-I*	*Ca%*	*Mg%*	*Mn-I*	*Mn-AI(1)*	*Mn-AI(2)*	*Zn-I*	*Zn-AI*	*Cu-I*	*S-I*	*SS-I*	*NO3-N*	*NH4-N*	*Na*
MIN	0.04	1.06	5.4	50.0	2.7	4.6	13	124	27.0	12.0	28	27		26	26	29	469				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
5					1st Crop: Small Grains	1.7T	80-100	70-90	30-50	0	0	0	0	.0	0	3
					2nd Crop:						0					

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.92	0.90	4.8	44.0	2.7	5.0	26	53	26.0	13.0	139	93		36	36	84	155				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
6					1st Crop: Small Grains	0	80-100	80-100	50-70	0	0	0	0	.0	0	3
					2nd Crop:						0					

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.60	0.98	7.3	78.0	1.6	5.9	19	38	59.0	17.0	440	276		49	49	157	41				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
7					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop:						0					

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.27	1.04	8.5	86.0	1.2	6.3	71	122	53.0	25.0	103	67		96	96	186	52				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
8					1st Crop: Fes/OG/Tim,E	0	50-70	0	0	0	0	0	0	.0	pH$	12
					2nd Crop:						0					

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.41	1.04	10.7	98.0	0.2	7.3	179	96	69.0	25.0	130	75		249	249	334	71				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
9					1st Crop: Fes/OG/Tim,E	.7T	50-70	60-80	10-30	0	0	0	0	.0	0	12
					2nd Crop:						0					

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.04	0.99	6.3	86.0	0.9	6.1	36	38	62.0	20.0	49	39		61	61	91	87				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
10					1st Crop: Small Grains	.4T	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop:						0					

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.56	0.97	7.1	79.0	1.5	5.8	100	110	52.0	19.0	80	58		87	87	88	44				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
11					1st Crop: Fes/OG/Tim,E	0	50-70	60-80	0	0	0	0	0	.0	pH$	12
					2nd Crop:						0					

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.46	0.97	13.6	93.0	1.0	6.7	34	427	52.0	25.0	210	132		129	129	88	36				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
12					1st Crop: Fes/OG/Tim,E	2.4T	50-70	10-30	0	0	0	0	0	.0	0	12
					2nd Crop:						0					

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.49	0.88	7.3	64.0	2.6	5.2	69	88	42.0	17.0	83	59		137	137	129	81				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
13					1st Crop: Small Grains	1.3T	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop: Fes/OG/Tim,E	0	50-70	0	0	0	0	0	0	.0	0	12

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.37	0.81	21.8	92.0	1.7	6.2	286	445	56.0	26.0	127	79	86	392	392	313	44				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
14					1st Crop: Small Grains	2.8T	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop: Fes/OG/Tim,E	0	50-70	0	0	0	0	0	0	.0	0	12

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.43	0.75	14.7	79.0	3.1	5.6	204	414	47.0	18.0	153	94	101	238	238	169	55				0.2

Field Information		Applied Lime			Recommendations										
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
15					1st Crop: Corn,Silage	0	180-220	10-30	30-50	0	0	0	0	.0	pH$	3
					2nd Crop:						0					

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.56	0.99	9.0	91.0	0.8	6.8	66	86	63.0	23.0	196	122		91	91	117	48				0.1

Field Information		Applied Lime			Recommendations										
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
16					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	pH$	3
					2nd Crop: Corn,Silage	0	180-220	0	0-20	0	0	0	0	.0	pH$	3

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.66	1.03	9.9	92.0	0.8	6.5	137	108	61.0	25.0	51	33	40	65	65	86	54				0.1

Field Information		Applied Lime			Recommendations										
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
17					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	$pH	3
					2nd Crop: Corn,Silage	0	180-220	0	0-20	0	0	0	0	.0	pH$	3

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.37	0.99	10.8	91.0	1.0	6.5	229	118	62.0	23.0	35	23	30	66	66	124	46				0.1

Field Information		Applied Lime			Recommendations										
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
18					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	pH$	3
					2nd Crop: Corn,Silage	0	180-220	0	20-40	0	0	0	0	.0	pH$	3

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.31	0.84	15.0	95.0	0.7	7.0	194	90	69.0	24.0	241	139	146	313	313	415	47				0.2

Field Information		Applied Lime			Recommendations										
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
19					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	pH$	3
					2nd Crop: Corn,Silage	0	180-220	0	0	0	0	0	0	.0	pH$	3

Test Results																				
Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	2.52	0.98	14.5	90.0	1.4	6.6	331	163	61.0	24.0	43	27	34	166	166	388	47				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
20					1st Crop: Small Grains	0	80-100	0	0-20	0	0	0	0	.0	$pH	3
					2nd Crop: Corn,Silage	0	180-220	0	40-60	0	0	0	0	.0	pH$	3

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.37	1.04	11.8	92.0	1.0	6.6	424	78	67.0	21.0	32	20	27	99	99	423	40				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
21					1st Crop: Small Grains	0	80-100	0	20-40	0	0	0	0	.0	0	3
					2nd Crop: Corn,Silage	0	180-220	0	70-90	0	0	0	0	.0	0	3

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	1.31	0.91	9.5	88.0	1.1	6.3	131	56	65.0	21.0	194	122	129	114	114	326	61				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
22					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop: Corn,Silage	0	180-220	0	0-20	0	0	0	0	.0	0	3

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	0.66	1.08	9.4	87.0	1.2	6.3	262	129	58.0	23.0	314	194	201	125	125	372	57				0.1

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
23					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop: Corn,Silage	0	180-220	0	0	0	0	0	0	.0	0	3

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
M-O	3.47	0.93	12.7	80.0	2.5	5.7	401	175	55.0	19.0	48	43	50	113	141	409	46				0.2

Field Information		Applied Lime			Recommendations											
Sample No.	Last Crop	Mo	Yr	T/A	Crop or Year	Lime	N	P_2O_5	K_2O	Mg	S	Cu	Zn	B	Mn	See Note
24					1st Crop: Small Grains	0	80-100	0	0	0	0	0	0	.0	0	3
					2nd Crop: Corn,Silage	0	180-220	0	0	0	0	0	0	.0	0	3

Test Results

Soil Class	HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	Mn-I	Mn-AI(1)	Mn-AI(2)	Zn-I	Zn-AI	Cu-I	S-I	SS-I	NO_3-N	NH_4-N	Na
MIN	2.60	0.96	14.1	87.0	1.9	6.1	434	181	58.0	22.0	32	28	35	116	116	281	52				0.2

Reprogramming of the laboratory-information-management system that makes this report possible is being funded through a grant from the North Carolina Tobacco Trust Fund Commission.

Thank you for using agronomic services to manage nutrients and safeguard environmental quality.
- Steve Troxler, Commissioner of Agriculture

NCDA&CS Agronomic Division Phone: (919) 733-2655 Website: www.ncagr.gov/agronomi/ **Report No.** FY13-SL001393

Predictive

Soil Report

Mehlich-3 Extraction

Client: Mike Corn
470 Jeffress Rd
FLETCHER, NC 28732

Advisor: Jonathan Wallin
61 Triple Springs Rd
Hendersonville, NC 28792

County: Henderson

Farm:

Sampled: 07/02/2012 **Received:** 07/19/2012 **Completed:** 07/24/2012

Links to Helpful Information

Sample ID: SAF1

Lime History:

Recommendations: Crop	Lime (tons/acre)	Nutrients (lb/acre) N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	More Information
1 - Corn,Silage	0.8	180-220	50	140	0	0	0	0	0	0	Note: 3
2 -											

Test Results [units - W/V in g/cm³; CEC and Na in meq/100 cm³; NO_3-N in mg/dm³]: **Soil Class:** Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
1.55	0.88	8.8	75	2.2	5.6	42	30	58	15	37	59	52		101	101	87	0.1	1		

Sample ID: SAF3

Lime History:

Recommendations: Crop	Lime (tons/acre)	Nutrients (lb/acre) N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	More Information
1 - Corn,Silage	0.6	180-220	0	140	0	0	0	0	0	0	Note: 3
2 -											

Test Results [units - W/V in g/cm³; CEC and Na in meq/100 cm³; NO_3-N in mg/dm³]: **Soil Class:** Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
2.44	0.87	9.1	76	2.2	5.8	143	29	60	14	32	38	40		112	112	210	0.1	1		

Sample ID: SAF5

Lime History:

Recommendations: Crop	Lime (tons/acre)	Nutrients (lb/acre) N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	More Information
1 - Berm Hay/Pas,M	0.5	180-220	40	200	0	0	0	0	0	0	Note: 12
2 -											

Test Results [units - W/V in g/cm³; CEC and Na in meq/100 cm³; NO_3-N in mg/dm³]: **Soil Class:** Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
0.76	0.92	7.3	75	1.8	5.8	43	15	57	17	29	101	78		76	76	100	0.1	1		

North Carolina Tobacco Trust Fund Commission

Reprogramming of the laboratory-information-management system that makes this report possible is being funded through a grant from the North Carolina Tobacco Trust Fund Commission.

Thank you for using agronomic services to manage nutrients and safeguard environmental quality.
- *Steve Troxler, Commissioner of Agriculture*

Sample ID: SAF7	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Berm Hay/Pas,M	0.9	180-220	120	170	0	0	0	0	0	0	Note: 12
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
0.51	0.96	6.3	68	2.0	5.5	9	27	47	19	34	71	60		37	37	39	0.0			

Sample ID: SAF9	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Corn,Silage	0.0	180-220	0	20	0	0	0	0	0	0	Note: 3
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
0.46	1.00	8.9	83	1.5	6.0	81	104	57	21	41	114	85		126	126	166	0.1	1		

Sample ID: SAF11	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Corn,Silage	0.0	180-220	0	0	0	0	0	0	0	0	Note: 3
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
0.36	0.90	13.6	89	1.4	6.3	364	205	60	21	45	153	105		461	461	379	0.1	1		

Sample ID: SAF13	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Corn,Silage	0.3	180-220	0	60	0	0	0	0	0	0	Note: 3
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
0.41	0.90	9.7	83	1.6	5.9	119	68	61	19	41	62	54		143	143	197	0.1	1		

Sample ID: SAF15	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Corn,Silage	0.0	180-220	0	50	0	0	0	0	0	0	Note: 3
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
0.41	0.95	8.9	87	1.2	6.3	98	78	62	20	35	95	70		149	149	164	0.1	1		

Sample ID: SAF17	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Corn,Silage	0.7	180-220	0	0	0	0	0	0	0	0	Note: 3
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
1.61	0.80	12.7	83	2.1	5.7	224	156	59	19	57	164	115		172	172	241	0.1	1		

Sample ID: SAF19	Recommendations:	Lime	Nutrients (lb/acre)									More
	Crop	(tons/acre)	N	P_2O_5	K_2O	Mg	S	Mn	Zn	Cu	B	Information
Lime History:	1 - Corn,Silage	1.0	180-220	0	50	0	0	0	0	0	0	Note: 3
	2 -											

Test Results [units - W/V in g/cm^3; CEC and Na in meq/100 cm^3; NO_3-N in mg/dm^3]: Soil Class: Mineral

HM%	W/V	CEC	BS%	Ac	pH	P-I	K-I	Ca%	Mg%	S-I	Mn-I	Mn-AI1	Mn-AI2	Zn-I	Zn-AI	Cu-I	Na	ESP	SS-I	NO_3-N
2.29	0.90	11.2	80	2.2	5.5	166	74	60	17	54	161	114		114	114	329	0.1	1		

Understanding the Soil Report: explanation of measurements, abbreviations and units

Recommendations

Lime

If testing finds that soil pH is too low for the crop(s) indicated, a ***lime recommendation*** will be given in units of either ton/acre or lb/1000 sq ft. For best results, mix the lime into the top 6 to 8 inches of soil several months before planting. For no-till or established plantings where this is not possible, apply no more than 1 to 1.5 ton/acre (50 lb/1000 sq ft) at one time, even if the report recommends more. You can apply the rest in similar increments every six months until the full rate is applied. If MG is recommended and lime is needed, use dolomitric lime.

Fertilizer

Recommendations ***for field crops or other large areas*** are listed separately for each nutrient to be added (in units of lb/acre unless otherwise specified). Recommendations for N (and sometimes for B) are based on research/field studies for the crop being grown, not on soil test results. K-I and P-I values are based on test results and should be > 50. If they are not, follow the fertilizer recommendations given. If Mg is needed and no lime is recommended, 0-0-22 (11.5% Mg) is an excellent source; 175 to 250 lb per acre alone or in a fertilizer blend will usually satisfy crop needs, SS-I levels appear only on reports for greenhouse soil or problem samples.

Farmers and other commercial producers should pay special attention to ***micronutrient levels***. If *$*, *pH$*, *$pH*, *C* or *Z* notations appear on the soil report, refer to *$Note: Secondary Nutrients and Micronutrients*. In general, homeowners do not need to be concerned about micronutrients. Various crop notes also address lime fertilizer needs; visit ncagr.gov/agronomi/pubs.htm.

Recommendations ***for small areas, such as home lawns/gardens,*** are listed in units of lb/1000 ft . If you cannot find the exact fertilizer grade recommended on the report, visit *www.ncagr.gov/agronomi/obpart4.htm#fs* to find information that may help you choose a comparable alternate. For more information, read *A Homeowner's Guide to Fertilizer.*

Test Results

The first seven values [soil class, HM%, W/V, CEC, BS%, Ac and pH] describe the soil and its degree of acidity. The remaining 16 [P-I, K-I, Ca%, Mg%, Mn-I, Mn-AI1, Mn-AI2, Zn-I, Zn-AI, Cu-I, S-I, SS-I, Na, ESP, SS-I, NO_3-N (not routinely available)] indicate levels of plant nutrients or other fertility measurement. Visit *www.ncagr.gov/agronomi/uyrst.htm* for more information.

Report Abbreviations

Ac	exchangeable acidity
B	boron
BS%	% CEC occupied by basic cations
Ca%	% CEC occupied by calcium
CEC	cation exchange capacity
Cu-I	copper index
ESP	exchangeable sodium percent
HM%	percent humic matter
K-I	potassium index
K_2O	potash
Mg%	% CEC occupied by magnesium
MIN	mineral soil class
Mn	manganese
Mn-AI1	Mn-availability index for crop 1
Mn-AI2	Mn-availability index for crop 2
Mn-I	manganese index
M-O	mineral-organic soil class
N	nitrogen
Na	sodium
NO_3-N	nitrate nitrogen
ORG	organic soil class
pH	current soil pH
P-I	phosphorus index
P_2O_5	phosphate
S-I	sulfur index
SS-I	soluble salt index
W/V	weight per volume
Zn-AI	zinc availability index
Zn-I	zinc index