

Region 13, Nueces Flood Planning Group Meeting
June 27, 2022
11:30 A.M. to 1:30PM
McMullen County EOC
306 Live Oak Street
Tilden, Texas

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Agenda Item:

1. Call to Order at 11:35 a.m.
 - a) Roll Call

Voting Members:

David Baker	Electric Generating Utilities	Absent
Debra Barrett	Agricultural	Present (Online)
Larry Dovalina – Vice Chairman	Water Utilities	Proxy (David Wright)
Lj Francis - Chairman	Municipalities	Present
Sky Lewey	River Authorities	Proxy (Julie Lewey)
Shanna Owens -Secretary	Counties	Present
Jeff Pollack	Industries	Absent
JR Ramirez	Water Utilities	Present
Adnan Rajib	Public	Absent
Andrew Rooke	Small Business	Present (after roll call)
Larry Thomas	Flood Districts	Present (Online)
Lauren Hutch Williams	Environmental	Present

Guest:

Robert Williams	Mayor of Jourdanton	
David Wright	City of Cotulla	Water & Wastewater
Britni Van Curan	Atascosa County	911 Rural Addressing/Subdivision
Sarah West	Freese & Nichols	
Tressa Olsen	TWDB	Stormwater Engineering
Pat E. Brawner	Medina County	

Online:

Kimberly Kreider Dusek	Melinda Malone	Debbie Farmer
Luke Whitmire	Randy Wright	Tammy Embrey
James Bronikowski	Lisa McCracken	Nelda
Kathy Ipad	Louie Ray	
Travis Pruski	Nueces River Authority	Director of Planning
Kristi Shaw	HDR	

Bryan Martin
Suzanne DiPiazza
Lorie Flores

HDR
Nueces River Authority
Nueces River Authority

2. Prayer
Lj Francis led the prayer
3. Public Comment
No Comments
4. Approval of minutes from the May 16th, 2022, RFPG Meeting
Motion to approve minutes as presented made by Shanna Owens seconded by JR Ramirez. Motion passed unanimously.
5. TWDB updates/Presentation - Tressa Olsen with TWDB
 - a) Tressa Olsen: Newsletter was sent out last week. Will resend email to board members.
 - Flexibility for Certifying RFPG Administrative Expenses (e.g., Regional Flood Planning Group Member Travel)
 - Important Note for Flood Management Evaluations (FMEs), Flood Mitigation Projects (FMPs) and Flood Management Strategies No Negative Impact
 - Looking ahead: Public and TWDB Review of Draft Regional Flood Plan
 - Funding Surveys for flood management Evaluations (FMEs), Flood Mitigation Projects (FMPs) and Flood Management Strategies (FMSs)
 - Nature-Based Solutions Guidance Manual for Flood Mitigation in Texas
 - In Case You Missed It: Q&A on Sponsors for FMEs, FMSs, and FMPs in the Regional Flood Plan
 - Texas State Soil and Water Conservation Board (TSSWCB) Ten-Year Dam Repair, Rehabilitation and Maintenance Plan
 - Progress Updates, Reminders, and Upcoming Events

Discussion: No questions or comments as of now.
6. Discussion and possible action: Status update on recommended FMX descriptions and associated information for the Draft Plan (Task 5) - Sarah West - Freese & Nichols - Status update on FMX
 - a) Previous Actions:
 - RFPG recommended the FMS, FMP, and FMEs as presented at the May 16, 2022, Meeting.
 - b) Updates after May meeting (05/16/2022)
 - additional communication with sponsors
 - Completion of FMS, FMP, and FME tables
 - Some changes recommended to FMS, FMP, and FMEs based on 1) Screening process and 2) Additional Sponsor input

Additional detail on how the screening process works for FMEs but are very similar to FMPs and FMSs

1. Remove FMEs that do not support a specific RFPG Goal.
2. Contact Sponsors:
 - Verify if study has been completed.
 - Verify interest in potential flood mitigation action
 - FMEs Request additional data to refine FME areas.
 - Remove FMEs that have been completed, funded, or if Sponsor is not interested.
3. Analysis:
 - Refine FME areas as needed.
 - Populate flood Risk Indicators.

- Calculate cost for FME.
4. Re-Classify
 - Evaluate quantifiable results and identify FMEs that could result in the greatest benefits.
 - Identify FMEs that have real potential to develop into FMPs for the next cycle.
 - Identify FMEs that could be re-classified to FMPs.
 - Identify FMEs located in areas of greatest need (use Task 4 results)
 5. Goals
 - Review selected FMEs to verify they address short-term goals.
 - Develop additional FMEs as needed to cover short-term goals.
 - Identify Sponsors for addition FMEs and obtain their commitment.
 6. Recommend
 - Final FME Recommendations.

Summaries on Flood Management Evaluation (FME)

Broken up into four types of projects: 1) Preparedness projects: spilt barriers, debris removal, gages etc. 2) Project planning: identifying drainage projects, flood settings 3) watershed planning and flood insurance studies (FIS). 4) Other category including property acquisition, bio programming, and dam safety.

Some draft numbers are still in the screening progress and making sure they have all information correctly before the final draft plan. Summary started out at 166 FME identify and now are at 154 FME. The total cost of those FME is around \$1.02 million at this point. Part of the process is estimating the cost of FMEs. So, the cost to do the study or get to 30 percent design of the project (the amount of the project was already given above.) associated with construction cost. Everything is put together to get an idea of the total cost for the project. Just remember a lot of the FME are still very preliminary and don't know what kind of construction is needed. Right now, total cost for construction based on information gathered is at \$550 million dollars.

Summary on Flood Management Strategy (FMS)

6 different kinds of categories broken up into 1) Education Outreach- such as flood safety programs and turn around don't drown campaign. 2) Flood Measurement and warning systems (flood gages or early alert systems) 3) Property acquisition and structural elevations to include acquisition of open space, flood plains, or high-risk property acquisition. 4)Regulatory and guidance to include storm water management criteria development, helping communities, and flood management staff acquisition and training. 5) Infrastructure projects like cost of intermittent infrastructure 6) Other Category infrastructure inspections. We started out with 50 FMS identified, now down to 30 FMS. The total cost for those FMS is estimated at 14.5 million dollars.

Summary on Flood Mitigation Project (FMP)

Started at 4 FMP on list and one FMP was removed due to project already being funded per sponsor. Left with 3 identity projects to investigate deeper into the screening process. The 3 projects included bed material and treatments in the selected streams in the Edwards Plateau and drainage easements south central Lamar drainage easement. After going through the screening process, none of those were to the level of an FMP. So, we don't have any FMP on the list right now. They didn't provide defined level of services or benefit or proof of no negative impact at the current stage. So, we are proposing to put them into the FME category at the time and bring them up to level of an FMP later. In the future, we look forward in general to moving some of the FME into FMP category. That will be task 12 going forward. In future would have to bring those FME back to flood planning group to review and decide which ones to bring forward to task 12 FMP Category.

Question:

Can you explain what you mean by none of the FMP that were reviewed met the no negative impact determination? Out of the 3 identified FMP, 2 FMP were property acquisition so wouldn't be able to define a discrete benefit because there weren't specific projects associated with it. The bed material and treatment weren't well define either in that it didn't have exact location and specific method of what was going to done to reduce the rock and stones coming down settling on this low water crossing and damaging this low water crossing. The project was not well defined enough to know what that project would be.

7. Discussion and possible action: Status update on impacts of the Regional Flood Plan and contributions to and impacts on water supply development and the State Water Plan (Task 6)

Presentation- Kristi Shaw HDR

- Overall goal: summarize the impacts of implementing the RFP (6A) and contributions to/impacts on the water supply development and state water plan (6B)
- 1. 6A-Impacts of the RFP**
- Region-wide summary of the benefits of implementing recommended RFP and reducing Flood risk
 - Narrowing data gaps: Flood impacted areas and Population
 - Structures in Floodplain-Critical Facilities and low water crossings
 - Impacted Roads
- Statement of no-negative impacts to neighboring areas within/outside of flood plan region
- Summary of socioeconomic and recreational impacts
- General impacts to environment, agriculture, recreational resources, water quality, erosion, sedimentation, and navigation.
- **Impact and Contribution to the RFP (Task 6)(Cont.)**
- 2. 6B-Contributions to and impacts on water supply development and the state water supply:**
 - Identify FMPs and FMSs within the RFP that would impact the state water supply plan
 - Individually List FMX that impacts water supply
 - Contributions to water supply
 - Measurably quantifiable volume of water
 - Benefits to water supply (firm yield), water availability-Direct and water availability- Indirect
 - Reduce Water supply
 - Measurable Quantifiable volume of water
 - Water Availability and water supply
 - **Socioeconomic**
 - FMXs distributed and balanced across FPR
 - Diverse population centers
 - Benefiting all socioeconomic groups
 - **Recreation**
 - Opportunities to convey floodplains
 - Utilize parks and recreation activities
 - Potential to voluntarily convey land to conservancy groups
 - **FMSs with Water Supply Opportunities**
 - **Off channel reservoir near Lake Corpus Christi**
 - a. Provides for flood/water supply balance
 - b. Increased water level management at Lake Corpus Christi (LCC)
 - c. Option to use in conjunction with Aquifer Storage and Recovery (ASR)
 - **Two-way Pipeline**

- Ability to manage water levels between LCC and CCR by diverting floodwaters coming down the Nueces and Atascosa Rivers and sending up to CCR which has a larger storage pool
- Manage lake system as one
- **Sediment Removal**
 - Provides increased capacity for flood and water supply
 - Improves operation efficiency of LCC operation
- **Diversion Pipeline from the Nueces River to CCR**
 - Move flood flow into CCR, takes advantage of additional reservoir capacity

Kristi's update: these are four projects that have been identified to have some flood protection and water supply opportunities. These weren't on the list last month as we had not evaluated all the information and were still trying to firm up all the FMX and impact analysis. This is just an update on Task 6.

Questions:

Is there a map over laying the area where flooding is a problem with these projects?

A map will be included in the plan but not in the slide show presentation today.

Want to be clear are you saying you are proposing to add some of these projects to the FMP list?

They would be added as FMS not FMP.

Is the intent of this section to show the impact and contribution on how we can benefit from basically having excessive water flooding to supplement or create a storage for water supply varies depending on demand? This portion of the plan could be self-contained and in terms of water supply and flooding would not go back into recommended FMS. If we were to implement one these projects, it wouldn't necessarily improve or reduce flooding for the entire area but could help mitigate impact.

What is the intention of the water development board with this section?

It would to both reduce flooding and improve beneficial water retention for water supply.

We graded these projects along with traditional flood reduction projects. I think some of these projects would score lower than others. The intent was to keep these separated,

We haven't really created criteria for scoring yet. If a project diverted flood waters and reduce risk and helping water retention and water supply that it would be scored higher and then again can't conclusively confirm that would be true for all four FMS.

Can you explain Aquifer storage and recovery?

Corpus Christi and Corpus Christi ASR Conservation District have been exploring ASR from a different capacity to determine the ability to treat and store wastewater flows but there was previously a water management strategy evaluated during a Region N planning cycle that looked how ASR could be used in the waters that are coming down near Robstown area being able to store in an Aquifer. It didn't show a large yield mainly because of how the reservoir systems are operating and how it ties into Agreed order provisions which determines how much water is to be release from the reservoir systems based on inflow coming in based on agreement the City of Corpus Christi has with TCEQ. So, I think the real promise lies with respect to coupling it with an off channel reservoir that hasn't been looked at through the Regional Water Planning Group. What ASR does if you have a suitable aquifer nearby then it is possible to divert that water based on water rights for storage and recovery during droughts. Not all aquifers are suitable, and you don't want to it in a fractured aquifer unless your sole purpose is to help ground water levels or riparian ecosystems. To store water for supplemental benefits of water recovery and supply, you want control over the storage. If there is an aquifer system nearby that will provide reliable yield, it can help with protection against extreme heat events like a drought by allowing one to tap into the water and create that ability to store more water when it is available. It can be used in conjunction with operations of a reservoir system. Reservoirs could also be used to hold storm water and provide water quality benefits through natural settling which reduces treatment plant needs.

Have the Aquifers been mapped in this area for aquifer storage and recovery?

The underlying aquifer is the Gulf Coast Aquifer and we have looked at Nueces County but not along where the Nueces off-channel reservoir is located. Most of that is local and certain sites. The Texas Water Development Board study mapped the major and minor aquifers and have a good idea what the area looks like.

After some discussion:

Do we want to represent these projects as potential flood strategies, or should we keep in standalone in Chapter 6? Is there a preference from the board? All in Favor of including projects 1,2,3, &4 to be shown both as FMS and Chapter 6 all in favor say I and all opposed say nay. Motion passed unanimously.

8.Discussion and possible action: Follow-up on Coastal Rise Scenarios for Future Flood Condition Analysis
Presentation By Sarah West - Freese & Nichols

Previous Actions:

- Method approved by Regional Flood Planning Group on March 28,2022
 - Year 2085 “low” model data for Rockport, TX (GLO/USACE Coastal Texas Study)
 - 1.2-ft sea level rise (SLR)
 - FOIA request submitted to USACE
- Submitted methodology to TWDB on April 22,2022
- Methodology approved by TWDB on June 7,2022
- GLO/USACE Coastal Texas Study does not have modeling files available for that scenario (per FNI conversations with USACE staff)

Proposed Actions:

- Use Similar methodology as Inland Riverine areas
 - Horizontal buffer
 - Based on elevation instead of population
 - Use NOAA 2022 intermediate SLR (1.1-ft)
- Horizontal Buffer Process
 - Divide into 3 coastal zones-Baffin Bay, Corpus Christi, and Copano
 - Determine average slope for each zone
 - Determine typical horizontal offset for each zone based on SLR and Slope
 - Apply buffer to existing 1% and 0.2% annual chance coastal flood inundation boundaries
 - Submit revised method to TWDB for approval

There was discussion about adding a fourth zone to account for the island due to the low -lying elevations and need to create additional contours to evaluate impact of 1.1 ft SLR.

Previously the RFPG had adopted a 2017 method, now we have an updated 2022 method. All in favor of use of the new 2022 updated method to request TWDB approval say aye, and all opposed say nay. Motion carries.

Take Action:

Motion all in favor of adding a fourth zone which consist of only the barrier island as shown in the presentation. Julie motioned to create a fourth zone on the barrier island Lauren second that. All in favor say aye and all opposed say nay. Motion carriers.

9.Discussion and possible action: Consider defining emergency need and classification of infrastructure quality

Define Emergency Need:

The regional flood plan must identify if a particular flood solution meets an emergency need

Discuss what constitutes an emergency need

- All flood related solutions?
- Only those related to loss of life?

Define How Infrastructure Will Be Classified as Damaging or Failing

- Existing infrastructure is categorized as functional, non-functional, or deficient in Chapter 1 (section 1.11)
- Deficient infrastructure applies to constructed or natural features in poor structural or non-structural condition in need of replacement, restoration, or rehabilitation.
- TCEQ Dam Safety Program monitors private and public dams and periodically inspects dams that pose high/significant hazard.

After some Discussion:

Motion to accept the 1st comments from Texas Water Development board and define the emergency need as all areas for which a FMX addresses flood issues and define Infrastructure as in our packets and screen by no further redefinition on what's there. Can I get a motion? Motion by Julie Lewey seconded by Shanna Owens. All in favor say aye and all opposed say nay. Motion carriers.

10. Discussion and possible action: Overall project schedule, draft chapters, public hearing process, and next steps

- Near Term Activities:
 - Chapter release and review
 - Consider adoption of Plan at RFPG meeting on July 18th
 - Submit to TWDB by August 1st deadline
 - Public hearings. Confirm date, time, and place.

Updates by Kristi Shaw HDR:

1-3 chapter have been released and sent out. If you have any problems getting into the chapter, please let Kristi Shaw know. There was also an excel log added so every time we upload a new chapter you will have the date and time.

Any comments we will need back before the meeting or by the 13th.

Also added was the Water Development Board guidance if you want to review that.

July 18,2022 is a very important meeting where adoption the plan will be considered. Please make sure to attend, if not, please have a proxy for someone to attend that day.

Plan is due on August 1,2022 to the Texas Water Development board and after it is published in a public place it starts the 30-day review period. We need to notify public and put on the Nueces River Authority website and use links for story map which will be used to discuss areas and public comments at the public hearing. 30 days after the hearing we will still be taking comments. Also, we need 3 hard copies when plan is released. 3 different locations and online will discuss more at next meeting.

11. Discussion and possible action: Schedule Public Meeting

After some Discussion

Motion to approve the scheduling public hearing 30 minutes prior to the September 26,2022 meeting motion by Andrew Rooke seconded by Julie Lewey all in favor say aye and all opposed say nay. Motion carriers.

12. Discussion and possible action: Advertise Open Membership – River Authority

After some discussion:

A reminder that if needed the executive board will meet if needed. The executive committee includes Larry Thomas, Shanna Owens, Debra Barrett, and Andrew Rooke.

Motion to open advertising for the River Authority member interest category motion by Shanna Owens seconded by Andrew Rooke all in favor say aye and all opposed say nay. Motion carriers.

13. Update from Planning Group Sponsor – Nueces River Authority regarding administrative matters of the Regional Flood Planning Group

I. Financial Update

II. Update Schedule of 2022: July 18th, September 26th, December 12th

14. Update from Patrick McGinn Liaison to Region 12 San Antonio RFPG and Region 15 Lower Rio Grande RFPG

Patrick McGinn is out ill. Discuss at the next meeting

15. RFPG members' comment

Lj Francis wants to thank David Wright for stepping in for Larry Thomas and for participating in previous meetings, thank you for always being here.

16. Motion to adjourn and seconded. Motion passed unanimously at 1:41 p.m.