

**APPROVED JURISDICTIONAL DETERMINATION FORM  
U.S. Army Corps of Engineers**

## SECTION I: BACKGROUND INFORMATION

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**A. REPORT COMPLETION DATE FOR APPROVED JURISDICTIONAL DETERMINATION (JD):** 10-Nov-2008

**B. DISTRICT OFFICE, FILE NAME, AND NUMBER:** Nashville District, LRN-2008-01592-JD1

**C. PROJECT LOCATION AND BACKGROUND INFORMATION:**

State : AL - Alabama  
 County/parish/borough: Morgan  
 City:  
 Lat:  
 Long:  
 Universal Transverse Mercator Folder UTM List  
*UTM list determined by folder location*  
 • NAD83 / UTM zone 36S  
Waters UTM List  
*UTM list determined by waters location*  
 • NAD83 / UTM zone 36S

Name of nearest waterbody: Village Branch  
 Name of nearest Traditional Navigable Water (TNW): Wheeler Lake  
 Name of watershed or Hydrologic Unit Code (HUC): 6030002

Check if map/diagram of review area and/or potential jurisdictional areas is/are available upon request.

Check if other sites (e.g., offsite mitigation sites, disposal sites, etc.) are associated with the action and are recorded on a different JD form.

**D. REVIEW PERFORMED FOR SITE EVALUATION:**

Office Determination Date: 10-Nov-2008  
 Field Determination Date (s): 21-Oct-2008

## SECTION II: SUMMARY OF FINDINGS

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**A. RHA SECTION 10 DETERMINATION OF JURISDICTION**

There  "navigable waters of the U.S." within Rivers and Harbors Act (RHA) jurisdiction (as defined by 33 CFR part 329) in the review area.

Waters subject to the ebb and flow of the tide.

Waters are presently used, or have been used in the past, or may be susceptible for use to transport interstate or foreign commerce.

Explain:

**B. CWA SECTION 404 DETERMINATION OF JURISDICTION.**

There  "waters of the U.S." within Clean Water Act (CWA) jurisdiction (as defined by 33 CFR part 328) in the review area.

**1. Waters of the U.S.****a. Indicate presence of waters of U.S. in review area:<sup>1</sup>**

| Water Name                          | Water Type(s) Present  |
|-------------------------------------|--|
| Abutting Wetlands of Village Branch | Wetlands directly abutting RPWs that flow directly or indirectly into TNWs |

**b. Identify (estimate) size of waters of the U.S. in the review area:**

Area: (m<sup>2</sup>)

Linear: (m)

**c. Limits (boundaries) of jurisdiction:**

based on:

OHWM Elevation: (if known)

**2. Non-regulated waters/wetlands:<sup>3</sup>**

Potentially jurisdictional waters and/or wetlands were assessed within the review area and determined to be not jurisdictional. Explain:

**SECTION III: CWA ANALYSIS****A. TNWs AND WETLANDS ADJACENT TO TNWs****1. TNW**

Not Applicable.

**2. Wetland Adjacent to TNW**

Not Applicable.

**B. CHARACTERISTICS OF TRIBUTARY (THAT IS NOT A TNW) AND ITS ADJACENT WETLANDS (IF ANY):****1. Characteristics of non-TNWs that flow directly or indirectly into TNW****(i) General Area Conditions:**

Watershed size:

Drainage area:

Average annual rainfall: inches

Average annual snowfall: inches

**(ii) Physical Characteristics****(a) Relationship with TNW:**

Tributary flows directly into TNW.

Tributary flows through  tributaries before entering TNW.

:Number of tributaries

Project waters are  river miles from TNW.

Project waters are  river miles from RPW.

Project Waters are  aerial (straight) miles from TNW.

Project waters are  aerial(straight) miles from RPW.

Project waters cross or serve as state boundaries.

Explain:

Identify flow route to TNW:<sup>5</sup>

**Tributary Stream Order, if known:**

Not Applicable.

**(b) General Tributary Characteristics:****Tributary is:**

Not Applicable.

**Tributary properties with respect to top of bank (estimate):**

Not Applicable.

**Primary tributary substrate composition:**

Not Applicable.

**Tributary (conditions, stability, presence, geometry, gradient):**

Not Applicable.

**(c) Flow:**

Not Applicable.

**Surface Flow is:**

Not Applicable.

**Subsurface Flow:**

Not Applicable.

**Tributary has:**

Not Applicable.

**If factors other than the OHWM were used to determine lateral extent of CWA jurisdiction:****High Tide Line indicated by:**

Not Applicable.

**Mean High Water Mark indicated by:**

Not Applicable.

**(iii) Chemical Characteristics:****Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).**

Not Applicable.

**(iv) Biological Characteristics. Channel supports:**

Not Applicable.

**2. Characteristics of wetlands adjacent to non-TNW that flow directly or indirectly into TNW****(i) Physical Characteristics:****(a) General Wetland Characteristics:****Properties:**

| Wetland Name                        | Size (Acres) | Wetland Type                              | Wetland Quality | Cross or Serve as State Boundaries. Explain |
|-------------------------------------|--------------|---|-----------------|---|
| Abutting Wetlands of Village Branch | 16           | slope and riverine, wooded and herbaceous | good            | -   |

**(b) General Flow Relationship with Non-TNW:****Flow is:**

| Wetland Name                        | Flow               | Explain |
|-------------------------------------|--------------------|---------|
| Abutting Wetlands of Village Branch | Intermittent flow. | -       |

**Surface flow is:**

| Wetland Name                        | Flow                  | Characteristics |
|-------------------------------------|-----------------------|-----------------|
| Abutting Wetlands of Village Branch | Discrete and confined | wet months      |

**Subsurface flow:**

| Wetland Name                        | Subsurface Flow | Explain Findings | Dye (or other) Test |
|-------------------------------------|-----------------|------------------|---------------------|
| Abutting Wetlands of Village Branch | Unknown         | -                | -                   |

**(c) Wetland Adjacency Determination with Non-TNW:**

| Wetland Name                        | Directly Abutting | Discrete Wetland Hydrologic Connection | Ecological Connection | Separated by Berm/Barrier |
|-------------------------------------|-------------------|--|-----------------------|---------------------------|
| Abutting Wetlands of Village Branch | Yes               | -                                      | -                     | -                         |

**(d) Proximity (Relationship) to TNW:**

| Wetland Name                        | River Miles From TNW | Aerial Miles From TNW | Flow Direction              | Within Floodplain |
|-------------------------------------|----------------------|-----------------------|-----------------------------|-------------------|
| Abutting Wetlands of Village Branch | 2-5                  | 2-5                   | Wetland to navigable waters | 2 - 5-year        |

**(ii) Chemical Characteristics:**

Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).

| Wetland Name                        | Explain | Identify specific pollutants, if known |
|-------------------------------------|---------|--|
| Abutting Wetlands of Village Branch | -       | -                                      |

**(iii) Biological Characteristics. Wetland supports:**

| Wetland Name                        | Riparian Buffer | Characteristics | Vegetation | Explain               |
|-------------------------------------|-----------------|-----------------|------------|-----------------------|
| Abutting Wetlands of Village Branch | X               | wide, wooded    | X          | wooded and herbaceous |

**Habitat for:**

| Wetland Name                        | Habitat | Federally Listed Species | Explain Findings | Spawn Area | Explain Findings | Other Environmentally Sensitive Species | Explain Findings | Aquatic/Wildlife Diversity | Explain Findings  |
|-------------------------------------|---------|--------------------------|------------------|------------|------------------|---|------------------|----------------------------|---|
| Abutting Wetlands of Village Branch | X       | -                        | -                | -          | -                | -                                       | -                | X                          | waterfowl, amphibians, reptiles, crayfish, mosquito fish. |

**3. Characteristics of all wetlands adjacent to the tributary (if any):**

All wetlands being considered in the cumulative analysis:

Not Applicable.

**Summarize overall biological, chemical and physical functions being performed:**

Not Applicable.

**C. SIGNIFICANT NEXUS DETERMINATION**

A significant nexus analysis will assess the flow characteristics and functions of the tributary itself and the functions performed by any wetlands adjacent to the tributary to determine if they significantly affect the chemical, physical, and biological integrity of a TNW. For each of the following situations, a significant nexus exists if the tributary, in combination with all of its adjacent wetlands, has more than a speculative or insubstantial effect on the chemical, physical and/or biological integrity of a TNW. Considerations when evaluating significant nexus include, but are not limited to the volume, duration, and frequency of the flow of water in the tributary and its proximity to a TNW, and the functions performed by the tributary and all its adjacent wetlands. It is not appropriate to determine significant nexus based solely on any specific threshold of distance (e.g. between a tributary and its adjacent wetland or between a tributary and the TNW). Similarly, the fact an adjacent wetland lies within or outside of a floodplain is not solely determinative of significant nexus.

**Significant Nexus:** Not Applicable

**D. DETERMINATIONS OF JURISDICTIONAL FINDINGS. THE SUBJECT WATERS/ WETLANDS ARE:****1. TNWs and Adjacent Wetlands:**

Not Applicable.

**2. RPWs that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

**3. Non-RPWs that flow directly or indirectly into TNWs:<sup>8</sup>**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

**4. Wetlands directly abutting an RPW that flow directly or indirectly into TNWs.**

| Wetland Name                        | Flow     | Explain  |
|-------------------------------------|----------|--|
| Abutting Wetlands of Village Branch | SEASONAL | Wetland is dry in dry season but would have groundwater and surface during wetter months |

**Provide acreage estimates for jurisdictional wetlands in the review area:**

| Wetland Name                        | Type   | Size (Linear) (m) | Size (Area) (m <sup>2</sup> ) |
|-------------------------------------|--|-------------------|-------------------------------|
| Abutting Wetlands of Village Branch | Wetlands directly abutting RPWs that flow directly or indirectly into TNWs | -                 | 64749.696                     |
| <b>Total:</b>                       |  | <b>0</b>          | <b>64749.696</b>              |

**5. Wetlands adjacent to but not directly abutting an RPW that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide acreage estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**6. Wetlands adjacent to non-RPWs that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**7. Impoundments of jurisdictional waters:<sup>9</sup>**

Not Applicable.

**E. ISOLATED [INTERSTATE OR INTRA-STATE] WATERS INCLUDING ISOLATED WETLANDS, THE USE, DEGRADATION OR DESTRUCTION OF WHICH COULD AFFECT INTERSTATE COMMERCE, INCLUDING ANY SUCH WATERS:<sup>10</sup>**

Not Applicable.

**Identify water body and summarize rationale supporting determination:**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

**F. NON-JURISDICTIONAL WATERS. INCLUDING WETLANDS**

If potential wetlands were assessed within the review area, these areas did not meet the criteria in the 1987 Corps of Engineers Wetland Delineation Manual and/or appropriate Regional Supplements:

Review area included isolated waters with no substantial nexus to interstate (or foreign) commerce:

Prior to the Jan 2001 Supreme Court decision in "SWANCC," the review area would have been regulated based solely on the "Migratory Bird Rule" (MBR):

Waters do not meet the "Significant Nexus" standard, where such a finding is required for jurisdiction (Explain):

Other (Explain):

**Provide acreage estimates for non-jurisdictional waters in the review area, where the sole potential basis of jurisdiction is the MBR factors (ie., presence of migratory birds, presence of endangered species, use of water for irrigated agriculture), using best professional judgment:**

Not Applicable.

**Provide acreage estimates for non-jurisdictional waters in the review area, that do not meet the "Significant Nexus" standard, where such a finding is required for jurisdiction.**

Not Applicable.

**SECTION IV: DATA SOURCES.****A. SUPPORTING DATA. Data reviewed for JD**

(listed items shall be included in case file and, where checked and requested, appropriately reference below):

| Data Reviewed  | Source Label | Source Description                                       |
|--|--------------|--|
| --Maps, plans, plots or plat submitted by or on behalf of the applicant/consultant | -            | -  |
| --Data sheets prepared/submitted by or on behalf of the applicant/consultant       | -            | -  |
| ----Office concurs with data sheets/delineation report                             | -            | -  |
| --Corps navigable waters study   | -            | Nashville District Public Notice # 86-23, dated May 1986 |
| --U.S. Geological Survey map(s).   | -            | 1:24,000, Hartselle, AL                                  |
| --USDA Natural Resources Conservation Service Soil Survey.                         | -            | -  |
| --Photographs  | -            | -  |
| ----Aerial   | -            | -  |
| ----Other  | -            | -  |

**B. ADDITIONAL COMMENTS TO SUPPORT JD:**

Not Applicable.

- 1-Boxes checked below shall be supported by completing the appropriate sections in Section III below.
- 2-For purposes of this form, an RPW is defined as a tributary that is not a TNW and that typically flows year-round or has continuous flow at least "seasonally" (e.g., typically 3 months).
- 3-Supporting documentation is presented in Section III.F.
- 4-Note that the Instructional Guidebook contains additional information regarding swales, ditches, washes, and erosional features generally and in the arid West.
- 5-Flow route can be described by identifying, e.g., tributary a, which flows through the review area, to flow into tributary b, which then flows into TNW.
- 6-A natural or man-made discontinuity in the OHWM does not necessarily sever jurisdiction (e.g., where the stream temporarily flows underground, or where the OHWM has been removed by development or agricultural practices). Where there is a break in the OHWM that is unrelated to the waterbody's flow regime (e.g., flow over a rock outcrop or through a culvert), the agencies will look for indicators of flow above and below the break.
- 7-Ibid.
- 8-See Footnote #3.
- 9 -To complete the analysis refer to the key in Section III.D.6 of the Instructional Guidebook.
- 10-Prior to asserting or declining CWA jurisdiction based solely on this category, Corps Districts will elevate the action to Corps and EPA HQ for review consistent with the process described in the Corps/EPA Memorandum Regarding CWA Act Jurisdiction Following Rapanos.

**APPROVED JURISDICTIONAL DETERMINATION FORM  
U.S. Army Corps of Engineers**

**SECTION I: BACKGROUND INFORMATION**

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**A. REPORT COMPLETION DATE FOR APPROVED JURISDICTIONAL DETERMINATION (JD):** 12-Nov-2008

**B. DISTRICT OFFICE, FILE NAME, AND NUMBER:** Nashville District, LRN-2008-01890-JD1

**C. PROJECT LOCATION AND BACKGROUND INFORMATION:**

State : TN - Tennessee  
County/parish/borough: Sullivan  
City: Bluff City  
Lat: 36.52373  
Long: -82.26307  
Universal Transverse Mercator Folder UTM List  
*UTM list determined by folder location*  
    . NAD83 / UTM zone 37S  
Waters UTM List  
*UTM list determined by waters location*  
    . NAD83 / UTM zone 37S

Name of nearest waterbody: Back Creek  
Name of nearest Traditional Navigable Water (TNW): South Fork Holston River  
Name of watershed or Hydrologic Unit Code (HUC): 06010102

Check if map/diagram of review area and/or potential jurisdictional areas is/are available upon request.

Check if other sites (e.g., offsite mitigation sites, disposal sites, etc.) are associated with the action and are recorded on a different JD form.

**D. REVIEW PERFORMED FOR SITE EVALUATION:**

Office Determination Date: 12-Nov-2008

Field Determination Date  
(s):

## SECTION II: SUMMARY OF FINDINGS

---

### A. RHA SECTION 10 DETERMINATION OF JURISDICTION

There  "navigable waters of the U.S." within Rivers and Harbors Act (RHA) jurisdiction (as defined by 33 CFR part 329) in the review area.

Waters subject to the ebb and flow of the tide.

Waters are presently used, or have been used in the past, or may be susceptible for use to transport interstate or foreign commerce.

Explain:

### B. CWA SECTION 404 DETERMINATION OF JURISDICTION.

There  "waters of the U.S." within Clean Water Act (CWA) jurisdiction (as defined by 33 CFR part 328) in the review area.

#### 1. Waters of the U.S.

##### a. Indicate presence of waters of U.S. in review area:<sup>1</sup>

| Water Name     | Water Type(s) Present   |
|----------------|---|
| LRN-2008-01890 | Relatively Permanent Waters (RPWs) that flow directly or indirectly into TNWs |

##### b. Identify (estimate) size of waters of the U.S. in the review area:

Area: (m<sup>2</sup>)

Linear: (m)

##### c. Limits (boundaries) of jurisdiction:

based on:

OHWL Elevation: (if known)

#### 2. Non-regulated waters/wetlands:<sup>3</sup>

Potentially jurisdictional waters and/or wetlands were assessed within the review area and determined to be not jurisdictional. Explain:

## SECTION III: CWA ANALYSIS

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### A. TNWs AND WETLANDS ADJACENT TO TNWs

**1.TNW**

Not Applicable.

**2. Wetland Adjacent to TNW**

Not Applicable.

**B. CHARACTERISTICS OF TRIBUTARY (THAT IS NOT A TNW) AND ITS ADJACENT WETLANDS (IF ANY):**

**1. Characteristics of non-TNWs that flow directly or indirectly into TNW**

**(i) General Area Conditions:**

Watershed size: [ ]

Drainage area: [ ]

Average annual rainfall: inches

Average annual snowfall: inches

**(ii) Physical Characteristics**

**(a) Relationship with TNW:**

Tributary flows directly into TNW.

Tributary flows through [ ] tributaries before entering TNW.

:Number of tributaries

Project waters are [ ] river miles from TNW.

Project waters are [ ] river miles from RPW.

Project Waters are [ ] aerial (straight) miles from TNW.

Project waters are [ ] aerial(straight) miles from RPW.

Project waters cross or serve as state boundaries.

Explain:

Identify flow route to TNW:<sup>5</sup>

**Tributary Stream Order, if known:**

| Order | Tributary Name |
|-------|----------------|
| 3     | LRN-2008-01890 |

**(b) General Tributary Characteristics:**

Tributary is:

| Tributary Name | Natural | Artificial | Explain | Manipulated | Explain |
|----------------|---------|------------|---------|-------------|---------|
| LRN-2008-01890 | X       | -          | -       | -           | -       |

**Tributary properties with respect to top of bank (estimate):**

| Tributary Name | Width (ft) | Depth (ft) | Side Slopes |
|----------------|------------|------------|-------------|
| LRN-2008-01890 | 30         | 4          | 2:1         |

**Primary tributary substrate composition:**

| Tributary Name | Silt | Sands | Concrete | Cobble | Gravel | Muck | Bedrock | Vegetation | Other |
|----------------|------|-------|----------|--------|--------|------|---------|------------|-------|
| LRN-2008-01890 | X    | -     | -        | X      | -      | -    | -       | -          | -     |

**Tributary (conditions, stability, presence, geometry, gradient):**

| Tributary Name | Condition\Stability | Run\Riffle\Pool Complexes  | Geometry   | Gradient (%) |
|----------------|---------------------|--|------------|--------------|
| LRN-2008-01890 | Stable              | Approximately 20% of channel contains riffle/pool complexes at this location | Meandering | -            |

**(c) Flow:**

| Tributary Name | Provides for   | Events Per Year | Flow Regime | Duration & Volume |
|----------------|----------------|-----------------|-------------|-------------------|
| LRN-2008-01890 | Perennial flow | 20 (or greater) | -           | -                 |

**Surface Flow is:**

| Tributary Name | Surface Flow          | Characteristics |
|----------------|-----------------------|-----------------|
| LRN-2008-01890 | Discrete and confined | -               |

**Subsurface Flow:**

| Tributary Name | Subsurface Flow | Explain Findings | Dye (or other) Test |
|----------------|-----------------|------------------|---------------------|
| LRN-2008-01890 | Unknown         | -                | -                   |

**Tributary has:**

| Tributary Name | Bed & Banks | OHWL | Discontinuous OHWM <sup>7</sup> | Explain |
|----------------|-------------|------|---------------------------------|---------|
| LRN-2008-01890 | X           | X    | -                               | -       |

**Tributaries with OHWM<sup>6</sup> - (as indicated above)**

| Tributary Name | OHWL | Clear | Litter | Changes in Soil | Destruction Vegetation | Shelving | Wrack Line | Matted\Absent Vegetation | Sediment Sorting | Leaf Litter | Scour | Sediment Deposition | Flow Events | Water Staining | Changes Plant | Other |
|----------------|------|-------|--------|-----------------|------------------------|----------|------------|--------------------------|------------------|-------------|-------|---------------------|-------------|----------------|---------------|-------|
| LRN-2008-01890 | X    | X     | -      | -               | -                      | -        | -          | X                        | -                | -           | X     | -                   | -           | -              | -             | -     |

**If factors other than the OHWM were used to determine lateral extent of CWA jurisdiction:****High Tide Line indicated by:**

Not Applicable.

**Mean High Water Mark indicated by:**

Not Applicable.

**(iii) Chemical Characteristics:**

**Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).**

| Tributary Name | Explain              | Identify specific pollutants, if known |
|----------------|----------------------|--|
| LRN-2008-01890 | Water color is clear | Unknown                                |

**(iv) Biological Characteristics. Channel supports:**

| Tributary Name | Riparian Corridor | Characteristics | Wetland Fringe | Characteristics | Habitat |
|----------------|-------------------|-----------------|----------------|-----------------|---------|
| LRN-2008-01890 | -                 | -               | -              | -               | -       |

**2. Characteristics of wetlands adjacent to non-TNW that flow directly or indirectly into TNW****(i) Physical Characteristics:****(a) General Wetland Characteristics:****Properties:**

Not Applicable.

**(b) General Flow Relationship with Non-TNW:****Flow is:**

Not Applicable.

**Surface flow is:**

Not Applicable.

**Subsurface flow:**

Not Applicable.

**(c) Wetland Adjacency Determination with Non-TNW:**

Not Applicable.

**(d) Proximity (Relationship) to TNW:**

Not Applicable.

**(ii) Chemical Characteristics:**

**Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).**

Not Applicable.

**(iii) Biological Characteristics. Wetland supports:**

Not Applicable.

**3. Characteristics of all wetlands adjacent to the tributary (if any):****All wetlands being considered in the cumulative analysis:**

Not Applicable.

**Summarize overall biological, chemical and physical functions being performed:**

Not Applicable.

**C. SIGNIFICANT NEXUS DETERMINATION**

A significant nexus analysis will assess the flow characteristics and functions of the tributary itself and the functions performed by any wetlands adjacent to the tributary to determine if they significantly affect the chemical, physical, and biological integrity of a TNW. For each of the following situations, a significant nexus exists if the tributary, in combination with all of its adjacent wetlands, has more than a speculative or insubstantial effect on the chemical, physical and/or biological integrity of a TNW. Considerations when evaluating significant nexus include, but are not limited to the volume, duration, and frequency of the flow of water in the tributary and its proximity to a TNW, and the functions performed by the tributary and all its adjacent wetlands. It is not appropriate to determine significant nexus based solely on any specific threshold of distance (e.g. between a tributary and its adjacent wetland or between a tributary and the TNW). Similarly, the fact an adjacent wetland lies within or outside of a floodplain is not solely determinative of significant nexus.

**Significant Nexus:** Not Applicable**D. DETERMINATIONS OF JURISDICTIONAL FINDINGS. THE SUBJECT WATERS/ WETLANDS ARE:****1. TNWs and Adjacent Wetlands:**

Not Applicable.

**2. RPWs that flow directly or indirectly into TNWs:**

| Wetland Name   | Flow      | Explain                    |
|----------------|-----------|----------------------------|
| LRN-2008-01890 | PERENNIAL | Flow is present year round |

**Provide estimates for jurisdictional waters in the review area:**

| Wetland Name   | Type  | Size (Linear) (m) | Size (Area) (m <sup>2</sup> ) |
|----------------|---|-------------------|-------------------------------|
| LRN-2008-01890 | Relatively Permanent Waters (RPWs) that flow directly or indirectly into TNWs | 28.6512           | -                             |
| <b>Total:</b>  |   | <b>28.6512</b>    | <b>0</b>                      |

**3. Non-RPWs that flow directly or indirectly into TNWs:<sup>8</sup>**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

**4. Wetlands directly abutting an RPW that flow directly or indirectly into TNWs.**

Not Applicable.

**Provide acreage estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**5. Wetlands adjacent to but not directly abutting an RPW that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide acreage estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**6. Wetlands adjacent to non-RPWs that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**7. Impoundments of jurisdictional waters:<sup>9</sup>**

Not Applicable.

**E. ISOLATED [INTERSTATE OR INTRA-STATE] WATERS INCLUDING ISOLATED WETLANDS, THE USE, DEGRADATION OR DESTRUCTION OF WHICH COULD AFFECT INTERSTATE COMMERCE, INCLUDING ANY SUCH WATERS:<sup>10</sup>**

Not Applicable.

**Identify water body and summarize rationale supporting determination:**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

## F. NON-JURISDICTIONAL WATERS. INCLUDING WETLANDS

If potential wetlands were assessed within the review area, these areas did not meet the criteria in the 1987 Corps of Engineers Wetland Delineation Manual and/or appropriate Regional Supplements:

Review area included isolated waters with no substantial nexus to interstate (or foreign) commerce:

Prior to the Jan 2001 Supreme Court decision in "SWANCC," the review area would have been regulated based solely on the "Migratory Bird Rule" (MBR):

Waters do not meet the "Significant Nexus" standard, where such a finding is required for jurisdiction (Explain):

Other (Explain):

**Provide acreage estimates for non-jurisdictional waters in the review area, where the sole potential basis of jurisdiction is the MBR factors (ie., presence of migratory birds, presence of endangered species, use of water for irrigated agriculture), using best professional judgment:**

Not Applicable.

**Provide acreage estimates for non-jurisdictional waters in the review area, that do not meet the "Significant Nexus" standard, where such a finding is required for jurisdiction.**

Not Applicable.

## SECTION IV: DATA SOURCES.

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### A. SUPPORTING DATA. Data reviewed for JD

(listed items shall be included in case file and, where checked and requested, appropriately reference below):

Not Applicable.

### B. ADDITIONAL COMMENTS TO SUPPORT JD:

Not Applicable.

- 1-Boxes checked below shall be supported by completing the appropriate sections in Section III below.
- 2-For purposes of this form, an RPW is defined as a tributary that is not a TNW and that typically flows year-round or has continuous flow at least "seasonally" (e.g., typically 3 months).
- 3-Supporting documentation is presented in Section III.F.
- 4-Note that the Instructional Guidebook contains additional information regarding swales, ditches, washes, and erosional features generally and in the arid West.
- 5-Flow route can be described by identifying, e.g., tributary a, which flows through the review area, to flow into tributary b, which then flows into TNW.
- 6-A natural or man-made discontinuity in the OHWM does not necessarily sever jurisdiction (e.g., where the stream temporarily flows underground, or where the OHWM has been removed by development or agricultural practices). Where there is a break in the OHWM that is unrelated to the waterbody's flow regime (e.g., flow over a rock outcrop or through a culvert), the agencies will look for indicators of flow above and below the break.
- 7-Ibid.
- 8-See Footnote #3.
- 9 -To complete the analysis refer to the key in Section III.D.6 of the Instructional Guidebook.
- 10-Prior to asserting or declining CWA jurisdiction based solely on this category, Corps Districts will elevate the action to Corps and EPA HQ for review consistent with the process described in the Corps/EPA Memorandum Regarding CWA Act Jurisdiction Following Rapanos.

**APPROVED JURISDICTIONAL DETERMINATION FORM  
U.S. Army Corps of Engineers**

## SECTION I: BACKGROUND INFORMATION

---

**A. REPORT COMPLETION DATE FOR APPROVED JURISDICTIONAL DETERMINATION (JD):** 31-Oct-2008

**B. DISTRICT OFFICE, FILE NAME, AND NUMBER:** Nashville District, LRN-2007-01990-JD1

**C. PROJECT LOCATION AND BACKGROUND INFORMATION:**

State : AL - Alabama  
 County/parish/borough: Madison  
 City: Redstone Arsenal  
 Lat:  
 Long:  
 Universal Transverse Mercator Folder UTM List  
*UTM list determined by folder location*  
 • NAD83 / UTM zone 36S  
Waters UTM List  
*UTM list determined by waters location*  
 • NAD83 / UTM zone 36S  
 Name of nearest waterbody: Huntsville Spring Branch  
 Name of nearest Traditional Navigable Water (TNW): Wheeler Lake  
 Name of watershed or Hydrologic Unit Code (HUC): 6030002

Check if map/diagram of review area and/or potential jurisdictional areas is/are available upon request.

Check if other sites (e.g., offsite mitigation sites, disposal sites, etc.) are associated with the action and are recorded on a different JD form.

**D. REVIEW PERFORMED FOR SITE EVALUATION:**

Office Determination Date: 13-Nov-2008

Field Determination Date  
(s):

## SECTION II: SUMMARY OF FINDINGS

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**A. RHA SECTION 10 DETERMINATION OF JURISDICTION**

There  "navigable waters of the U.S." within Rivers and Harbors Act (RHA) jurisdiction (as defined by 33 CFR part 329) in the review area.

Waters subject to the ebb and flow of the tide.

Waters are presently used, or have been used in the past, or may be susceptible for use to transport interstate or foreign commerce.

Explain:

**B. CWA SECTION 404 DETERMINATION OF JURISDICTION.**

There  "waters of the U.S." within Clean Water Act (CWA) jurisdiction (as defined by 33 CFR part 328) in the review area.

**1. Waters of the U.S.**

**a. Indicate presence of waters of U.S. in review area:<sup>1</sup>**

| Water Name                                | Water Type(s) Present     |
|---|---------------------------|
| Wetland Abutting Huntsville Spring Branch | Wetlands adjacent to TNWs |

**b. Identify (estimate) size of waters of the U.S. in the review area:**

Area: (m<sup>2</sup>)

Linear: (m)

**c. Limits (boundaries) of jurisdiction:**

based on:

OHWM Elevation: (if known)

**2. Non-regulated waters/wetlands:<sup>3</sup>**

Potentially jurisdictional waters and/or wetlands were assessed within the review area and determined to be not jurisdictional. Explain:

**SECTION III: CWA ANALYSIS**

**A. TNWs AND WETLANDS ADJACENT TO TNWs**

**1. TNW**

Not Applicable.

**2. Wetland Adjacent to TNW**

| Wetland Name                              | Summarize rationale supporting conclusion that wetland is "adjacent":  |
|---|--|
| Wetland Abutting Huntsville Spring Branch | Wetland is large and Redstone Arsenal officials mapped the wetland as continuous to Huntsville Spring Branch. Also, a man-made ditch drains the wetland to Huntsville Spring Branch. |

**B. CHARACTERISTICS OF TRIBUTARY (THAT IS NOT A TNW) AND ITS ADJACENT WETLANDS (IF ANY):**

**1. Characteristics of non-TNWs that flow directly or indirectly into TNW**

**(i) General Area Conditions:**

Watershed size:

Drainage area:

Average annual rainfall: inches

Average annual snowfall: inches

**(ii) Physical Characteristics**

**(a) Relationship with TNW:**

Tributary flows directly into TNW.

Tributary flows through  tributaries before entering TNW.

:Number of tributaries

Project waters are  river miles from TNW.

Project waters are  river miles from RPW.

Project Waters are  aerial (straight) miles from TNW.

Project waters are  aerial(straight) miles from RPW.

Project waters cross or serve as state boundaries.

Explain:

Identify flow route to TNW:<sup>5</sup>

**Tributary Stream Order, if known:**

Not Applicable.

**(b) General Tributary Characteristics:**

**Tributary is:**

Not Applicable.

**Tributary properties with respect to top of bank (estimate):**

Not Applicable.

**Primary tributary substrate composition:**

Not Applicable.

**Tributary (conditions, stability, presence, geometry, gradient):**

Not Applicable.

**(c) Flow:**

Not Applicable.

**Surface Flow is:**

Not Applicable.

**Subsurface Flow:**

Not Applicable.

**Tributary has:**

Not Applicable.

**If factors other than the OHWM were used to determine lateral extent of CWA jurisdiction:**

**High Tide Line indicated by:**

Not Applicable.

**Mean High Water Mark indicated by:**

Not Applicable.

**(iii) Chemical Characteristics:**

**Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).**

Not Applicable.

**(iv) Biological Characteristics. Channel supports:**

Not Applicable.

**2. Characteristics of wetlands adjacent to non-TNW that flow directly or indirectly into TNW**

**(i) Physical Characteristics:**

**(a) General Wetland Characteristics:**

**Properties:**

Not Applicable.

**(b) General Flow Relationship with Non-TNW:**

**Flow is:**

Not Applicable.

**Surface flow is:**

Not Applicable.

**Subsurface flow:**

Not Applicable.

**(c) Wetland Adjacency Determination with Non-TNW:**

Not Applicable.

**(d) Proximity (Relationship) to TNW:**

Not Applicable.

**(ii) Chemical Characteristics:**

Characterize tributary (e.g., water color is clear, discolored, oily film; water quality; general watershed characteristics, etc.).

Not Applicable.

**(iii) Biological Characteristics. Wetland supports:**

Not Applicable.

**3. Characteristics of all wetlands adjacent to the tributary (if any):**

All wetlands being considered in the cumulative analysis:

Not Applicable.

**Summarize overall biological, chemical and physical functions being performed:**

Not Applicable.

**C. SIGNIFICANT NEXUS DETERMINATION**

A significant nexus analysis will assess the flow characteristics and functions of the tributary itself and the functions performed by any wetlands adjacent to the tributary to determine if they significantly affect the chemical, physical, and biological integrity of a TNW. For each of the following situations, a significant nexus exists if the tributary, in combination with all of its adjacent wetlands, has more than a speculative or insubstantial effect on the chemical, physical and/or biological integrity of a TNW. Considerations when evaluating significant nexus include, but are not limited to the volume, duration, and frequency of the flow of water in the tributary and its proximity to a TNW, and the functions performed by the tributary and all its adjacent wetlands. It is not appropriate to determine significant nexus based solely on any specific threshold of distance (e.g. between a tributary and its adjacent wetland or between a tributary and the TNW). Similarly, the fact an adjacent wetland lies within or outside of a floodplain is not solely determinative of significant nexus.

Significant Nexus: Not Applicable

**D. DETERMINATIONS OF JURISDICTIONAL FINDINGS. THE SUBJECT WATERS/WETLANDS ARE:****1. TNWs and Adjacent Wetlands:**

| Wetland Name                              | Type                      | Size (Linear) (m) | Size (Area) (m <sup>2</sup> ) |
|---|---------------------------|-------------------|-------------------------------|
| Wetland Abutting Huntsville Spring Branch | Wetlands adjacent to TNWs | -                 | 8093.712                      |
| <b>Total:</b>                             |                           | <b>0</b>          | <b>8093.712</b>               |

**2. RPWs that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

**3. Non-RPWs that flow directly or indirectly into TNWs:<sup>8</sup>**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

**4. Wetlands directly abutting an RPW that flow directly or indirectly into TNWs.**

Not Applicable.

**Provide acreage estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**5. Wetlands adjacent to but not directly abutting an RPW that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide acreage estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**6. Wetlands adjacent to non-RPWs that flow directly or indirectly into TNWs:**

Not Applicable.

**Provide estimates for jurisdictional wetlands in the review area:**

Not Applicable.

**7. Impoundments of jurisdictional waters:<sup>9</sup>**

Not Applicable.

**E. ISOLATED [INTERSTATE OR INTRA-STATE] WATERS INCLUDING ISOLATED WETLANDS, THE USE, DEGRADATION OR DESTRUCTION OF WHICH COULD AFFECT INTERSTATE COMMERCE, INCLUDING ANY SUCH WATERS:<sup>10</sup>**

Not Applicable.

**Identify water body and summarize rationale supporting determination:**

Not Applicable.

**Provide estimates for jurisdictional waters in the review area:**

Not Applicable.

#### **F. NON-JURISDICTIONAL WATERS. INCLUDING WETLANDS**

If potential wetlands were assessed within the review area, these areas did not meet the criteria in the 1987 Corps of Engineers Wetland Delineation Manual and/or appropriate Regional Supplements:

Review area included isolated waters with no substantial nexus to interstate (or foreign) commerce:

Prior to the Jan 2001 Supreme Court decision in "SWANCC," the review area would have been regulated based solely on the "Migratory Bird Rule" (MBR):

Waters do not meet the "Significant Nexus" standard, where such a finding is required for jurisdiction (Explain):

Other (Explain):

**Provide acreage estimates for non-jurisdictional waters in the review area, where the sole potential basis of jurisdiction is the MBR factors (ie., presence of migratory birds, presence of endangered species, use of water for irrigated agriculture), using best professional judgment:**

Not Applicable.

**Provide acreage estimates for non-jurisdictional waters in the review area, that do not meet the "Significant Nexus" standard, where such a finding is required for jurisdiction.**

Not Applicable.

#### **SECTION IV: DATA SOURCES.**

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**A. SUPPORTING DATA. Data reviewed for JD**

(listed items shall be included in case file and, where checked and requested, appropriately reference below):

| Data Reviewed  | Source Label | Source Description   |
|--|--------------|--|
| --Maps, plans, plots or plat submitted by or on behalf of the applicant/consultant | -            | -  |
| --Corps navigable waters study   | -            | Nashville District Public Notice #86-23, dated 8 May 1986. |
| --U.S. Geological Survey map(s).   | -            | 1:24,000, Triana, AL                                       |
| --USDA Natural Resources Conservation Service Soil Survey.                         | -            | -  |
| --National wetlands inventory map(s).  | -            | -  |
| --Photographs  | -            | -  |
| ----Aerial   | -            | -  |

**B. ADDITIONAL COMMENTS TO SUPPORT JD:**

Not Applicable.

- 
- 1-Boxes checked below shall be supported by completing the appropriate sections in Section III below.
  - 2-For purposes of this form, an RPW is defined as a tributary that is not a TNW and that typically flows year-round or has continuous flow at least "seasonally" (e.g., typically 3 months).
  - 3-Supporting documentation is presented in Section III.F.
  - 4-Note that the Instructional Guidebook contains additional information regarding swales, ditches, washes, and erosional features generally and in the arid West.
  - 5-Flow route can be described by identifying, e.g., tributary a, which flows through the review area, to flow into tributary b, which then flows into TNW.
  - 6-A natural or man-made discontinuity in the OHWM does not necessarily sever jurisdiction (e.g., where the stream temporarily flows underground, or where the OHWM has been removed by development or agricultural practices). Where there is a break in the OHWM that is unrelated to the waterbody's flow regime (e.g., flow over a rock outcrop or through a culvert), the agencies will look for indicators of flow above and below the break.
  - 7-Ibid.
  - 8-See Footnote #3.
  - 9 -To complete the analysis refer to the key in Section III.D.6 of the Instructional Guidebook.
  - 10-Prior to asserting or declining CWA jurisdiction based solely on this category, Corps Districts will elevate the action to Corps and EPA HQ for review consistent with the process described in the Corps/EPA Memorandum Regarding CWA Act Jurisdiction Following Rapanos.