

Southeast Louisiana Flood Protection Authority - East Levee Safety Permit Policy

Revised July 12, 2017

A. Background

Levee districts and Flood Authorities, as sponsors of most federally authorized and constructed flood control and hurricane risk reduction projects, are partners with the Federal Government and the State of Louisiana and must operate and maintain the projects to ensure structural integrity and that the system will function as designed when necessary to prevent or mitigate flood damage. Sponsors protect the structural integrity of the projects by administering a proactive levee safety permits program, performed in conjunction with the Louisiana Coastal Protection & Restoration Authority (CPRA), and the U.S. Army Corps of Engineers (USACE). The permits program is administered in the overall public interest to protect life and property within the levee system. The engineering guidelines for permitting are established by CPRA and USACE based on state and federal laws and regulations, standard engineering practices, hydraulic and geotechnical conditions for this region and lessons learned from historical events or incidents.

A Levee Safety Permit is NOT an Operating Permit and those seeking Levee Safety Permits are advised that additional permits may need to be obtained from other governmental entities/agencies before those entities/agencies will allow operations to begin. The SLFPAE is not responsible for insuring that the permittee complies with rules, regulations or laws imposed by other governmental entities/agencies in regard to requirements for permitted activities.

References: Louisiana Revised Statutes Title 38, Title 33 U.S.C.A. Sec 408, and Title 33 CFR Sec 208.10

B. Purpose:

The purpose of this document is to detail and clarify the levee safety permit process followed by the Southeast Louisiana Flood Protection Authority – East and its partners.

C. Activities Requiring a Permit:

The USACE and the State of Louisiana establish distances for certain types of work that can adversely affect the structural integrity of federal levees and structures. CFR Title 33 Section 208.10 gives the USACE's District Engineer and delegated authorities' wide latitude to protect the federal projects. There is no distance limitation for permitting work that can affect the federal levees and structures, however, based on state and

federal laws and regulations, standard engineering practices, hydraulic and geotechnical conditions for this region, and lessons learned from historical events or incidents, the USACE New Orleans District has established the following distances and river stage elevations for flood control permits within its boundary.

- 1) All work within the limits of any levee right-of-way.
- 2) The transport of heavy loads across or on the levee.
- 3) Construction and maintenance of stockpiles located on the Mississippi River batture.
- 4) All work that disturbs the surface of the ground within 300 feet of the levee/floodwall centerline or 250 feet from the visible levee or berm toe for Mississippi River & Tributaries (MR&T) levee.
- 5) All subsurface work within 1,500 feet of the MR&T levee centerline, and all subsurface work within 300 feet of the levee centerline or 250 feet from the visible levee or berm toe of the hurricane risk reduction levee. Subsurface work includes excavations (digging), ponds, swimming pools, drainage ditches, soil borings, wells, shafts, pile driving, drilling, etc. Permits may not be required for shallow excavations (<2' deep) located a significant distance from the levee based on engineering judgement rendered by SLFPA-E and its partners.
- 6) Seismic surveys and demolition using explosives within 5,000 feet of both MR&T and hurricane risk reduction levees and structures.

D. Review Process:

Original levee safety permit applications with all required attachments must be submitted to the Southeast Louisiana Flood Protection Authority - East, with copies to USACE New Orleans District (MVN) and LA CPRA. The levee district is the permitting agency, USACE MVN and LA CPRA provide technical input. We prefer electronic submittal of the permit application and required attachments via email. Digitally submitted drawing files must be legible and reproducible to scale.

Southeast Louisiana Flood Protection Authority – East
Attention: Stevan Spencer, Chief Engineer
6920 Franklin Ave
New Orleans, La. 70122
permits@slfpae.com

Louisiana Coastal Protection and Restoration Authority (CPRA)
Attention: Billy Wall, Coastal Protection and Restoration Authority/Operations Division
450 Laurel Street, Suite 1200
Baton Rouge, La. 70801
cprarequest@la.gov

USACE New Orleans District
Attention: Amy E. Powell
Operations Division, Inspection of Completed Works
P.O. Box 60267
New Orleans, La. 70160
mvnleveepermits@usace.army.mil

E. Standard Required Information.

Often permit applications are returned due to missing or unclear information. At a minimum, applications should include:

- 1) A completed SLFPA-E Levee Safety Permit Application.
- 2) A Vicinity Map. The map must be in sufficient detail to clearly illustrate the nature of all proposed work and the location of the work in relation to the levee centerline/baseline. Additionally, the map must include the GPS coordinates (latitude, longitude) of the proposed project location.
- 3) A permit application for work on private property immediately adjacent to a levee/floodwall right-of-way must include a property boundary survey (plat) prepared and stamped by a Louisiana registered professional land surveyor.

Permits for more complex projects and/or for work within the limits of the levee/floodwall right-of-way should also include:

- 1) Topographic Surveys. Topographic surveys must be taken by a registered professional land surveyor or civil engineer. Surveys are to be taken perpendicular to the levee centerline/baseline and must extend far enough on either side of the levee to cover the proposed improvement. All distances must be referenced to the levee baseline and all elevations must be referenced to 0.0 NAVD88. All improvements must be referenced to USACE levee baseline stations.
- 2) Plans/drawings. Drawings must be drawn to scale and clearly show limits of work, depth of excavation and all work in relation to the levee centerline/baseline. Cross sections must be plotted to a natural scale of 1 inch equals 20 feet horizontally and vertically. **Final permit drawings** must be

stamped by a registered professional engineer. All drawings must be submitted on 11" x 17" sized paper for review by USACE, CPRA, and SLFPA-E. Drawings which go out for public comment may be submitted on 8.5" by 11" sheets. All plans/drawings are recommended to be submitted in a digital format.

- 3) Copies of any special geotechnical work or reports that were completed for the work covered in the application. All such reports must be stamped by a registered professional engineer.

F. Permitting Guidelines.

- 1) For levee/floodwall crossings, water intake structures in the river and other permitted structures within the limits of the levee right-of-way, the applicant must submit As-Built drawings within one month of completion of the permitted work.
- 2) Utility poles and anchors must be a minimum of 10 feet from the landside levee toe, 40' from the flood side levee toe and to a depth that will not penetrate the theoretical design slope extended below ground surface. All poles that are no longer in-use due to the requested pole installation are removed and the voids are backfilled. The poles cannot be cutoff and remain in-place within 200 feet of the protected side levee toe of a Mississippi River levee. The annular space around new poles installed within 200 feet of the protected side levee toe of a Mississippi River levee is backfilled with a slurry consisting of one part cement, two parts bentonite, and six parts sand mixed with enough water to produce a slurry viscous enough to thoroughly fill the voids. The resulting slurry shall have no less than 12 pounds of solids per gallon. Any abandoned anchor or anchors within 200 feet of the protected side levee toe of a Mississippi River levee toe that are no longer in use due to the requested installation are cut off three feet below the ground surface and the void backfilled with native material.
- 3) Fill on batture must be analyzed for impact to bank and levee stability. Permanent fill on the batture cannot exceed 1 foot above natural ground.
- 4) If levee backfill material is required as part of the permitted work, the PI of the new fill must be 10 or more by Atterburg Limits (ASTM D4318), and the material must be classified as either a CH or CI, by ASTM D2487, with less than 35% sand retained on the No. 200 sieve by ASTM D1140. In addition, the backfill material must have an organic content of no greater than 9%, as determined by ASTM D2974, Method C. Backfill material must be placed in 6 inch lift for the first layer and 12 inch lifts for the succeeding layers. Backfill material must be compacted to the 90% standard Proctor ASTM D698.

- 5) Standard drawings are available to guide the applicant in understanding USACE New Orleans District requirements:

- Surface Crossings Typical for River Levee, File No. 29027
- Limits of Permissible Excavation in River, File No. H-8-45755
- Limits of permissible Stockpile on Riverbanks, File No. H-8-45756
- Limits of permissible Riverside Borrow Pits, File No. h-8-45747
- Concrete Slope Pavement Details, File No. H-8-45782
- Power Line Service Crossing over Levee, File No. H-8-47453

G. Additional Information Requested.

If further geotechnical analysis is needed to evaluate the permit, the applicant may be requested, at his/her cost, to obtain surveys, borings, testing and analysis to verify that the proposed work does not violate USACE required factors of safety. The applicant, through the Freedom of Information Act, can request any soil boring information that the USACE has in the vicinity of the proposed improvement. The applicant can also request data on the annual maintenance surveys on the revetment, if needed from the Channel Stabilization Section in the Civil Branch if the work is on a revetted bank of the Mississippi or Atchafalaya River.

H. USACE Section 408 Permission.

Section 14 of the Rivers and Harbors Appropriation Act of 1899 provides that the Secretary of the Army may, on recommendation of the Chief of Engineers, grant permission for the alteration of a public work so long as that alteration is not injurious to the public interest and will not impair the usefulness of the work. Section 408 permission is granted by the USACE. According to USACE, most work that falls within a federally constructed levee/floodwall right-of-way, federal navigation channel or other federal project boundaries requires Section 408 Permission. Prior to submitting a levee safety permit application to SLFPA-E, applicants should schedule a meeting with the USACE New Orleans District regulatory and technical staff to determine the necessity of securing Section 408 Permission. SLFPA-E cannot issue a levee safety permit for work requiring Section 408 Permission until written proof is provided indicating USACE has granted such Permission.

I. More Complex Permits.

For more complex permits, the applicant is encouraged to arrange a meeting with SLFPA-E, CPRA and USACE New Orleans District regulatory and technical staff prior to submitting a levee safety permit application. This meeting provides a valuable opportunity for the applicant to explain the project and to understand requirements. Typically this results in a more complete permit application and an expedited review.

J. Waivers.

Levee failure during high river stages can be catastrophic. Therefore all work on the MR&T levees including transport of heavy loads over the levee, disturbing the grass cover within the limits of the levee right-of-way, subsurface work within 1,500 feet of the MR&T levee and seismic surveys/demolition using explosives within 5,000 feet of the MR&T project is restricted by stipulations in the permit to being conducted only when the stage of the Mississippi River is below elevation +11.0 feet on the Carrollton gage, New Orleans, Louisiana, unless a waiver is granted by USACE for higher stages. Waiver requests must be submitted by the permit applicant to USACE New Orleans District. They are considered on a case-by-case basis, and are dependent on the surrounding subsurface ground conditions in the vicinity of the project, the type of work, the distance the project is away from the levee and the forecasted river stages. Waivers are only considered when the river stage is forecasted to exceed +11.0 feet but not to exceed +15.0 at the Carrollton gage. Permit applicants are advised to monitor river stages by calling (504) 862-2461, visiting the USACE web site at www.rivergages.com, or checking for daily updates and forecasts issued by the National Weather Service. Only emergency work specifically authorized by the USACE District Commander or authorized delegate is allowed within those distances when river stage is above +15.0 feet NGVD at the Carrollton gage.

Work on or near a hurricane risk reduction levee will be restricted during hurricane season, and will be evaluated on a case-by-case basis for possible waiver.

K. Insurance Requirements.

If the permitted activity is within the limits of the levee/floodwall right-of-way, then the permittee will be required to maintain insurance coverages, at its own expense, without any reimbursement by the Levee District. Details regarding minimum insurance requirements are contained in the document titled SLFPA-E Levee Safety Permit Insurance Requirements.