Print Date: Oct 14 2018

**Description Date:** Jul 23 2018

Describer: M. Williams, J. Velazquez, S. Depew, M. Singer

**NEON Plot ID:** LENO\_002 **Site ID:** S2018AL023002

Pedon ID: S2018AL023002

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2045

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mantachie, Mooreville, Una

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf river valley

on talf flood plain

**Upslope Shape:** convex **Cross Slope Shape:** linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 16 cm.

redox depletions with chroma 2 or less 0 to 100 cm.

redox concentrations 0 to 55 cm. cambic horizon 16 to 100 cm. slickensides 55 to 100 cm.

Country: United States

State: Alabama
County: Choctaw

MLRA: 133A -- Southern Coastal Plain Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8068056 **Std Longitude:** -88.1939722

Latitude: 31 degrees 48 minutes 24.50 seconds

north

Longitude: 88 degrees 11 minutes 38.30 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 386983 meters **UTM Northing:** 3519643 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth:

**Bedrock Hardness:** 

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

Cont. Site ID: S2018AL023002 Pedon ID: S2018AL023002

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	11.0	226	18.0			1,429		somewhat poorly		

A--0 to 16 centimeters (0.0 to 6.3 inches); dark brown (10YR 3/3) silty clay; moderate medium prismatic structure; friable, slightly sticky, slightly plastic; semideformable; many medium roots throughout and many fine roots throughout and many coarse roots throughout; 1 percent fine distinct irregular iron depletions with clear boundaries In matrix and 15 percent fine distinct irregular 5YR 3/4), moist, masses of oxidized iron with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06180

Bw--16 to 37 centimeters (6.3 to 14.6 inches); dark grayish brown (10YR 4/2) clay; moderate coarse prismatic parts to moderate medium angular blocky structure; firm, moderately sticky, moderately plastic; semideformable; few medium roots throughout and few coarse roots throughout; 15 percent fine distinct irregular 2.5YR 3/6), moist, masses of oxidized iron with clear boundaries In matrix and 20 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix; gradual wavy boundary. Lab sample # 18N06181

Bg--37 to 55 centimeters (14.6 to 21.7 inches); grayish brown (10YR 5/2) clay; weak medium prismatic parts to weak medium angular blocky structure; firm, moderately sticky, moderately plastic; deformable; few medium roots throughout and few fine roots throughout; distinct pressure faces on vertical faces of peds; 1 percent fine distinct irregular 10YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix; gradual wavy boundary. Lab sample # 18N06182

Bssg--55 to 100 centimeters (21.7 to 39.4 inches); gray (10YR 6/1) clay; weak medium prismatic parts to weak medium angular blocky structure; firm, moderately sticky, moderately plastic; deformable; few medium roots throughout and few fine roots throughout; 3 percent distinct slickensides (pedogenic) on vertical faces of peds and 65 percent distinct pressure faces on vertical faces of peds; 1 percent fine distinct irregular 10YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06183

Print Date: Oct 14 2018

**Description Date:** Jul 23 2018

Describer: M. Williams, J. Velazquez, S. Depew, M. Singer

**NEON Plot ID:** LENO\_003 **Site ID:** S2018AL023003

Pedon ID: S2018AL023003

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2046

Soil Name as Described/Sampled: Mooreville

Classification: Fine-loamy, siliceous, active, thermic Fluvaquentic

Dystrudepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mantachie, Moreville, Una

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf river valley

on talf flood plain

Upslope Shape: linear Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 12 cm.

cambic horizon 12 to 100 cm.

redox depletions with chroma 2 or less 48 to 100 cm.

redox concentrations 48 to 100 cm.

slickensides 82 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8081944 **Std Longitude:** -88.1883333

Latitude: 31 degrees 48 minutes 29.50 seconds

north

Longitude: 88 degrees 11 minutes 18.00 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 387519 meters **UTM Northing:** 3519791 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth:

Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023003 **Pedon ID:** S2018AL023003

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	11.0	270	18.0			1,429		moderately well		

A--0 to 12 centimeters (0.0 to 4.7 inches); dark grayish brown (10YR 4/2) broken face silty clay; moderate medium subangular blocky structure; friable, slightly sticky, slightly plastic; semideformable; common medium roots throughout and common coarse roots throughout; clear smooth boundary. Lab sample # 18N06184

Bw1--12 to 48 centimeters (4.7 to 18.9 inches); dark grayish brown (10YR 4/2) broken face clay; moderate medium prismatic parts to moderate medium angular blocky structure; firm, moderately sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout; gradual wavy boundary. Lab sample # 18N06185

Bw2--48 to 82 centimeters (18.9 to 32.3 inches); brown (10YR 4/3) broken face clay; moderate medium prismatic parts to moderate medium angular blocky structure; firm, moderately sticky, moderately plastic; deformable; few medium roots throughout and few fine roots throughout; 1 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 15 percent medium distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries Between peds; gradual wavy boundary. Lab sample # 18N06186

Bss--82 to 100 centimeters (32.3 to 39.4 inches); brown (10YR 5/3) broken face silty clay; moderate medium prismatic parts to moderate medium angular blocky structure; firm, slightly sticky, slightly plastic; deformable; few fine roots throughout; 3 percent slickensides (pedogenic); 1 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 1 percent fine prominent irregular 7.5YR 5/8), moist, masses of oxidized iron with clear boundaries Between peds and 25 percent medium distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries Between peds. Lab sample # 18N06187

Print Date: Oct 14 2018

Description Date: Jul 23 2018

Describer: J. Lene, J. Hancock

**NEON Plot ID:** LENO\_006 **Site ID:** S2018AL023006

Pedon ID: S2018AL023006

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2047

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mantachie, Moreville, Una

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on tread of river valley

on tread of terrace

**Upslope Shape:** concave **Cross Slope Shape:** linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 28 cm.

redox concentrations 28 to 100 cm. cambic horizon 28 to 100 cm.

redox depletions with chroma 2 or less 28 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8141583 **Std Longitude:** -88.1875333

Latitude: 31 degrees 48 minutes 50.97 seconds

าorth

Longitude: 88 degrees 11 minutes 15.12 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 387602 meters **UTM Northing:** 3520451 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind:

Bedrock Depth:

**Bedrock Hardness:** 

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023006 **Pedon ID:** S2018AL023006

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	24.4	225	18.0			1,429		moderately well		

A--0 to 28 centimeters (0.0 to 11.0 inches); dark gray (10YR 4/1) clay; moderate medium subangular blocky structure; very hard, firm, Noncemented, moderately sticky, moderately plastic; semideformable; common fine roots throughout and common coarse roots throughout; 15 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 1 percent fine distinct irregular iron depletions with clear boundaries In matrix and 15 percent fine distinct irregular 5YR 3/4), moist, masses of oxidized iron with clear boundaries In matrix; abrupt smooth boundary. Lab sample # 18N06188

Bw--28 to 50 centimeters (11.0 to 19.7 inches); brown (10YR 5/3) clay; moderate medium subangular blocky structure; hard, firm, Noncemented, moderately sticky, moderately plastic; semideformable; common medium roots throughout and common fine roots throughout and common coarse roots throughout; 2 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 10 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 20 percent fine distinct irregular 10YR 5/1), moist, iron depletions with clear boundaries In matrix; clear wavy boundary. Lab sample # 18N06189

Bg--50 to 100 centimeters (19.7 to 39.4 inches); grayish brown (10YR 5/2) clay; weak medium prismatic parts to weak medium angular blocky structure; hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common very fine roots throughout and common fine roots throughout; distinct pressure faces on vertical faces of peds; 2 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 10 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 10 percent fine distinct irregular 10YR 5/1), moist, iron depletions with clear boundaries In matrix. Lab sample # 18N06190

Print Date: Oct 14 2018

Description Date: Jul 24 2018

Describer: J. Velazquez, M. Williams, S. Depew, M. Singer

**NEON Plot ID:** LENO\_007 **Site ID:** S2018AL023007

Pedon ID: S2018AL023007

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2048

Soil Name as Described/Sampled: Una

Classification: Fine, mixed, active, acid, thermic Typic Epiaquepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mantachie, Mooreville, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on dip river valley

on dip flood plain

Upslope Shape: linear

Cross Slope Shape: concave

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 9 cm.

cambic horizon 9 to 100 cm. redox concentrations 9 to 100 cm.

redox depletions with chroma 2 or less 9 to 100 cm.

**Country:** United States

State: Alabama
County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8124167 **Std Longitude:** -88.2002778

Latitude: 31 degrees 48 minutes 44.70 seconds

north

Longitude: 88 degrees 12 minutes 1.00 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 386393 meters **UTM Northing:** 3520271 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind:

**Bedrock Depth:** 

**Bedrock Hardness:** 

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023007 **Pedon ID:** S2018AL023007

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	11.0	224	18.0			1,429		poorly		

A--0 to 9 centimeters (0.0 to 3.5 inches); very dark grayish brown (10YR 3/2) silty clay; moderate medium angular blocky, and moderate fine angular blocky structure; friable, moderately sticky, moderately plastic; deformable; many medium roots throughout and many fine roots throughout and common coarse roots throughout; gradual smooth boundary. Lab sample # 18N06191

Bg1--9 to 48 centimeters (3.5 to 18.9 inches); gray (10YR 5/1) silty clay loam; weak medium subangular blocky structure; friable, moderately sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout; 35 percent coarse distinct irregular 5YR 4/4), moist, masses of oxidized iron with clear boundaries Between peds; gradual wavy boundary. Lab sample # 18N06192

Bg2--48 to 100 centimeters (18.9 to 39.4 inches); gray (10YR 5/1) silty clay loam; weak medium subangular blocky structure; friable, moderately sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout; 10 percent fine prominent irregular 5YR 5/8), moist, masses of oxidized iron with sharp boundaries In matrix and 35 percent medium distinct irregular 7.5YR 6/8), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06193

Print Date: Oct 14 2018

Description Date: Jul 24 2018

Describer: J. Lene, J. Hancock

NEON Plot ID: LENO\_009

Site ID: S2018AL023009

Pedon ID: S2018AL023009

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2049

Soil Name as Described/Sampled: Mooreville

Classification: Fine-loamy, siliceous, active, thermic Fluvaquentic

Dystrudepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

**Local Physiographic Area:** Choctaw National Wildlife Refuge **Geomorphic Setting:** on riser of flood plain on river valley

**Upslope Shape:** linear **Cross Slope Shape:** linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 17 cm.

cambic horizon 17 to 100 cm. redox concentrations 17 to 100 cm.

redox depletions with chroma 2 or less 17 to 31 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

**Std Latitude:** 31.8114444 **Std Longitude:** -88.1811528

Latitude: 31 degrees 48 minutes 41.20 seconds

าorth

Longitude: 88 degrees 10 minutes 52.15 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 388203 meters **UTM Northing:** 3520144 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: loamy alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

Cont. Site ID: S2018AL023009 Pedon ID: S2018AL023009

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	24.1	250	18.0			1,429		somewhat poorly		

A--0 to 17 centimeters (0.0 to 6.7 inches); dark yellowish brown (10YR 4/4) loam; weak medium subangular blocky structure; slightly hard, friable, Noncemented, slightly sticky, slightly plastic; deformable; many medium roots throughout and many fine roots throughout and common coarse roots throughout; few very fine low-continuity dendritic tubular pores; 5 percent distinct organic stains on surfaces along root channels; 5 percent fine distinct irregular 10YR 4/2), moist, iron depletions with clear boundaries In matrix and 5 percent fine distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix; abrupt wavy boundary. Lab sample # 18N06194

Bw--17 to 31 centimeters (6.7 to 12.2 inches); brown (10YR 5/3) loam; weak medium subangular blocky structure; slightly hard, friable, Noncemented, slightly sticky, slightly plastic; semideformable; common medium roots throughout and few coarse roots throughout; few very fine low-continuity dendritic tubular pores; 2 percent fine distinct spherical weakly cemented 10YR 2/1), moist, iron-manganese concretions with sharp boundaries In matrix and 5 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix and 5 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06195

Bg1--31 to 59 centimeters (12.2 to 23.2 inches); grayish brown (10YR 5/2) clay loam; weak medium prismatic parts to weak medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common fine roots throughout and few coarse roots throughout; few very fine low-continuity dendritic tubular pores; 5 percent distinct 10YR 3/3), moist, organic stains on surfaces along root channels; 5 percent fine distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix and 5 percent fine distinct spherical weakly cemented 10YR 2/1), moist, iron-manganese concretions with sharp boundaries In matrix and 7 percent fine distinct irregular 7.5YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06196

Bg2--59 to 100 centimeters (23.2 to 39.4 inches); grayish brown (10YR 5/2) clay loam; weak medium prismatic parts to weak medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common very fine roots throughout; few very fine low-continuity dendritic tubular pores; 5 percent distinct 10YR 3/3), moist, organic stains on surfaces along root channels and 10 percent faint pressure faces on all faces of peds; 5 percent fine distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix and 5 percent fine distinct spherical weakly cemented 10YR 2/1), moist, iron-manganese concretions with sharp boundaries In matrix and 20 percent fine distinct irregular 7.5YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06197

Print Date: Oct 14 2018 **Description Date:** Jul 20 2018 Describer: Jessica R. Lene **NEON Plot ID: LENO 011** Site ID: S2018AL023011

Pedon ID: S2018AL023011

Site Note: Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within Pit Location: the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2050

Soil Name as Described/Sampled: Mooreville

Classification: Fine-loamy, siliceous, active, thermic Fluvaquentic

**Dystrudepts** 

Soil Name as Correlated:

Classification:

Pedon Type: correlates to named soil Pedon Purpose: ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf flood plain on river valley

**Upslope Shape:** convex Cross Slope Shape: convex

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 5 cm.

cambic horizon 5 to 100 cm.

redox concentrations 16 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Quad Name:

Std Latitude: 31.8258361 Std Longitude: -88.1830861

Latitude: 31 degrees 49 minutes 33.01 seconds

Longitude: 88 degrees 10 minutes 59.11 seconds

Datum: WGS84 UTM Zone: 16

UTM Easting: 388037 meters UTM Northing: 3521741 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

**Bedrock Kind: Bedrock Depth: Bedrock Hardness:** 

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

Cont. Site ID: S2018AL023011 Pedon ID: S2018AL023011

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	28.0	300	18.0			1,429		moderately well	(	(

A--0 to 5 centimeters (0.0 to 2.0 inches); very dark grayish brown (10YR 3/2) broken face clay; strong medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; semideformable; common medium roots throughout and common coarse roots throughout; clear wavy boundary. Lab sample # 18N06198

Bw1--5 to 16 centimeters (2.0 to 6.3 inches); brown (10YR 4/3) broken face clay; strong medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; 5 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; gradual smooth boundary. Lab sample # 18N06199

Bw2--16 to 64 centimeters (6.3 to 25.2 inches); brown (10YR 4/3) broken face clay; strong coarse prismatic parts to moderate medium subangular blocky parts to moderate fine granular structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; 5 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 2 percent medium distinct irregular 5YR 4/6), moist, masses of oxidized iron with sharp boundaries In matrix and 10 percent medium distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix; 2 percent flat rounded indurated 2 to 20-millimeter Quartzite fragments; gradual smooth boundary. Lab sample # 18N06200

Bw3--64 to 100 centimeters (25.2 to 39.4 inches); brown (10YR 4/3) broken face clay loam; strong coarse prismatic parts to moderate medium subangular blocky parts to moderate fine granular structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common fine roots throughout; 10 percent faint pressure faces on all faces of peds; 15 percent medium distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix. Lab sample # 18N06201

Print Date: Oct 14 2018

Description Date: Jul 19 2018

Describer: J. Lene, J. Hancock

NEON Plot ID: LENO\_012

Site ID: S2018AL023012

Pedon ID: S2018AL023012

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2051

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf flood plain on river valley

**Upslope Shape:** linear **Cross Slope Shape:** convex

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 18 cm.

redox concentrations 18 to 100 cm.

redox depletions with chroma 2 or less 18 to 100 cm.

cambic horizon 18 to 100 cm.

Country: United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

Std Latitude: 31.8081000 Std Longitude: -88.1800611

Latitude: 31 degrees 48 minutes 29.16 seconds

north

Longitude: 88 degrees 10 minutes 48.22 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 388302 meters **UTM Northing:** 3519772 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023012 **Pedon ID:** S2018AL023012

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Davs	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.5	24.1	225	18.0			1,429		somewhat poorly	(	(1123213)

A--0 to 18 centimeters (0.0 to 7.1 inches); very dark grayish brown (10YR 3/2) clay loam; strong medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; semideformable; common fine roots throughout and common coarse roots throughout; common very fine low-continuity dendritic tubular pores; 15 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 2 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 5 percent fine distinct irregular 10YR 4/3), moist, iron depletions with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06202

Bw--18 to 40 centimeters (7.1 to 15.7 inches); brown (10YR 5/3) clay; weak medium prismatic parts to moderate coarse angular blocky structure; hard, firm, Noncemented, very sticky, very plastic; semideformable; common very coarse roots throughout and common fine roots throughout; common very fine low-continuity dendritic tubular pores; 5 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 10 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 15 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix; 2 percent krotovinas (volume percent); clear wavy boundary. Lab sample # 18N06203

Bg--40 to 100 centimeters (15.7 to 39.4 inches); grayish brown (10YR 5/2) clay; moderate medium prismatic parts to moderate medium angular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; common very fine low-continuity dendritic tubular pores; distinct pressure faces on vertical faces of peds; 5 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix and 20 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06204

Print Date: Oct 14 2018

**Description Date:** Jul 24 2018

Describer: M. Williams, J. Velazquez, S. Depew, M. Singer

**NEON Plot ID:** LENO\_014 **Site ID:** S2018AL023014

Pedon ID: S2018AL023014

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2052

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Mantachie, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf river valley

on talf flood plain

**Upslope Shape:** linear **Cross Slope Shape:** linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 13 cm.

redox depletions with chroma 2 or less 0 to 100 cm.

redox concentrations 13 to 100 cm. cambic horizon 13 to 100 cm.

**Country:** United States

State: Alabama
County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8105000 **Std Longitude:** -88.1992222

Latitude: 31 degrees 48 minutes 37.80 seconds

north

Longitude: 88 degrees 11 minutes 57.20 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 386491 meters **UTM Northing:** 3520058 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth:

Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023014 **Pedon ID:** S2018AL023014

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	11.0	270	18.0			1,429		poorly		

A--0 to 13 centimeters (0.0 to 5.1 inches); dark grayish brown (10YR 4/2) silty clay; moderate medium angular blocky, and moderate fine angular blocky structure; friable, moderately sticky, moderately plastic; deformable; many medium roots throughout and many fine roots throughout and few coarse roots throughout; 1 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix; gradual smooth boundary. Lab sample # 18N06205

Bw--13 to 48 centimeters (5.1 to 18.9 inches); brown (10YR 4/3) clay; weak medium prismatic parts to weak fine angular blocky structure; firm, moderately sticky, moderately plastic; deformable; few medium roots throughout and few fine roots throughout; 5 percent distinct pressure faces on vertical faces of peds; 1 percent fine distinct irregular 7.5YR 4/4), moist, masses of oxidized iron with clear boundaries In matrix and 25 percent coarse distinct irregular 10YR 5/2), moist, iron depletions with diffuse boundaries In matrix; gradual wavy boundary. Lab sample # 18N06206

Bg--48 to 100 centimeters (18.9 to 39.4 inches); gray (10YR 5/1) clay; weak medium prismatic parts to weak fine angular blocky structure; firm, moderately sticky, moderately plastic; deformable; few fine roots throughout; 5 percent distinct pressure faces on vertical faces of peds; 18 percent medium distinct irregular 10YR 5/8), moist, and 10YR 4/3), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06207

Print Date: Oct 14 2018 **Description Date:** Jul 25 2018 Describer: J. Lene, J. Hancock **NEON Plot ID: LENO 015** Site ID: S2018AL023015

Pedon ID: S2018AL023015

Site Note: Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within Pit Location: the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2053

Soil Name as Described/Sampled: Mooreville

Classification: Fine-loamy, siliceous, active, thermic Fluvaquentic

**Dystrudepts** 

Soil Name as Correlated:

Classification:

Pedon Type: correlates to named soil Pedon Purpose: ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on riser of terrace on river valley

**Upslope Shape:** linear Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 18 cm.

cambic horizon 18 to 100 cm.

redox depletions with chroma 2 or less 18 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Quad Name:

Std Latitude: 31.8157778 Std Longitude: -88.1916417

Latitude: 31 degrees 48 minutes 56.80 seconds

Longitude: 88 degrees 11 minutes 29.91 seconds

Datum: WGS84 UTM Zone: 16

UTM Easting: 387215 meters **UTM Northing:** 3520635 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

**Bedrock Kind: Bedrock Depth: Bedrock Hardness:** 

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023015 **Pedon ID:** S2018AL023015

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	15.0	250	18.0			1,429		well		

A--0 to 18 centimeters (0.0 to 7.1 inches); very dark grayish brown (10YR 3/2) broken face clay; weak medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; semideformable; common very fine roots throughout and common fine roots throughout; 2 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix; clear smooth boundary. Lab sample # 18N06208

Bw1--18 to 47 centimeters (7.1 to 18.5 inches); brown (10YR 4/3) broken face clay; moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout and few coarse roots throughout; 5 percent medium distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix and 5 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix; abrupt smooth boundary. Lab sample # 18N06209

Bw2--47 to 100 centimeters (18.5 to 39.4 inches); brown (10YR 4/3) broken face clay; weak coarse prismatic parts to moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; 10 percent faint pressure faces on all faces of peds; 5 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 15 percent medium distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries Between peds. Lab sample # 18N06210

Print Date: Oct 14 2018

Description Date: Jul 23 2018 Describer: J. Lene, J. Hancock NEON Plot ID: LENO\_016 Site ID: S2018AL023016

Pedon ID: S2018AL023016

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2054

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Mantachie, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on riser of terrace on river valley

**Upslope Shape:** linear **Cross Slope Shape:** convex

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 16 cm.

redox concentrations 0 to 100 cm. cambic horizon 16 to 100 cm.

redox depletions with chroma 2 or less 16 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8177944 **Std Longitude:** -88.1845778

Latitude: 31 degrees 49 minutes 4.06 seconds

าorth

Longitude: 88 degrees 11 minutes 4.48 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 387886 meters **UTM Northing:** 3520851 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023016 **Pedon ID:** S2018AL023016

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	22.9	160	18.0			1,429		poorly		

A--0 to 16 centimeters (0.0 to 6.3 inches); dark yellowish brown (10YR 4/4) clay loam; strong medium subangular blocky structure; hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout and common coarse roots throughout; 5 percent medium distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries Between peds and 5 percent medium distinct irregular 10YR 6/2), moist, iron depletions with clear boundaries Between peds and 5 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix; clear smooth boundary. Lab sample # 18N06211

Bg1--16 to 34 centimeters (6.3 to 13.4 inches); gray (10YR 5/1) clay; moderate medium prismatic parts to moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; 2 percent faint clay films on all faces of peds and 2 percent faint pressure faces on all faces of peds; 5 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 20 percent coarse distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries Between peds; gradual wavy boundary. Lab sample # 18N06212

Bg2--34 to 65 centimeters (13.4 to 25.6 inches); 5/2 5/2) clay; moderate medium prismatic parts to moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; 2 percent faint clay films on all faces of peds and 2 percent faint pressure faces on all faces of peds; 2 percent very fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 40 percent medium distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix; gradual wavy boundary. Lab sample # 18N06213

Bg3--65 to 100 centimeters (25.6 to 39.4 inches); 5/1 5/1) clay; strong medium prismatic parts to strong medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common very fine roots throughout; 10 percent distinct clay films on all faces of peds; 20 percent fine prominent irregular 7.5YR 4/6), moist, masses of oxidized iron with sharp boundaries In matrix. Lab sample # 18N06214

Print Date: Oct 14 2018

Description Date: Jul 22 2018

Describer: Jessica R. Lene

NEON Plot ID: LENO\_017

Site ID: S2018AL023017

Pedon ID: S2018AL023017

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2055

Soil Name as Described/Sampled: Mooreville

Classification: Fine-loamy, siliceous, active, thermic Fluvaquentic

Dystrudepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on tread of terrace on river valley

Upslope Shape: convex Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 23 cm.

cambic horizon 23 to 100 cm.

redox depletions with chroma 2 or less 23 to 69 cm.

redox concentrations 23 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

**Std Latitude:** 31.8416583 **Std Longitude:** -88.1684500

Latitude: 31 degrees 50 minutes 29.97 seconds

าorth

Longitude: 88 degrees 10 minutes 6.42 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 389441 meters **UTM Northing:** 3523480 meters

**Primary Earth Cover:** Tree cover **Secondary Earth Cover:** Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023017 **Pedon ID:** S2018AL023017

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	10.4	300	18.0			1,429		moderately well		

A--0 to 23 centimeters (0.0 to 9.1 inches); brown (10YR 4/3) broken face clay loam; strong coarse subangular blocky parts to moderate medium subangular blocky structure; moderately hard, firm, Noncemented, slightly sticky, moderately plastic; semideformable; common medium roots throughout and common coarse roots throughout; few fine low-continuity dendritic tubular pores; clear wavy boundary. Lab sample # 18N06215

Bw--23 to 46 centimeters (9.1 to 18.1 inches); brown (10YR 4/3) broken face sandy clay loam; strong coarse subangular blocky parts to moderate medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout and common coarse roots throughout; few fine low-continuity dendritic tubular pores; 5 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 2 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 5 percent fine distinct irregular iron depletions with clear boundaries Lining pores and 5 percent fine distinct irregular masses of oxidized iron with clear boundaries In matrix; abrupt wavy boundary. Lab sample # 18N06216

Ab--46 to 69 centimeters (18.1 to 27.2 inches); very dark grayish brown (10YR 3/2) broken face clay loam; strong medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common fine roots throughout; few fine low-continuity dendritic tubular pores; 5 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 2 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 5 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 5 percent fine distinct irregular 10YR 6/2), moist, iron depletions with clear boundaries In matrix; abrupt wavy boundary. Lab sample # 18N06217

Bgb--69 to 100 centimeters (27.2 to 39.4 inches); light brownish gray (10YR 6/2) broken face sandy clay loam; moderate medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, very plastic; deformable; common very fine roots throughout and common fine roots throughout; common very fine low-continuity dendritic tubular and few fine low-continuity dendritic tubular pores; 5 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 15 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 15 percent fine distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06218

Print Date: Oct 14 2018

Description Date: Jul 25 2018

Describer: J. Lene, J. Hancock

NEON Plot ID: LENO\_019

Site ID: S2018AL023019

Pedon ID: S2018AL023019

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2056

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on tread of terrace on river valley

Upslope Shape: linear Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 17 cm.

redox depletions with chroma 2 or less 17 to 38 cm.

redox concentrations 17 to 100 cm. cambic horizon 17 to 100 cm.

Country: United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

**Std Latitude:** 31.8187000 **Std Longitude:** -88.1947750

Latitude: 31 degrees 49 minutes 7.32 seconds

าorth

Longitude: 88 degrees 11 minutes 41.19 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 386922 meters **UTM Northing:** 3520962 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

Cont. Site ID: S2018AL023019 Pedon ID: S2018AL023019

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	32.3	90	18.0			1,429		somewhat poorly		

A--0 to 17 centimeters (0.0 to 6.7 inches); very dark grayish brown (10YR 3/2) clay; moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; semideformable; common fine roots throughout and common coarse roots throughout; common very fine low-continuity dendritic tubular pores; 15 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; 2 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 5 percent fine distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06219

Bw--17 to 38 centimeters (6.7 to 15.0 inches); dark grayish brown (10YR 4/2) clay; moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; semideformable; common medium roots throughout and common fine roots throughout; common very fine low-continuity dendritic tubular pores; 5 percent distinct organic stains on surfaces along root channels and 10 percent distinct pressure faces on vertical faces of peds; 2 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 5 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix and 10 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix; 2 percent krotovinas (volume percent); clear wavy boundary. Lab sample # 18N06220

Bg--38 to 100 centimeters (15.0 to 39.4 inches); grayish brown (10YR 5/2) clay; weak coarse prismatic parts to moderate medium subangular blocky structure; hard, firm, Noncemented, very sticky, very plastic; deformable; common very fine roots throughout and common fine roots throughout; common very fine low-continuity dendritic tubular pores; 5 percent distinct organic stains on surfaces along root channels and 10 percent distinct pressure faces on vertical faces of peds; 2 percent fine distinct spherical weakly cemented iron-manganese concretions with sharp boundaries In matrix and 5 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries In matrix and 20 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06221

Print Date: Oct 14 2018

Description Date: Jul 19 2018

Describer: Jessica R. Lene

NEON Plot ID: LENO\_020

Site ID: S2018AL023020

Pedon ID: S2018AL023020

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2057

Soil Name as Described/Sampled: Lenoir

Classification: Fine, mixed, semiactive, thermic Aeric Paleaguults

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on dip flood plain on river valley

**Upslope Shape:** concave **Cross Slope Shape:** concave

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 12 cm.

cambic horizon 12 to 32 cm.

redox depletions with chroma 2 or less 12 to 100 cm.

redox concentrations 12 to 100 cm. argillic horizon 32 to 100 cm.

Country: United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

Std Latitude: 31.8247444 Std Longitude: -88.1926222

Latitude: 31 degrees 49 minutes 29.08 seconds

าorth

Longitude: 88 degrees 11 minutes 33.44 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 387133 meters **UTM Northing:** 3521630 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023020 **Pedon ID:** S2018AL023020

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	32.6	345	18.0			1,429		moderately well		

A--0 to 12 centimeters (0.0 to 4.7 inches); dark grayish brown (10YR 4/2) broken face; moderate medium subangular blocky parts to strong fine granular structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; many medium roots throughout and many fine roots throughout; gradual smooth boundary. Lab sample # 18N06222

Bw--12 to 32 centimeters (4.7 to 12.6 inches); brown (10YR 4/3) broken face; moderate medium subangular blocky parts to strong fine granular structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; many medium roots throughout and many coarse roots throughout; 5 percent medium distinct irregular 10YR 5/1), moist, iron depletions with clear boundaries On surfaces along root channels and 5 percent medium distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries On surfaces along root channels; gradual smooth boundary. Lab sample # 18N06223

Bt1--32 to 60 centimeters (12.6 to 23.6 inches); brown (10YR 4/3) broken face; moderate medium subangular blocky parts to strong fine granular structure; hard, very firm, Noncemented, very sticky, very plastic; common very fine roots throughout and common fine roots throughout; 5 percent medium distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries On vertical faces of peds and 15 percent medium distinct irregular 10YR 5/1), moist, iron depletions with clear boundaries On vertical faces of peds; gradual smooth boundary. Lab sample # 18N06224

Bt2--60 to 75 centimeters (23.6 to 29.5 inches); brown (10YR 4/3) broken face; moderate medium subangular blocky parts to strong fine granular structure; hard, very firm, Noncemented, very sticky, very plastic; many medium roots throughout and common fine roots throughout; 10 percent medium distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries On vertical faces of peds and 15 percent medium distinct irregular 10YR 5/1), moist, iron depletions with clear boundaries On vertical faces of peds; gradual smooth boundary. Lab sample # 18N06225

Bt3--75 to 100 centimeters (29.5 to 39.4 inches); brown (10YR 4/3) broken face; moderate medium subangular blocky parts to strong fine granular structure; hard, very firm, Noncemented, very sticky, very plastic; common very fine roots throughout and common fine roots throughout; 20 percent medium distinct irregular 10YR 5/1), moist, iron depletions with clear boundaries On vertical faces of peds and 20 percent medium distinct irregular 5YR 4/6), moist, masses of oxidized iron with clear boundaries On vertical faces of peds. Lab sample # 18N06226

Print Date: Oct 14 2018

Description Date: Jul 20 2018

Describer: J. Lene, J. Hancock

NEON Plot ID: LENO\_021

Site ID: S2018AL023021

Pedon ID: S2018AL023021

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2058

Soil Name as Described/Sampled: Mooreville

Classification: Fine-loamy, siliceous, active, thermic Fluvaquentic

**Dystrudepts** 

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on dip flood plain on river valley

**Upslope Shape:** concave **Cross Slope Shape:** concave

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 9 cm.

redox depletions with chroma 2 or less 9 to 68 cm.

cambic horizon 9 to 100 cm. redox concentrations 9 to 100 cm.

Country: United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

**Std Latitude:** 31.8344333 **Std Longitude:** -88.1703139

Latitude: 31 degrees 50 minutes 3.96 seconds

าorth

Longitude: 88 degrees 10 minutes 13.13 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 389256 meters **UTM Northing:** 3522681 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: fine-loamy alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

Cont. Site ID: S2018AL023021 Pedon ID: S2018AL023021

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	53.9	0	18.0			1,429		moderately well		

A--0 to 9 centimeters (0.0 to 3.5 inches); very dark grayish brown (10YR 3/2) broken face clay loam; moderate medium granular, and moderate fine granular structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; semideformable; common medium roots throughout and many fine roots throughout and few coarse roots throughout; clear smooth boundary. Lab sample # 18N06227

Bw1--9 to 26 centimeters (3.5 to 10.2 inches); brown (10YR 4/3) broken face clay loam; moderate medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; few medium roots throughout and few fine roots throughout and few coarse roots throughout; 5 percent fine distinct irregular 10YR 6/2), moist, iron depletions with clear boundaries In matrix and 5 percent fine distinct irregular 5YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06228

Bw2--26 to 68 centimeters (10.2 to 26.8 inches); dark yellowish brown (10YR 4/6) broken face sandy clay loam; strong medium subangular blocky structure; hard, very firm, Noncemented, slightly sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout; 10 percent distinct 10YR 2/1), moist, organic stains on all faces of peds; 20 percent fine distinct irregular 10YR 6/2), moist, iron depletions with clear boundaries In matrix and 20 percent fine distinct irregular 5YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix; clear smooth boundary. Lab sample # 18N06229

Bg--68 to 100 centimeters (26.8 to 39.4 inches); grayish brown (10YR 5/2) clay loam; moderate medium subangular blocky structure; moderately hard, firm, Noncemented, slightly sticky, moderately plastic; deformable; few fine roots throughout; 10 percent distinct 10YR 3/3), moist, organic stains on surfaces along root channels; 40 percent fine distinct irregular 5YR 5/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06230

Print Date: Oct 14 2018

**Description Date:** Jul 25 2018

Describer: J. Velazquez, M. Williams, S. Depew, M. Singer

**NEON Plot ID:** LENO\_022 **Site ID:** S2018AL023022

Pedon ID: S2018AL023022

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2059

Soil Name as Described/Sampled: Mantachie

Classification: Fine-loamy, siliceous, active, acid, thermic Fluventic

Endoaquepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on rise river valley

on rise flood plain

**Upslope Shape:** concave **Cross Slope Shape:** linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 10 cm.

redox concentrations 0 to 100 cm.

redox depletions with chroma 2 or less 10 to 100 cm.

cambic horizon 10 to 100 cm.

Country: United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8154167 **Std Longitude:** -88.2043333

Latitude: 31 degrees 48 minutes 55.50 seconds

north

Longitude: 88 degrees 12 minutes 15.60 seconds

west

Datum: WGS84 UTM Zone: 16

UTM Easting: 386013 meters UTM Northing: 3520608 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: loamy alluvium

Bedrock Kind: Bedrock Depth:

Bedrock Hardness:

**Bedrock Fracture Interval:** 

Surface Fragments:

**Cont. Site ID:** S2018AL023022 **Pedon ID:** S2018AL023022

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
2.0	11.0	90	18.0			1,429		somewhat poorly		

A--0 to 10 centimeters (0.0 to 3.9 inches); brown (10YR 4/3) loam; weak fine subangular blocky, and weak medium subangular blocky structure; friable, nonsticky, nonplastic; deformable; many medium roots throughout and many fine roots throughout; 1 percent fine distinct irregular 7.5YR 6/6), moist, masses of oxidized iron with clear boundaries In matrix; gradual smooth boundary. Lab sample # 18N06231

Bw--10 to 42 centimeters (3.9 to 16.5 inches); 40 percent light brownish gray (10YR 6/2) and 30 percent brownish yellow (10YR 6/6) and 30 percent yellowish brown (10YR 5/8) clay loam; weak coarse subangular blocky structure; friable, nonsticky, nonplastic; deformable; common medium roots throughout and common fine roots throughout and few coarse roots throughout; 15 percent fine prominent irregular 5YR 5/8), moist, masses of oxidized iron with sharp boundaries In matrix and 30 percent medium distinct irregular 10YR 6/6), moist, masses of oxidized iron with clear boundaries In matrix and 40 percent medium faint irregular 10YR 6/2), moist, iron depletions with clear boundaries In matrix; gradual wavy boundary. Lab sample # 18N06232

Bg--42 to 100 centimeters (16.5 to 39.4 inches); light brownish gray (10YR 6/2) very fine sandy loam; weak coarse subangular blocky structure; friable, nonsticky, nonplastic; deformable; common medium roots throughout and common fine roots throughout and few coarse roots throughout; 15 percent fine prominent irregular 7.5YR 5/8), moist, masses of oxidized iron with clear boundaries In matrix and 30 percent medium distinct irregular 10YR 5/8), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06233

Print Date: Oct 14 2018

Description Date: Jul 25 2018

Describer: J. Lene, J. Hancock

NEON Plot ID: LENO\_023

Site ID: S2018AL023023

Pedon ID: S2018AL023023

**Site Note:** Site sampled 1.5 meter 195 degrees of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Joxelle Velazquez.

Pedon Note:

Lab Source ID: KSSL Lab Pedon #: 18N2060

Soil Name as Described/Sampled: Riverview

Classification: Fine-loamy, active, thermic Fluventic Dystrudepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf river valley

on talf flood plain

**Upslope Shape:** linear **Cross Slope Shape:** linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 10 cm.

redox concentrations 0 to 10 cm. cambic horizon 10 to 100 cm. redox concentrations 27 to 100 cm.

**Country:** United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain
Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8088583 **Std Longitude:** -88.1800694

Latitude: 31 degrees 48 minutes 31.89 seconds

าorth

Longitude: 88 degrees 10 minutes 48.25 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 388302 meters **UTM Northing:** 3519856 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: fine-loamy alluvium

Bedrock Kind: Bedrock Depth:

**Bedrock Hardness:** 

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

Cont. Site ID: S2018AL023023 Pedon ID: S2018AL023023

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
1.0	33.5	240	18.0			1,429		well		

A--0 to 10 centimeters (0.0 to 3.9 inches); very dark grayish brown (10YR 3/2) broken face loam; moderate medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; semideformable; many very fine roots throughout and many medium roots throughout and many fine roots throughout; common fine low-continuity dendritic tubular pores; 2 percent medium distinct irregular iron depletions with diffuse boundaries On vertical faces of peds and 5 percent medium distinct irregular 10YR 4/3), moist, iron depletions with diffuse boundaries On vertical faces of peds; clear smooth boundary. Lab sample # 18N06234

Bw--10 to 27 centimeters (3.9 to 10.6 inches); dark yellowish brown (10YR 4/4) broken face very fine sandy loam; moderate medium subangular blocky structure; slightly hard, firm, Noncemented, slightly sticky, slightly plastic; deformable; common very fine roots throughout and common medium roots throughout and many fine roots throughout; common fine low-continuity dendritic tubular pores; clear wavy boundary. Lab sample # 18N06235

Ab--27 to 52 centimeters (10.6 to 20.5 inches); very dark grayish brown (10YR 3/2) broken face clay loam; 40 percent medium distinct irregular (10YR 4/4) mottles; moderate medium subangular blocky structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; deformable; common medium roots throughout and common fine roots throughout; common medium low-continuity dendritic tubular pores; 5 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 5 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix; gradual wavy boundary. Lab sample # 18N06236

Bwb--52 to 100 centimeters (20.5 to 39.4 inches); dark yellowish brown (10YR 4/4) broken face clay; moderate medium subangular blocky structure; hard, very firm, Noncemented, very sticky, very plastic; deformable; common very fine roots throughout; common fine low-continuity dendritic tubular pores; 2 percent fine prominent irregular extremely weakly cemented 10YR 2/1), moist, manganese masses with sharp boundaries In matrix and 5 percent fine distinct irregular 10YR 5/3), moist, iron depletions with clear boundaries In matrix and 5 percent fine distinct irregular 7.5YR 4/6), moist, masses of oxidized iron with clear boundaries In matrix. Lab sample # 18N06237

Print Date: Oct 14 2018

**Description Date:** Jul 25 2018

Describer: M. Williams, J. Velazquez, S. Depew, M. Singer

**NEON Plot ID:** LENO\_027 **Site ID:** S2018AL023027

Pedon ID: S2018AL023027

**Site Note:** Site sampled 1 meter south and 1 meter west of SW\_31. Photographs of the soil profile, as well as significant features within the

profile has been documented by Joxelle Velazquez.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2061

Soil Name as Described/Sampled: Urbo

Classification: Fine, mixed, active, acid, thermic Vertic Epiaguepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mantachie, Moorevillle, Una

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on rise river valley

on rise flood plain

Upslope Shape: linear

Cross Slope Shape: linear

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

**Diagnostic Features:** ochric epipedon 0 to 13 cm.

cambic horizon 13 to 100 cm. redox concentrations 13 to 100 cm.

redox depletions with chroma 2 or less 13 to 100 cm.

slickensides 76 to 100 cm.

**Country:** United States

State: Alabama
County: Choctaw

MLRA: 133A -- Southern Coastal Plain Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name: Coffeeville Lock And Dam, Alabama

**Std Latitude:** 31.8168056 **Std Longitude:** -88.2002778

Latitude: 31 degrees 49 minutes 0.50 seconds

north

Longitude: 88 degrees 12 minutes 1.00 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 386399 meters **UTM Northing:** 3520758 meters

Primary Earth Cover: Tree cover Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: clayey alluvium

Bedrock Kind: Bedrock Depth:

Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023027 **Pedon ID:** S2018AL023027

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	11.0	196	18.0			1,429		somewhat poorly		

A--0 to 13 centimeters (0.0 to 5.1 inches); very dark grayish brown (10YR 3/2) silty clay loam; weak fine subangular blocky, and weak medium subangular blocky structure; friable, slightly sticky, slightly plastic; deformable; few very fine roots throughout and very few very coarse roots throughout and many medium roots throughout and many fine roots throughout; gradual smooth boundary. Lab sample # 18N06238

Bw--13 to 42 centimeters (5.1 to 16.5 inches); brown (10YR 4/3) clay; moderate medium prismatic parts to weak medium angular blocky structure; firm, moderately sticky, moderately plastic; deformable; few very fine roots throughout and very few very coarse roots throughout and common medium roots throughout and few fine roots throughout; 8 percent medium distinct irregular 10YR 3/2), moist, masses of oxidized iron with clear boundaries Throughout and 15 percent fine distinct irregular 10YR 5/2), moist, iron depletions with clear boundaries Throughout; gradual wavy boundary. Lab sample # 18N06239

Bg--42 to 76 centimeters (16.5 to 29.9 inches); dark grayish brown (10YR 4/2) clay; moderate very coarse prismatic parts to moderate medium angular blocky structure; very firm, very sticky, very plastic; deformable; common medium roots throughout and common fine roots throughout; 5 percent distinct pressure faces on vertical faces of peds; 15 percent medium distinct irregular 10YR 3/2), moist, masses of oxidized iron with clear boundaries Throughout; gradual wavy boundary. Lab sample # 18N06240

Bssg--76 to 100 centimeters (29.9 to 39.4 inches); gray (10YR 5/1) clay; moderate very coarse prismatic parts to moderate coarse angular blocky structure; very firm, very sticky, very plastic; deformable; 3 percent distinct slickensides (pedogenic) on vertical faces of peds and 5 percent distinct pressure faces on vertical faces of peds; 1 percent fine prominent irregular 5YR 5/6), moist, masses of oxidized iron with clear boundaries Throughout and 30 percent medium distinct irregular 10YR 4/3), moist, masses of oxidized iron with clear boundaries Throughout. Lab sample # 18N06241

Print Date: Oct 14 2018

Description Date: Jul 21 2018

Describer: J. Lene

**NEON Plot ID:** LENO\_029 **Site ID:** S2018AL023029

Pedon ID: S2018AL023029

**Site Note:** Site sampled 1 meter south and 1 meter west (225 degrees) of SW\_31. Photographs of the soil profile, as well as significant features within the profile has been documented by Jessica Lene.

**Pedon Note:** 

Lab Source ID: KSSL Lab Pedon #: 18N2062

Soil Name as Described/Sampled: Riverview

Classification: Fine-loamy, mixed, active, thermic Fluventic Dystrudepts

Soil Name as Correlated:

Classification:

**Pedon Type:** correlates to named soil **Pedon Purpose:** ecological site data

Taxon Kind: series

Associated Soils: Kinston, Mooreville, Una, Urbo

Physiographic Division: Atlantic Plain Physiographic Province: Coastal Plain

Physiographic Section: East Gulf Coastal plain

State Physiographic Area:

Local Physiographic Area: Choctaw National Wildlife Refuge

Geomorphic Setting: on talf flood plain on river valley

Upslope Shape: linear Cross Slope Shape: convex

Particle Size Control Section: 25 to 100 cm.

**Description origin: NASIS** 

Diagnostic Features: ochric epipedon 0 to 12 cm.

cambic horizon 12 to 32 cm.

redox depletions with chroma 2 or less 12 to 100 cm.

redox concentrations 12 to 100 cm. argillic horizon 32 to 100 cm.

Country: United States

State: Alabama County: Choctaw

MLRA: 133A -- Southern Coastal Plain Soil Survey Area: AL023 -- Choctaw County,

Alabama

7-MER -- Meridian, Mississippi

Map Unit: UrB -- Urbo-Mooreville-Una complex, 0

to 3 percent slopes, frequently flooded

Pit Location:

Quad Name:

**Std Latitude:** 31.8308083 **Std Longitude:** -88.1711139

Latitude: 31 degrees 49 minutes 50.91 seconds

north

Longitude: 88 degrees 10 minutes 16.01 seconds

west

Datum: WGS84 UTM Zone: 16

**UTM Easting:** 389176 meters **UTM Northing:** 3522280 meters

Primary Earth Cover: Tree cover
Secondary Earth Cover: Hardwoods

**Existing Vegetation:** 

Parent Material: fine-loamy alluvium

Bedrock Kind: Bedrock Depth: Bedrock Hardness:

**Bedrock Fracture Interval:** 

**Surface Fragments:** 

**Cont. Site ID:** S2018AL023029 **Pedon ID:** S2018AL023029

Slope (%)	Elevation (meters)	Aspect (deg)	MAAT (C)	MSAT (C)	MWAT (C)	MAP (mm)	Frost-Free Days	Drainage Class	Slope Length (meters)	Upslope Length (meters)
0.5	13.0	5	18.0			1,429		well		

A--0 to 34 centimeters (0.0 to 13.4 inches); brown (10YR 4/3) broken face fine sandy loam; moderate fine granular structure; moderately hard, firm, Noncemented, moderately sticky, moderately plastic; common medium roots throughout and common fine roots throughout and many coarse roots throughout; many medium low-continuity tubular pores; 10 percent distinct 10YR 2/1), moist, organic stains on surfaces along root channels; abrupt smooth boundary. Lab sample # 18N06242

Bw--34 to 81 centimeters (13.4 to 31.9 inches); dark brown (10YR 3/3) broken face clay loam; moderate medium subangular blocky structure; hard, very firm, Noncemented, very sticky, very plastic; common very fine roots throughout; abrupt wavy boundary. Lab sample # 18N06243

C--81 to 100 centimeters (31.9 to 39.4 inches); brown (10YR 4/3) broken face clay loam; weak medium subangular blocky parts to weak fine granular structure; hard, very firm, Noncemented, very sticky, very plastic; many medium roots throughout and common fine roots throughout; . Lab sample # 18N06244