MINUTES OF
SOUTHEAST LOUISIANA FLOOD PROTECTION AUTHORITY-EAST
OPERATIONS COMMITTEE MEETING
HELD ON NOVEMBER 1, 2012

PRESENT: Louis Wittie, Chair
Stephen Estopinal, Committee Member

The Operations Committee of the Southeast Louisiana Flood Protection Authority-East (SLFPA-E or Authority) met on November 1, 2012, in Meeting Room 221, Orleans Levee District Franklin Administrative Complex, 6920 Franklin Avenue, New Orleans, Louisiana. Mr. Wittie called the meeting to order.

Opening Comments: Bob Jacobsen of Bob Jacobsen, PE, LLC, explained that he was tasked by the SLFPA-E to do a compartmentalization study, which is being funded under a Community Development Block Grant. A stakeholder meeting was held last Tuesday to receive comments on priorities and issues from stakeholders located within the affected polders. A list of proposed potential projects within each polder will be provided to the Operations Committee members for feedback. The list will be finalized and the projects on the finalized list will be individually modeled.

Adoption of Agenda: The agenda was approved as presented.

Approval of Minutes: The minutes of the September 13, 2012 Operations Committee meeting were approved.

Public Comments: None.

New Business:

A. Status report on outfall canal erosion study.

Gerry Gillen, Orleans Levee District (O.L.D.) Executive Director, advised that Ben C. Gerwick, Inc. (Gerwick) was issued a task order to identify and monitor interior bank erosion along the 17th Street, Orleans and London Avenue Canals. A preliminary report was received from Gerwick about two weeks ago. Stations were set along the interior canal walls and quarterly erosion field measurements were taken. Gerwick will provide recommendations in its final report on future actions, including coordination with the U.S. Army Corps of Engineers (USACE) and the Sewerage and Water Board (S&WB), and erosion prevention measures.

Mr. Gillen explained that the East Jefferson Levee District (EJLD) had taken some initial readings on the west bank of the 17th Street Canal. Two areas along the west bank have total losses from 2007 to-date of 3-ft. 3-in. and 2-ft. 10-in. There is little evidence of erosion on the south side of the I-10. The O.L.D. has recorded losses since 2011 in several areas on the east bank of the 17th Street Canal of over two-feet. This is an on-going erosion problem. Homeowners along the 17th Street Canal requested that the

O.L.D. maintenance crew not cut the grass along the edge of the canal thinking that this would alleviate the erosion problem; however, erosion is taking place underneath the grass line. The erosion monitoring along the London Avenue Canal also started in 2011. The erosion along the London and Orleans Avenue Canals is not as bad as the erosion along the 17th Street Canal. Gerwick would like to continue monitoring the erosion along the London and Orleans Avenue Canals until 2013. The erosion monitoring can only take place when the lake water level is low.

Mr. Gillen addressed plans for future work. The O.L.D.'s main focus will be on the 17th Street Canal where there is an exposed bank on the east side of the canal. The erosion appears limited to plus or minus two feet elevation above and below water elevation. The consultant was requested to supply cross sections in order to provide a better picture of the situation and a projection on the rate of erosion. The quarterly field measurements will be continued for the end of 2012 and into three quarters of 2013. The O.L.D. is presently working with several suppliers of anti-erosion measures in order to seek a solution. The final report will be presented in 2013. When the final report is received the O.L.D. will work with the USACE to assess how the bank erosion would affect canal stability and the S&WB to assess its flow velocity and determine agency participation.

B. <u>Discussion of investigation of use of Central Wetlands for water storage.</u>

Robert Turner, SLFPA-E Regional Director, explained that the SLFPA-E has a significant concern about the level of risk associated with the GIWW-IHNC corridor between the Seabrook structure and the Lake Borgne Surge Barrier. There is a concern relative to the I-walls and their ability to resist impact loads from floating objects. A way to significantly reduce this risk is to keep the water levels low enough in this corridor so that floating object cannot hit the I-walls. One way to facilitate this objective is to allow some of the water in this corridor to be diverted into the Central Wetlands after all of the navigation gates have been closed. This would raise the water level in the Central Wetlands by inches and reduce the water level in the GIWW-IHNC corridor by feet. This concept has been brought to the attention of the USACE; however, the USACE's position at this time is that it does not have the authority to proceed with the development of this concept as part of the water control plan. The USACE would be required to inspect and certify the non-federal levees. He stressed that the SLFPA-E should continue doing whatever it can to emphasis the need for additional risk reduction in this corridor.

The Operations Committee requested that a resolution be drafted and presented to the Board for its consideration to support the use of the Central Wetlands as discussed.

C. Status of review of Statements of Qualifications submitted in response to <u>SLFPA-E RFQ for engineering services for levee certification.</u>

Mr. Turner advised that the seven Statements of Qualifications (SOQs) received in response to the SLFPA-E's Request for Qualifications have been provided to the members of the selection team for review and initial scoring. A conference call will be

held to review the initial scores and determine a short list of responders for interview. A recommendation will be provided to the Board. He noted that funding will not be received from the State's Interim Emergency Board for the non-federal levee certification effort. Funding is being requested from the State Capital Outlay Program. The SLFPA-E also requested that the USACE include the non-federal level in the RIP program.

D. Update on armoring for Hurricane and Storm Damage Risk Reduction System.

Brett Herr with the USACE reported on the status of the Hurricane and Storm Damage Risk Reduction System (HSDRRS) armoring. The USACE modified an existing contract on the east bank in St. Charles Parish (Reach 2b) to construct about 5,000 feet of a pilot project for the armoring. A pre-construction conference will be held and the contractor should initiate work within the next two weeks. The current schedule anticipates completing the work around May, 2013. High Performance Turf Mat (HPTM) from five different manufacturers will be tested. Half of the testing will be done with sod and half with seed and fertilizer. The intent of the pilot project is to improve the USACE's plans and specifications and identify potential problems. The USACE will also have a pilot project on the west bank; however, it is still awaiting the right-of-entry. The five manufacturers' products will also undergo testing at Colorado State University (CSU) to determine how they hold up to overtopping. There is a tentative schedule for system-wide implementation with advertisement for the first system-wide contract in July of 2013. He pointed out, however, that this schedule is very fluid and tentative. The system-wide schedule will depend on the number of manufacturers that can be used, the lessons learned from the pilot projects and the USACE being assured that the product can be maintained for years to come. The intention at this time is for the contractor to purchase and install the product. The USACE wants the SLFPA-E to be fully engaged in the pilot project. Mr. Turner commented that the USACE incorporated the comments submitted by the SLFPA-E into the current plan.

E. Discussion of investigation of hardened gages.

Mr. Turner advised that the SLFPA-E monitored a number of gages throughout the system, particularly those maintained by the USACE and the U.S. Geological Survey (USGS), during Hurricane Isaac (Isaac). During the course of Isaac many of the gages either stopped working or stopped outputting reliable data. There are several critical gages that the SLFPA-E must monitor in order to understand what is occurring in the system during an event. Therefore, the SLFPA-E is investigating the implementation of hardened gages. NOAA and the USGS have done some work in this area. The USACE is also looking into this problem. He introduced Tim Osborn with the National Oceanic and Atmospheric Administration (NOAA) Office of Coast Survey.

Mr. Osborn read a letter from NOAA thanking Stephen Estopinal and Bob Turner for their efforts in the very successful Best Practices Training recently held at the OLD facility and commending the SLFPA-E on the exemplary effort to establish the practices and training needed to ensure the responsibilities and work of the member levee

districts are supported with the resources and professionalism of the surveying and engineering community.

Mr. Osborn stressed the need for storm hardened water level and storm surge stations and weather stations, such as those installed in the northeast and other locations. He commented on the importance of the stations in observing a storm. Differing parts of the storm will have differing effects in areas throughout the extent of the storm. Good observation of the system is needed for models, such as SLOSH and ADCIRC.

Mr. Osborn commented on the multiple surges at differing times during Isaac (Maurepas-Pontchartrain surge, river surge, Breton Sound surge and Barataria Surge). The models are desperate for new stations to provide real time water levels at normal times, as well as for monitoring storm surge. Funding was received after Hurricane Katrina to harden the station at the 17th Street Canal. Currently, hardened stations are located at Shell Beach, Bayou LaBranche, Bayou Gauche, Grand Isle, Port Fourchon, Pilottown and Southwest Pass. One of the missing areas is the Pontchartrain area. He commented on a joint NOAA, National Weather Service (NWS) and SLFPA-E working relationship for the installation of additional stations to ensure real time water level-storm surge-weather measurements to an accurate datum that is annually maintained.

Mr. Osborn discussed the system of hardened real time network stations set up in the Mobile Bay area. The stations have no contact with the water. A microwave transmitter in the station shoots down into the water and provides information on the surge throughout an event. The system must be surveyed each year to ensure vertical accuracy.

Mr. Osborn commented on the increasing need for real time monitoring due to increased land loss, higher water levels and increased storm surge threat. A real time network for the Pontchartrain area is estimated to cost approximately one-half million dollars. Weather stations would provide information on wind direction and barometric pressure. He asked that SLFPA-E representatives meet with representations of NOAA and the NWS to develop a layout of needed stations. Recommendations can be provided by NOAA and NWS for the best locations to capture a storm event and for pre-storm coastal storm surge models and by the SLFPA-E on the best locations to observe conditions and be able to react appropriately. A budget can then be developed and funding sought for implementation. Several methods of connectivity (internet, cell phone, satellite) and power (electric, battery and solar panels) can be used for redundancy for the stations. The annual cost to support and maintain five stations is estimated at $75,000 to $80,000. He pointed out that one of the cheapest investments for the protection of the public and infrastructure is the instrumentation that can communicate storm conditions and support the models. Features can be added to the hardened stations to monitor current. The hardened gages can also archive data. Weather stations are estimated to cost $700/each. Mr. Osborn recommended the implementation of a system such as the one in Mobile Bay with the addition of cores in order to obtain information relative to subsidence.

Mr. Osborn advised that Ken Graham with the NWS would like to begin conducting public outreach meetings with every coastal parish to talk about hurricanes and educate the public to focus on flood threat and storm size as opposed to hurricane category.

The Committee directed the SLFPA-E Regional Director to begin the investigative procedure concerning hardened gages as discussed by Mr. Osborn in collaboration with NOAA and the NWS. Mr. Turner advised that a meeting will be scheduled with Mr. Osborn to begin the process of developing a plan for the location of the gages and the development of cost estimates. Once a plan is developed a presentation can be provided to the Board.

F. Discussion of award of contract for Bayou St John Dredging Project. (O.L.D.)

Mr. Gillen advised that the Water Management Report for Bayou St. John, which was funded through the Capital Outlay Program, recommended the demolition of the obsolete waterfall structure at Robert E. Lee Boulevard and the Bayou St. John Dredging Project. A contract was awarded last month for the demolition of the waterfall structure, which is being funded through the Sea Grant Program. The contract for dredging underneath the Bayou St. John Bridge is being funded through the Capital Outlay Program with a cost share provided by the O.L.D. The dredging will allow water to flow through the flood protection structure when the gates are pulsed. The Bayou St. John Dredging Project was advertised and three bids were received. He recommended the award of the contract to the lowest responsive bidder (Anders Construction) in the amount of $185,691.

The Committee concurred with the recommendation that the Board approve the award of the contract to the lowest responsive bidder (Anders Construction).

G. Discussion of award of contract for Bayou Bienvenue Repair Project. (O.L.D.)

Mr. Gillen explained that the Bayou Bienvenue Repair Project was advertised and four bids were received. The lowest responsive bid was submitted by Double Aught Construction in the amount of $930,000. The project includes dewatering, sandblasting and repairing the structure. The project also includes fender work outside of the structure. The ten year cycle maintenance of the structure should have been accomplished in 2006; however, the structure could not be closed at that time because of damage from Hurricane Katrina and post Katrina construction. The project can commence in mid-December and be completed by mid-February or March. He recommended that the contract be awarded to the lowest responsive bidder.

Mr. Turner noted that an effort is underway to decommission the old Bayou Dupre Structure. Based on the information presented today, the cost estimate for this work at the Bayou Dupre that was included in the justification to decommission the structure should be increased.

The Committee concurred with the recommendation that the Board approve the award of the contract to the lowest responsive bidder (Double Aught Construction).

H. Discussion of award of contract for Franklin Administration Building Rehabilitation Project. (O.L.D.)

Mr. Gillen explained that the Franklin Avenue Administration Building Rehabilitation Project includes bringing the air conditioning needs to modern standards, a new suspended hanging ceiling, updated lighting, flooring and an enclosed walkway from the Administration Building to the Warehouse elevator. The project was advertised and nine bids were received. He recommended the award of the contract to the lowest responsive bidder (Construction Masters, Inc.) in the amount of $1,359,000.

The Committee concurred with the recommendation that the Board approve the award of the contract to the lowest responsive bidder (Construction Masters, Inc.).

Levee District Reports:

Lake Borgne Basin Levee District (LBBLD): Nick Cali, LBBLD Executive Director, reviewed the highlights of the status report. He noted that the trolley at LPV 147 that had been freezing up is currently being rebuilt. The trolley should be completed by next week and installed the following week.

Orleans Levee District (O.L.D.): Gerry Gillen, O.L.D. Executive Director, reviewed the highlights of the status report.

Mr. Turner advised that LPV 109 (Southpoint to GIWW) was constructed using a wick drain process in order to achieve a more rapid consolidation and additional increases in sheer strength in a relatively short period of time. Recent measurements indicate that the settlement rate has been faster than anticipated in some areas, resulting in lower heights than anticipated, and some of the sheer strengths are lower than anticipated and needed. The designer of record is analyzing this situation. In addition, the Highway 11 Floodgate has been settling at a very rapid rate. These issues must be worked out before the NCC (Notice of Construction Complete) letter can be issued.

East Jefferson Levee District (EJLD): Fran Campbell, EJLD Executive Director, reviewed the highlights of the status report.

There was no further business; therefore, the meeting was adjourned at 11:30 a.m.