Mitigation Measures

The following mitigation measures are examples which are typical of USDA RD projects if required to diminish the environmental impact. It is not an exhaustive list but a common list. Other items may be appropriate for any particular project, depending on site conditions. Editing of the mitigation may be necessary for a specific site and consulting Agencies may also request additional refinements.

The short mitigation description is followed by the primary consulting Agency. Use the short description in any required public notice to reduce the cost for the owners. The following pages provide an expanded version of the mitigation measure which should be included in the environmental report, letter of conditions, and construction contract.

The Best Management Practices listed below are mitigation measures for a project, but since they are required by law or permit they are not considered mitigation measures the USDA RD is responsible to oversee. They could, if required, appear in the environmental report, letter of conditions, and construction contract, but need to be referenced as Best Management Practices.

Some mitigation items could be applied to any project and are good construction measures, but only use mitigation measures that are *required* for a project. Most projects will only require the, "Notifications required if cultural material is found". The data gathered for the environmental report must support the inclusion of a mitigation measure. Don't over mitigate.

Mitigation Measures: (required by specific project to diminish the environmental impact)

USDA RD is responsible to oversee

- 1. Notifications required if cultural material is found. SHPO/THC
- 2. Fence and vibration protection of nearby Historic Buildings. SHPO/THC
- 3. Archeological survey before construction. SHPO/THC
- 4. Survey for migratory bird nests before construction during nesting season. USFWS
- 5. Any landscaping limited to native species. USFWS
- 6. Notification required if endangered species is found. USFWS
- 7. Limited incremental construction area. USFWS
- 8. No construction within the floodplain. FEMA
- 9. No construction within the wetland. USACE
- 10. Removal of petroleum underground storage tanks. TCEQ
- 11. No construction on important farmland. NRCS
- 12. Dust suppression during construction. Local interest groups
- 13. Construction during daylight hours to reduce noise. Local interest groups

Best Management Practices: (required by law or permit)

USDA RD is not responsible to oversee – may be in project, but not as a mitigation measure

- 1. Erosion control during construction. TCEQ
- 2. Boring under wetlands for utilities. USACE
- 3. Compliance with Nationwide Permit 12 USACE

1. Notifications required if cultural material is found.

If cultural materials are encountered during construction, work shall immediately cease in the area of discovery. Work may continue in the project area where no cultural materials are present. The contractor shall immediately notify the consultant architect/engineer, the Texas Historical Commission (512) 463-6100, and the USDA Rural Development State Environmental Coordinator (254) 742-9789.

2. Fence and vibration protection of nearby Historic Buildings.

The contractor shall be shown the locations of the Historic Buildings by the consultant architect/engineer in charge of the project, a construction fence will be placed around the area of concern, and the contractor will be instructed to not use vibrating equipment within 100'-0" of the fenced area and to use alternative methods to achieve compaction.

3. Archeological survey before construction.

Before construction begins the consultant architect/engineer shall coordinate with the Owner in obtaining an archeological survey of the site by a professional archeologists meeting the requirements and qualifications of the Texas Historical Commission. The design plans shall consider the survey findings and follow the Texas Historical Commission's recommendations if required.

4. Survey for migratory bird nests before construction during nesting season.

If construction activities must occur during March through August, the contractor shall provide a survey for bird nests conducted by a qualified individual prior to commencing work. If nests are found, a no construction zone of a 75'-0" radius will be marked and maintained around the nests until the birds have abandoned the site. The birds and nests are not to be disturbed.

5. Any landscaping limited to native species.

Any landscaping or re-seeding shall be limited to seeding and replacing with native trees, shrubs, and herbaceous species that are adaptable, drought tolerant, and conserve water.

6. Notification required if endangered species is found.

The contractor shall be responsible to review the Environmental Report for threaten or endangered species listed in the area of the project and to instruct the site construction personnel not to disturb any species or habitat which may be found on site during the construction. A species shall be left alone to leave the site or if the species remains or habitat is found, the contractor shall immediately notify the consultant architect/engineer, the Texas Park and Wildlife Department, the United States Fish and Wildlife Services, and the USDA Rural Development State Environmental Coordinator (254) 742-9789.

7. Limited incremental construction area. (Linear type projects - example: utilities)

Construction shall be limited to 30'-0" in width, progress 200'-0" feet increments to allow wildlife to circumvent the construction area, and be completed as rapidly as possible to limit the time of disturbance.

8. No construction within the floodplain.

A floodplain is located on or adjacent to a portion of the site. The contractor shall locate the floodplain by using a qualified individual. The area shall be clearly marked and avoided during the construction. No construction or change in the natural site grades shall occur within the area. No unfiltered site runoff shall enter the floodplain.

9. No construction within the wetland.

A wetland is located on or adjacent to a portion of the site. The contractor shall provide wetland delineation by a qualified individual. The area shall be clearly marked and avoided during the construction. No equipment, personnel, or unfiltered site runoff shall enter the wetland.

10. Removal of petroleum underground storage tanks.

Petroleum underground storage tanks are located on the site. The contractor shall remove the tanks in strict compliance with the current requirements of the Texas Commission on Environmental Quality (TCEQ) using licensed individuals qualified for the scope of work.

11. No construction on important farmland.

Important farmland is located on or adjacent to a portion of the site. The contractor shall locate the important farmland by using a qualified individual. The area shall be clearly marked and avoided during the construction. No construction or change in the natural site grades shall occur within the area. No unfiltered site runoff shall enter the important farmland area.

12. Dust suppression during construction.

In order to mitigate dust during construction, the contractor shall water down construction areas or use other dust suppression methods as required for the level of dust disturbance and weather conditions.

13. Construction during daylight hours to reduce noise.

The contractor shall work during normal weekday work hours from 7:00 am to 6:00 pm to reduce construction noise exposed to the adjacent properties. Work outside of this time schedule shall be limited to emergency repairs only.