DRAFT –Southwest Georgia Aquatic Species -- DRAFT
Effects Determination Guidance for Endangered & Threatened Species (EDGES)

Appalachicola-Chattahoochee-Flint Basin

Species Covered by This EDGES:

- Endangered: Fat threeridge (*Amblema neislerii*), Gulf moccasinshell (*Medionidus penicillatus*), Ochlockonee moccasinshell (*Medionidus simpsonianus*), oval pigtoe (*Pleurobema pyriforme*), and shinyrayed pocketbook (*Hamiota subangulata*).
- Threatened: Purple bankclimber (*Elliptoideus sloatianus*)

Fat threeridge (*Amblema neislerii*) (above)

These mussels occur in the Apalachicola, Chattahoochee, Flint, and Ochlockonee River basins. They typically are found in small streams to large rivers with moderate flow and sandy to silty substrates, although the Gulf moccasinshell has been found in gravel and cobble substrates. To reproduce, these mussels release larva, called glochidia, into the water. Glochidia must find and attach to the gills or fins of an appropriate host fish to complete development. The Ochlockonee moccasinshell is found only in the Ochlockonee basin. The other species occur in the ACF, including the Chattahoochee and Flint River mainstems downstream of Atlanta, Kirkland and Sawhatchee Creeks in the Chattahoochee River Basin, and Kinchafoonee, Ichawaynochaway, Spring, Line, and/or Muckalee Creeks in the Flint River Basin. The purple bankclimber and shinyrayed pocketbook also occur in the Ochlockonee.

Primary threats include habitat fragmentation, alteration of flows in areas with extensive agricultural irrigation or impoundments, excess sedimentation, and competition with the introduced flathead catfish.

Critical Habitat for the ACF mussels in Georgia has been designated in the Flint River mainstem, Spring Creek, Aycocks Creek, Dry Creek, Ichawaynochaway Creek, Mill Creek, Pachitla Creek, Little Pachitla Creek, Chickasawhatchee Creek, Cooleewahee Creek, Swift Creek, Limestone Creek, Turkey Creek, Pennahatchee Creek, Little Pennahatchee Creek, Hogcrawl Creek, Red Oak Creek, Line Creek, Whitewater Creek, and Lannahassee Creek.

Endangered Species Act Consultation Checklist:

Applicant:

1. Does IPAC indicate federally-listed aquatic species may occur in the project area.
   a. No……No effect. Provide IPaC information to the Savannah District with application/PCN.
   b. Yes……...Go to #2.

2. Has the Fish and Wildlife Service's Georgia Field Office (GAES) provided documentation stating project impacts to these species were likely to be minimal.
   a. No……Go to #3.
   b. Yes……..Provide GAES project review documentation to the Savannah District with application/PCN.

3. Were determination key(s) completed in IPaC and a consistency letter auto-generated for the project.
   a. No…… Provide completed EDGES Applicant Consultation Form and supporting documentation to the Savannah District with 404 application/PCN.
   b. Yes……..Provide IPaC determination key and consistency letter to the Savannah District with application/PCN.

Savannah District:

4. Does IPaC indicate federally listed aquatic species or designated Critical Habitat may occur in the project area.
   a. No…….. No effect.
   b. Yes……..Go to #5.

5. Has GA ES reviewed the project and provided information that federally-listed aquatic species will not be impacted by the project.
   a. No…….. Go to #6.
   b. Yes……..No effect.

6. Has the applicant has provided a consistency letter from IPaC indicating the project will have 'no effect' on federally listed aquatic species or is 'not likely to adversely affect' federally listed species.
   a. No…….. Go to #7.
   b. Yes……..Verify that the applicant has completed the IPaC determination key properly. No concurrence from GA ES is required. Section 7 consultation complete.

7. Has the Savannah district completed the required determination key in IPaC and generated a concurrence letter.
   a. No…….. Go to #8.
   b. Yes…….. No concurrence from GA ES required. Section 7 consultation complete.

8. Will this project require an Individual 404 Clean Water Act Permit, involve point source discharges, or result in new surface water withdrawals?
   a. No…… Go to #9.
   b. Yes……... Go to #14.

9. Will the project include activities that involve placement or removal of material in perennial streams?
   a. No…… NLAA. No concurrence from GA ES required. Section 7 consultation complete.
   b. Yes……... Go to #10.

10. Is potentially suitable habitat present in the project area or within 1 mile downstream of the project area?
    a. No…… NLAA. No concurrence from GA ES required. Section 7 consultation complete.
    b. Yes……... Go to #11.

11. Is the project assuming presence of federally-listed aquatics in the project area?
    a. No…… Go to #12.
    b. Yes……... Go to #14.

12. Has a survey been conducted to determine if federally-listed aquatics occur in the project area?
    a. No…… Go to #14.
    b. Yes……... Go to #13.

13. Were any federally-listed aquatics found during the aquatics survey?
    a. No…… NLAA. No concurrence from GA ES required. Section 7 consultation complete.
    b. Yes……... Go to #14.

14. Is the necessary information provided in the PCN or application to assist the Savannah District and GAES in Section 7 consultation?
    a. No……Request the information and, once received, continue with 14b.
    b. Yes……...Share data with GA ES and continue consultation. Go to #15.

15. If consultation results in a Savannah district determination of:
    a. NLAA……. Concurrence letter from GA ES required. Section 7 consultation complete
    b. MALAA……...Initiate formal consultation.

Information to provided to the Savannah District for Endangered Species Act Review

All (where applicable):

- Verification that the project will meet all requirements of the Georgia NPDES General Permits for sediment and erosion, construction stormwater management, and waste disposal.
- A post-construction stormwater management plan that meets at least the current Georgia Blue Book standards.
- A timeline documenting when land clearing, construction, and post-construction actions will be implemented.
- An estimate of total acreage that will be graded at any one time.

Urban development:

- Total acreage of the development and estimate percentage of impervious surface post-construction.
- Data detailing where riparian buffers will be removed or thinned to less than 50 feet wide on both banks.
- Location of new or improved culverts, bridges, dams, stormwater facilities, and utility crossings of streams. Data requirements for these structures, other than location, are listed below.
- The acreage of land that will be graded at any one time.
- Location of any point-source discharges.

New or replacement culverts in perennial stream (in addition to data required in the NWP Regional Conditions).

- Post-construction channel and bank stabilization measures, including revegetation plans.
- A description of grade or velocity controls to be installed, including riprap.

New or widened utility right-of-way (e.g., water main, sewer, pipelines, transmission lines):

- Methodology for each stream excavation (wet cut, dam-pump, flume, bore).
- Amount and source of hydrostatic test water and slurry water (if needed).
- Location where hydrostatic test and slurry water will be discharged (if needed).
- Location of new, replaced, or improved culverts or fords, either permanent or temporary.
- Post-construction channel/bank stabilization measures, including revegetation plans, and ROW maintenance plan.

Stream restoration/stabilization: Stream restoration plan (60% design, and including the proposed longitudinal profile.