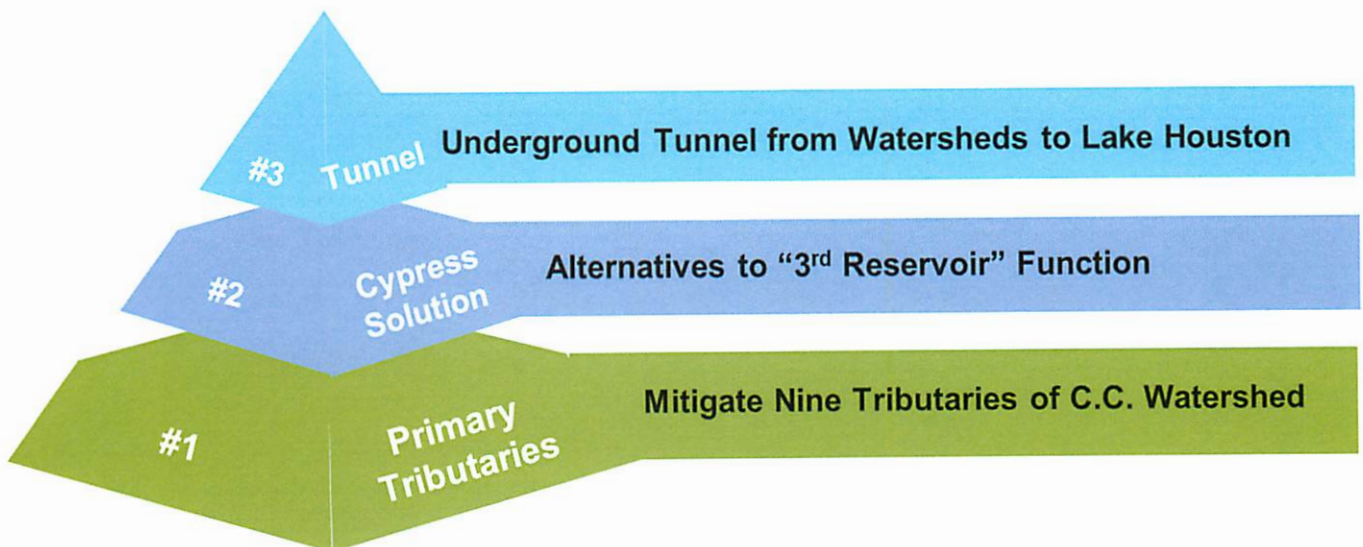




CYPRESS CREEK
FLOOD CONTROL
COALITION

2018 ANNUAL REPORT

CCFCC GOAL: FLOOD RISK REDUCTION



...community organizations united for collaboration in regional government watershed management...

Cypress • Houston • Spring • Tomball • Waller

Index

	<u>Page</u>
Index	1
<i>Preface</i>	2-3
President's Letter	4-5
Highlights –Year 2018	6-7
Funding Flood Mitigation	
• Comparison of Harris County Major Watersheds	8
• Land Area to Capital Improvement Program Funding, 5-year ending 2021	9
• Federal Flood Projects, Harris County Watersheds	10
Map illustrating Major Tributary streams, Cypress Creek, 2003/2019 update	11
• Major Tributaries Data (for each of the 9 tributaries)	12
• Mound Creek information and map	13-14
Cypress Creek Greenway Project, Annual Report for 2018	15-17
Army Corps / Harris County to study reservoirs (10/12/18)	18-19
Harris County to begin work on new floodplain maps (09/25/18)	20-21
Website: Updated website commissioned in February 2019	22-23
Little Cypress Creek Frontier Program (project update)	24-25
New <i>Flood Mitigation Task Force</i> formed by Houston Northwest Chamber of Commerce	26-27
Congressman John Culberson news items during federal funding debates for Hurricane Harvey disaster recovery legislation	
• Detail, Chronology, descriptions and amounts	28-32
• Some e-mail exchanges with CCFCC (includes “3 rd Reservoir”)	33-36
“McCaul orders Army Corps of Engineers to expedite flood mitigation studies	37
Developers react to Post-Harvey flood control regulations	38-42
Finance Statements and Budget	43-45
Board of Directors	46

Preface

“Today’s Choices Avoid or Create Tomorrow’s Disasters”

If we continue at-risk development and ignore the impact to others, can
We: Accept the consequences, and Are you willing to pay for it?”¹

The Cypress Creek Watershed community is a place within the unincorporated area of Harris County we call home and deeply care about. It is growing quickly and with it we want to attract the families and business organization that will care for our neighborhoods. Not just a few subdivisions but throughout the watershed’s 320 square miles - - - an area stretching from its headwaters on Mound Creek in Waller County downstream 60 miles to its mouth at the confluence with Spring Creek.

Many of our residents are 3rd generation inhabitants. Others have moved out from the City of Houston metropolitan area to enjoy the forested urban subdivisions with tree shaded stream banks, rich with fish, birds, animals and a quality-of-life environment. A place conducive to raising children with an appreciation for nature. A quiet living style and an environment which helps bring friends and neighbors together.

As the watershed inhabitants increased, so did the bulldozers’ clearing of trees and piling dirt higher for new developments. The result? Increased stormwater flooding into neighbor’s homes and yards and into our downstream watershed communities. While this is a concrete truck driver’s dream, it was and continues to evolve into an environmental and politically-driven challenge. Flood waters have risen significantly higher into many neighborhood homes, which had previously never flooded. New subdivision street drains, inadequate stormwater detention basins and MUD treated sewage water feed are increasing the amounts of water flowing into Cypress Creek, thereby heavily worsening out-of-bank flooding.

A Cypress Creek watershed master plan prepared by Turner, Collie and Braden (TC&B) (1984) had been approved and officially adopted by Harris County Commissioners Court. However, funding for implementation of the recommended drainage infrastructure to achieve the essential flood management essentially did not occur. The Commissioners Court approved Capital Improvement Program (CIP) annual funding for nearly 3 decades failed to reflect parity in funding throughout the 23 county’s watersheds; the most significant being the Cypress Creek watershed. (See chart contained elsewhere in this report).

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¹ Association of State Floodplain Managers, website http://ccap.org/assets/2_Sameantha-Medlock_ASFPM-NAI-Overview_Nov-15-2013.pdf

Preface (continued)

Now, 3 decades later, after adoption of the TC&B master plan was not implemented, the above quoted ***“Choices which Avoid or Create Tomorrow’s Disasters”*** has occurred. Unabated flooding during the 2016 Tax Day and 2017 Hurricane Harvey storm national disasters. Government decisions during 2018 have finally paved the way forward to the start of reversing the ***“rising waters”*** flood risks in the Cypress Creek Watershed and neighboring northwest unincorporated Harris County watersheds.

This 2018 Annual Report describes some of this good news at a summary level. It also includes plans the CCFCC board of Directors has developed and actions underway going forward. Today’s 2018 choices are a good choice start towards reducing increased flood disasters. However much remains to be done. Going forward wiser decisions and actions by our elected officials are essential and must be made with due diligence. Otherwise, what we can reverse and lessen in future flooding impact for all of us, will not happen.

Today, the Cypress Creek Flood Control Coalition of communities, business, government and elected officials are collaborating. The CCFCC mission remains unchanged from its beginning in 1999: i.e. ***“Develop awareness, analyze risks to life and property, and plan/implement regional storm water flood reduction and positive environmental preservation of forested floodplain corridors throughout the Cypress Creek Watershed.”***



CYPRESS CREEK FLOOD CONTROL COALITION

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1

President's letter

March 20, 2019

The Cypress Creek Watershed is by far the largest in land area of all of Harris County's 22 major watersheds. Its urban development landscape has changed immensely during the past 40 years from an agriculture landscape of rice fields and pastures to one of the most aggressive urban development areas in the Texas Gulf Coast.

This change includes a massive increase in stormwater drainage – in both volume and rate of runoff. Although brought to the attention of our government authorities many times during the past 20 years, clear progress in resolving the “**Rising Waters**” issues did not happen until 2018. Then it happened across many fronts. An abbreviated summary good for short reading is included in this report section titled “High Lights”. Beyond this, the very good news of progress includes the following:

- Funding: The first positive flood mitigation infrastructure funding since before CCFCC was created. This encompasses but is not limited to the following:
 - Federal funding (See information in this report under “Federal Funding”. detailing the \$148 billion Harvey disaster recovery funding.
 - The highly successful \$2.5 billion Harris County Flood Control flood bond election.
 - The Year 2019 State of Texas legislative session goal to create a new grant-based financial mechanism operated by the TWDB and initially funded through the “Rainy Day” fund.
- Land development permit regulatory requirements issues: Existing detention requirements fall short of meeting the county's “**No Adverse Impact**” flood plain management restriction. Although resolution of these issues has not been resolved, meetings of Harris County Flood Control District (HCFCD) management and CCFCC management's technical expert consultants have begun. Temporarily suspended to accommodate further ongoing investigation, this collaborative process essential to possible resolution is expected to resume in 2019.
- Restart occurred of a major proposed project updating a 2003 master drainage plan encompassing all 9 major Cypress Creek tributaries. This is a very important element in development of a current conditions flood risk reduction plan which ended up in the government archives gathering dust until resurrected in 2018 by a joint CCFCC / HCFCD / Commissioner Cagle effort. It is now being updated from 2003 to 2019 current conditions – as a necessary step in preparation for implementation funding approval by Commissioners Court in 2019.

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...community organizations united for collaboration in regional government watershed management...

Spring, Texas • Houston, Texas • Cypress, Texas • Waller, Texas

4

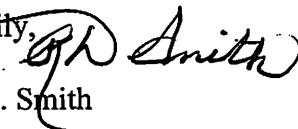
- Conceptual plan completion of an overall Cypress Watershed Flood Drainage System. Illustrated on the front cover to this Annual Report, it consists of the following 3 main interacting elements designed to function via a systems engineering design approach:
 - Primary Tributaries regional master drainage and environmental (9 tributaries including the ongoing Little Cypress Frontier program).
 - Alternatives to the “3rd Reservoir function for capture and controlled release of floodwaters flowing down from the headwaters (basically Mound Creek) into Cypress Creek, then the Cypress overflow into Addicks and onward downstream into Addicks Reservoir and its outflow into Buffalo Bayou. Note: This encompasses 4 ongoing investigation / planning evaluation projects including one by the US Corps of Engineers with whom CCFCC resumed planning discussions after the Tax Day Storm.
 - Main channel flood water conveyance alternative to widening Cypress Creek thru miles of the middle and lower watershed communities – a clear financial and environmental impact to be avoided scenario. This will be an underground tunnel from the watershed to the Lake Houston area.

It is said the Cypress Creek Watershed has become the region’s “Poster Child” for ever-worsening, catastrophic storm-crippling disasters. This has not been an immediate phenomenon – it has developed over decades. Funded entirely with voluntary donations made by a few watershed Moods, several years of investigations of (1) Harris County land development flood mitigation drainage criteria and, (2) flood plain modeling have been completed by independent technical engineering experts contracted by the Cypress Creek Flood Control Coalition. The findings / conclusions have identified / determined changes as described above are needed.

In summary, I believe, as a result of very aggressive 2018 technical and political collaboration, CCFCC’s now has the greatest level of optimism that progress in achieving our goals is the most positive in the last 20 years.

How can the Cypress Creek Watershed community be most helpful? Seek and obtain agreement from your Municipal Utility District to become a CCFCC member and make the commitment for making voluntary sustaining donations to CCFCC at the same level as existing MUD donations; i.e. an amount equivalent to 50 cents per month per customer. There is no cost to join, no cost for annual dues, and the 50 cent contributions by their water users is a qualified tax exemption. We have a very aggressive ongoing process wherein to keep it moving forward, funds are needed to continue paying for the expensive technical experts which are the back bone of CCFCC continued success.

Respectfully,


Richard D. Smith
President

High Lights Annual Report 2018

- **Watershed Anniversary Dates**
 - Community Town Hall meetings creating CCFCC and charter 20 years ago (1999)
 - Tax Day flood 2 years ago (2016)
 - Harvey - - - Presidential declared disaster 1 year ago (2017)
- **Severe under-funding of Cypress Creek watershed flood mitigation by Harris County Commissions Court:** CCFCC meetings held with Judge Ed Emmett seeking to remedy decades of immense inequity in Capital Improvement Program (CIP) funding for Cypress Creek Watershed. Our plea for parity within the overall 23 watersheds concluded in acceptance of CCFCC request and agreement to take issue up with Harris County Flood Control District. (This preceded the decision to hold the flood bond election...
- **“Rising Waters Crisis”:** CCFCC consultants complete 2-year technical evaluation of Cypress Creek Watershed floodplain mapping. Work Authorization #21 report of findings issued in April. Major deficiencies trigger CCFCC meetings with County Judge / Commissioners. Floodplain computer modeling based on 2001 LiDAR topography determined to be outdated and in need of updating
- **Atlas 14 – Precipitation increases.** Increase volume and runoff is contributing to increasing flood risk exposure to watershed residents. Our conclusion: Cypress Creek watershed floodplains are expanding with resulting increased flood risk. New flood plain modeling kickoff in 2019 will produce new floodplain maps. Expected completion in 2021. See news release elsewhere in this report for more details = *“Harris County to begin work on new floodplain maps”*
- **Flood Mitigation Task Force created by Houston Northwest Chamber of Commerce;** Provides sustaining promotional advocacy for flood mitigation projects in Cypress Creek, Little Cypress and Spring Creek watersheds. Joint discussions conclude with teaming agreement.
- **CCFCC collaboration with U.S. Army Corps of Engineers continued.** Encompasses flood risk assessment / feasibility evaluation/implement regional solutions to upper Cypress / Addicks / Buffalo Bayou interconnected drainage besieged with worsening flooding as new urban development continues unabated. Also addresses HCFCD request to USACE to evaluate Harris County flood drainage criteria to determine if adequate in terms of achieving county “No Adverse Impact” regulation.
- **Harris County Flood Control District:** New administration undertaking “heavy lifting” challenges, good progress is noted and appreciated by CCFCC.
- **CCFCC meetings with Harris County Flood Control Engineering Management:** Continued our Technical Management discussions centered on questioned adequacy of HCFCD development flood mitigation criteria - - - issue that the Harris County *No Adverse Impact* regulation as a condition to obtain approval of development permit applications is, in general, not being met or enforced.
- **News reports claim new Flood Control Regulations meet with resistance by developers.** For details see article elsewhere in this report, *“Post-Harvey Flood Control Regulations Are Hitting Developers Hard”*

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- **CCFCC meets / collaborates with Waller County officials.** CCFCC shares concerns about their regulatory requirements, flood mitigation criteria and lack of meaningful government funding for infrastructure - - - all as applicable to Cypress Creek Watershed areas in Waller County.
- **Website update.** Update to remedy outdated technology / add “Donation” button nearly completed. See page in this report with further details.
- **CCFCC joins in expanding collaboration with 2 key regional flood mitigation and funding advocacy organizations:**
 - Bayou City Initiative created and led by Jim Blackburn.
 - “Houston Stronger” consortium created by West Houston Association and Greater Houston Builders Association.
- **“3rd Reservoir” concept.** Cornerstone as 1 of the 3 interlinked elements in an overall systems engineering approach essential to reversing the worsening flood risk to downstream Cypress Watershed communities. This ignites implementation of several engineering evaluations to develop an implemental plan for controlling worsening volume and rate of floodwater flowing out of upper Cypress Watershed- - - a process which begins at the headwaters in Waller County. Implementation of an overall watershed drainage plan impossible without collective funding by Harris County, State of Texas and Federal Government. *Note: See discussion of funding in Congressman Culberson documents = email from Gus Ashton 6/20/18 “Overview of Disaster Supplemental Funding*
- **Underground tunnel is only apparent feasible solution identified for conveyance of main stream flood waters.** CCFCC hosts meeting discussions with potential contractor and HCFCD initiates feasibility study to verify compatibility with Houston area soils.
- **Disaster Emergency Relief funding by federal government. \$148 Billion.** See Culberson letter elsewhere in this report
- **Flood Bond election in Harris County highly successful...** Expectations are this will meet federal “matching funds” requirements and perhaps thereby yielding \$3, 00 federal for every \$1, 00 local funds.
- **Mid-Term Election in Harris County creates uncertainty in flood risk reduction in Cypress Creek Watershed.**
- **Voluntary Home Buyout:** Significant increase in federal funding with goal to reduce flood damage by removal of homes faced with past history and increasing risk of flooding due to rising waters.
- **Little Cypress Frontier Program:** Continued progress and additional funding via the flood bond. Update on progress is contained elsewhere in this report. At a glance:
 - 52 square miles
 - Seven (7) regional detention basins
 - 14,000 acre-feet of storage.
- **CCFCC funding increase needed after nearly 20 years of volunteer donations.** Oversight of significant new projects design/implementation requires voluntary donations from additional donor watershed organizations. Monthly voluntary funding by 5-6 MUDs has benefited the entire watershed community for nearly 20 years. Now we are asking others to share this necessity, PLEASE CONTACT A CCFCC DIRECTOR TO LEARN HOW THIS IS BEING DONE THROUGH WATER BILLS / TAX WRITE-OFFS.

Flood Mitigation Funding Examples

Harris County Watershed: Size vs. \$ Funding

Annual Report 2018

<u>Watershed</u>	<i>Size</i>	<i>Harris County</i>	
	<u>Sq. Miles ¹</u>	<u>Federal \$ ²</u>	<u>CIP Funding ³</u>
White Oak	110	\$124 million	\$10.3 million
Sims Bayou	94	\$390 million	\$10.2 million
Brays Bayou	128	\$480 million	\$38.7 million
Buffalo Bayou ⁴	101	?	\$17.8 million
Cypress Creek ⁵	320	None shown	\$ 8.9 million

Note: There are 22 watersheds in Harris County, TX. This chart does not show the data for all 22. The purpose is to illustrate the extreme lack of parity in funding in comparison to land area vs. flood mitigation funding and hence mitigation projects.

Area: Cypress Creek watershed (the largest in land area (nearly the equivalent of White Oak (110), Brays (128), and Sims Bayou (94) combined (332 sq. miles vs. Cypress Creek (320 sq miles).

Funding:

Federal \$: White Oak (\$124) Brays (\$1480) and Sims (\$390) = \$994 vs. Cypress Creek \$ -0 Harris County: White Oak \$10.3. Brays 38.7 and Sims \$10.2 =combined \$59.2 million vs. Cypress 8.9 million

Annual Report 2018 Flood Mitigation funding

¹ Source: Harris County Flood Control District

² Source: Federal Briefing, HCFCD Spring 2018

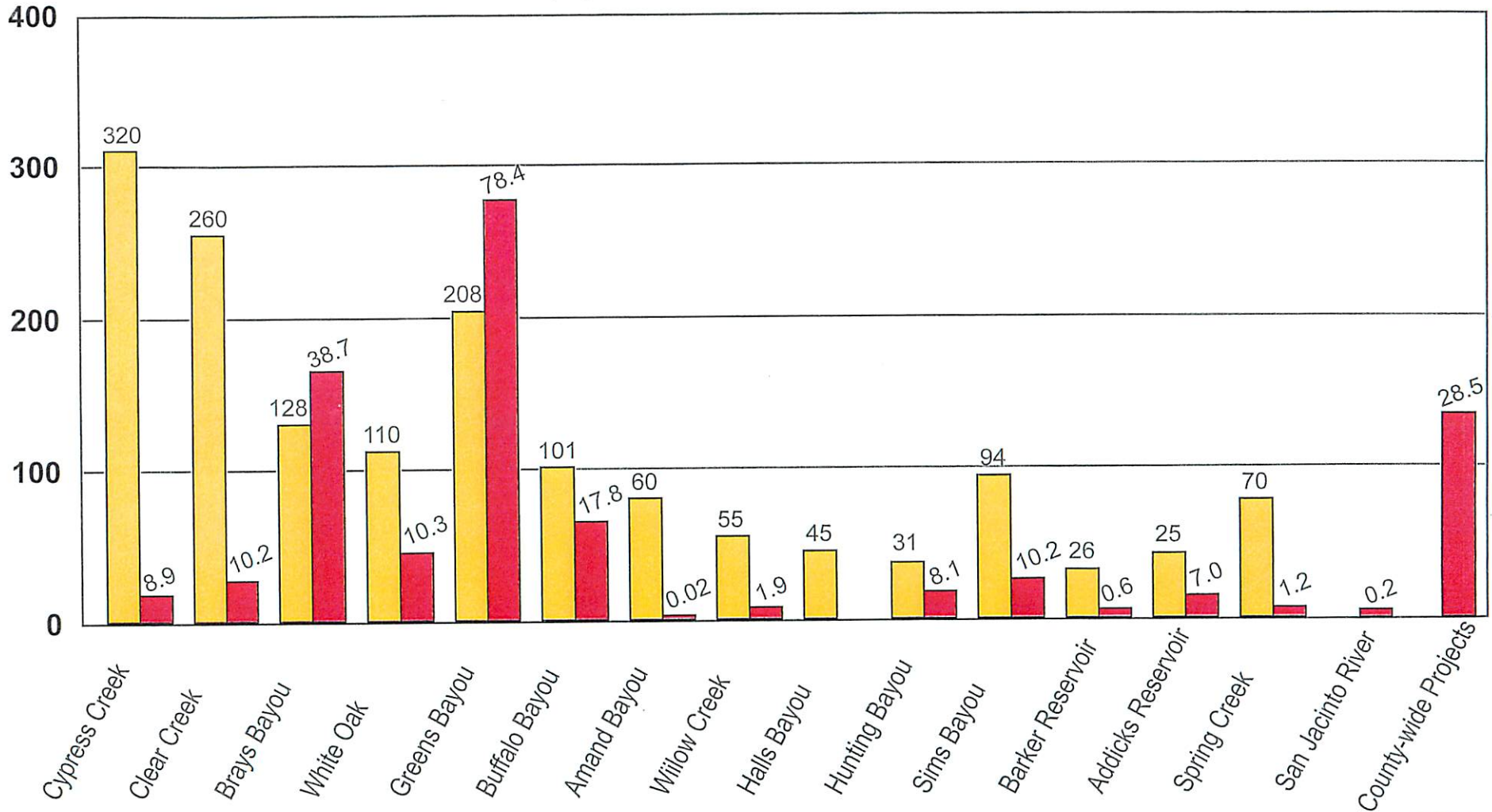
³ Source: Capital Improvement Funding for 5-year period Fiscal years 2017-2012.

⁴ Buffalo Bayou is listed in the Federal Briefing document but no \$ are shown. So have some uncertainty here.

⁵ Data shown includes all the major tributaries including Little Cypress tributary

AREA TO CAPITAL COMPARISON

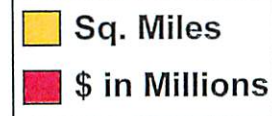
(5-year Period – 2017-2021)



Data for the June 2017 Capital Improvement Plan submitted by Harris County Flood Control District for a five-year period, fiscal year 2017 - fiscal year 2021.
(Appendix A "Currently Funded Projects")

The total 5-year Capital Improvement Plan of \$222.5M includes \$2.9M in 2017-2018 for home-buyout.

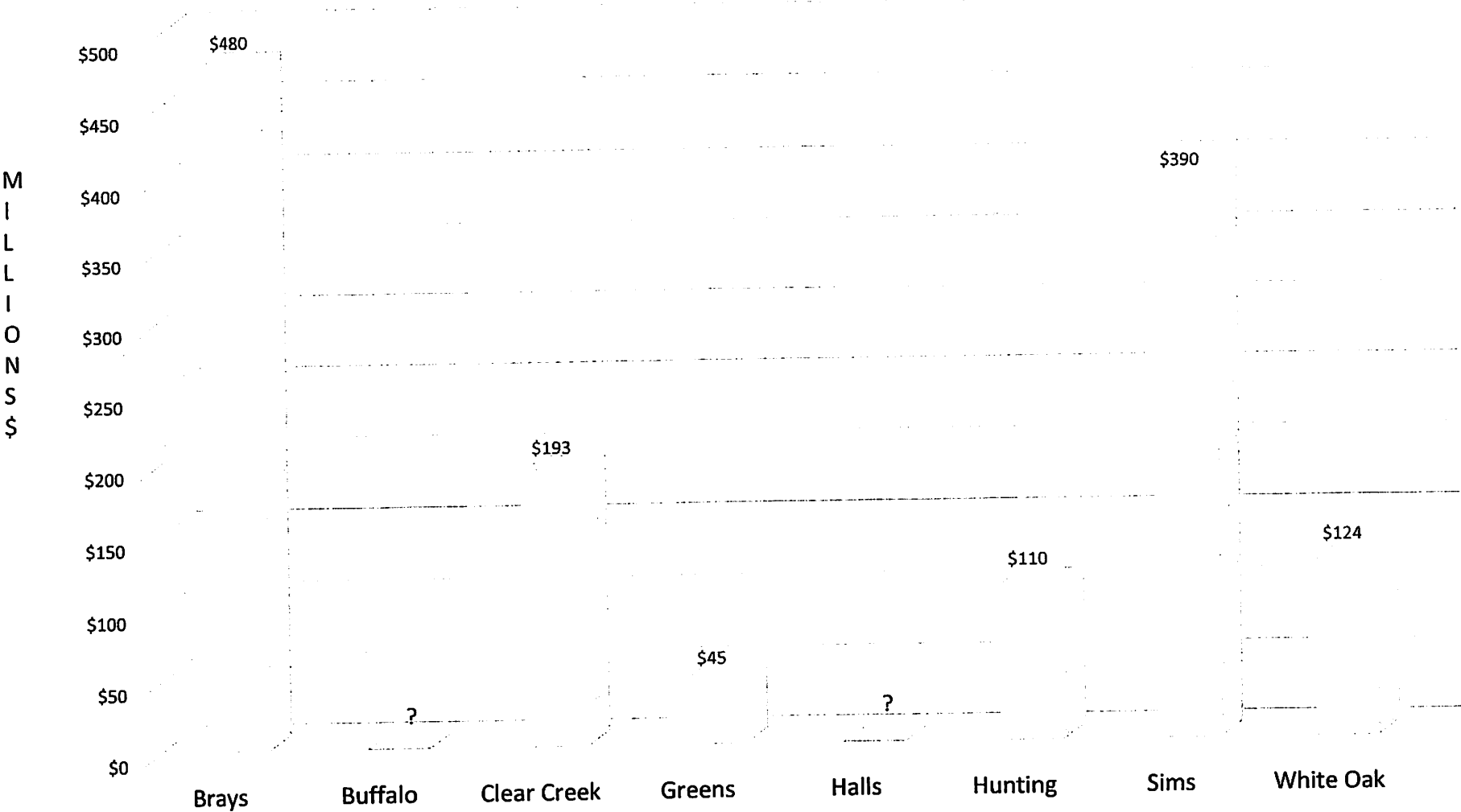
Watershed
(5 year period)



Area shown is
for Harris County



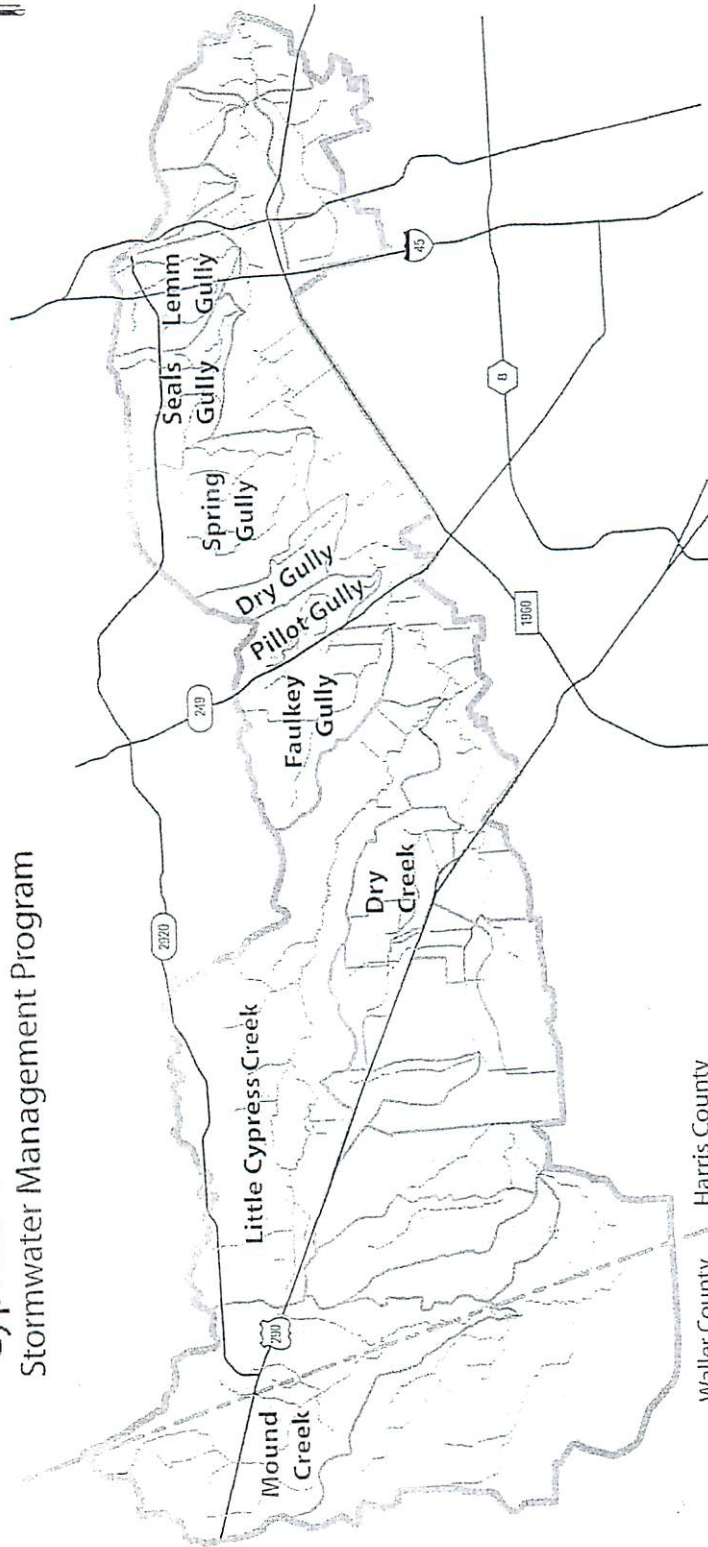
Federal Flood Projects Funding
Harris County Watersheds
Status: Spring 2018



Source: Federal Briefing, HCFCD Spring 2018

Tributary watershed Groups

Cypress Creek Watershed Stormwater Management Program



☐ Group 3

☐ Group 2

☐ Group 1



WATER DEVELOPMENT BOARD



Contents

Cypress Creek Watershed Major Tributaries Data and Maps 2003 version

Cypress Creek Major Tributaries Regional Drainage Plan

<u>Description</u>	<u>Size Sq Miles</u>	<u>Page</u>
Mound Creek (K166-00-00)	35.6	
Data page		1
Map		2-3
Little Cypress (I100-00-00)	51.9	
Data page		4
Map		5-6
Dry Creek (K145-00-00)	7.9	
Data page		7
Map		8
Faulkey Gully (K142-00-00)	12.9	
Data page		9
Map		10
Pillot Gully (K40-00-00)	5.2	
Data page		11
Map		12
Dry Gully (K133-00-00)	5.3	
Data page		13
Map		14
Spring Gully (K131-00-00)	12.3	
Data page		15
Map		16
Seals Gully (K124-00-00)	12.3	
Data page		17
Map		18
Lemm Gully <i>missing pages</i>		

Major tributary data / maps



**CYPRESS CREEK
FLOOD CONTROL
COALITION**

Mound Creek (K166-00-00)

Watershed Description

Watershed Information

- Size – 22,750 Acres (35.6 Square Miles)
- Percentage of Watershed Developed – 5%
- City of Waller

Environmental Considerations

- Good Quality Stream Habitat in Lower and Middle Reach of Main Stem of Mound Creek Natural Channel

Flooding Concerns

- City of Waller

Recommended Plan Components

Stream Corridors

- 150' to 550' wide Stream Corridors Throughout Watershed

Detention Facilities

- 50 and 65 Acre Basins Upstream of City of Waller Provides 669 ac-ft Storage
- Three Regional Basins along Main Stem of Mound Creek; 181, 291 and 215 Acres, Provides 7,287 ac-ft Storage

Stream Habitat/Floodplain Preservation Corridors

- Preservation along Main Stem of Mound Creek from Confluence to Middle Fork
- Total Length = 8 miles
- Proposed Channel Corridors Will Provide Environmental Enhancements to Watershed

Voluntary Structure Buyouts

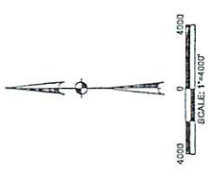
- Approximately 40 Potentially Flood Prone Structures

Reduction of 100-Year Flows Entering Cypress Creek

- Project reduces peak flows at streams outfall by approximately 90 cfs

Cost

- Approximately \$162.5 million



LEGEND

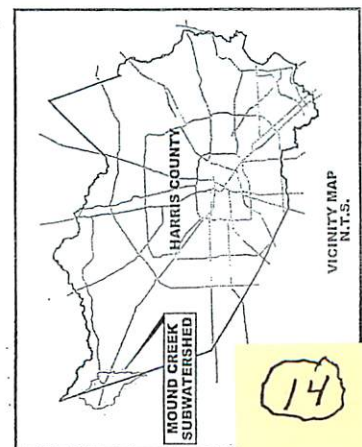
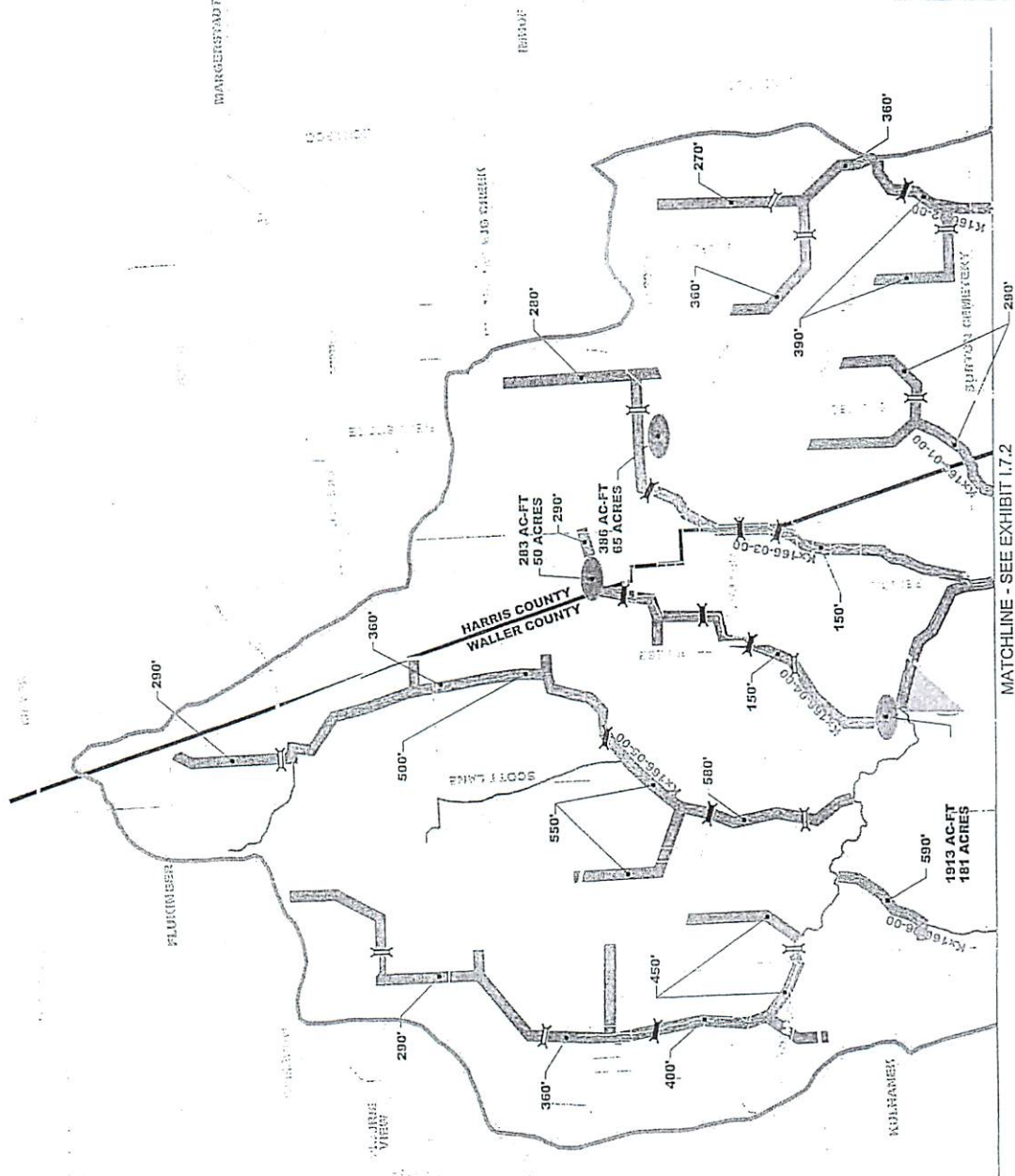
- Streets
- Major Roadways
- Ditches
- Watershed Boundary
- Proposed Detention Basin
- Proposed Stream Corridor
- Proposed Land Acquisition of Stream Quality Habitat Preservation
- Voluntary Acquisition of Historic Flood Prone Structures
- Proposed Bridge Modification

AN INITIATIVE OF
HARRIS COUNTY FLOOD CONTROL DISTRICT
IN ASSOCIATION
WITH THE
TEXAS
DEVELOPMENT BOARD

REGIONAL DRAINAGE PLAN AND ENVIRONMENTAL INVESTIGATION
PHASE II - REGIONAL DRAINAGE PLAN AND ENVIRONMENTAL INVESTIGATION REPORT TWRB CONTRACT NO. 2009-463-3

**MOUND CREEK WATERSHED
RECOMMENDED PLAN REPORT
RECOMMENDED PLAN FEATURES**

FEBRUARY, 2003 K160-00-00 EXHIBIT I



14

Cypress Creek Greenway Project – CCFCC Annual Report for 2018

During 2018 our coordination, advocacy, and visioning efforts continued for the development of the Cypress Creek Greenway (CCG). The Cypress Creek Greenway Project (CCGP) is a committee within the CCFCC and originated in 2004. The Cypress Creek Greenway is a linear greenway along Cypress and Little Cypress Creeks and will extend from west of US 290 to the east where the CCG will join the Spring Creek Greenway, a distance of over 40 miles. The greenway will connect existing and future anchor parks along Cypress Creek with a multi-use, all weather trail.

In addition to our efforts numerous partners are doing things to make the vision for the Greenway a reality. Since 2004, when the CCGP was initiated, 24 parks which will eventually connect to the CCG have been opened. These were built by MUDs, Harris County Precincts 3 and 4, and developers. While we have not been the catalyst for all of these parks, the large number of parks being developed clearly demonstrates the interest that there is in creating amenities within the Cypress Creek corridor. In addition to these parks over 15 trail projects have been completed outside of the parks and numerous acreage acquisitions have occurred. Below are 2018 highlights from the efforts of the CCGP and its many partners.

- **Harvey Flooding along Cypress Creek** – Unprecedented and devastating flooding occurred along Cypress Creek, Little Cypress Creek, and their tributaries as a result of about 30" of rain falling across the Cypress Creek watershed in the 8/25-29/17 time period. Essentially all of the areas included within the Cypress Creek Greenway were inundated with several feet of water. However, the CCG functioned as it should by being a place for flood waters to flow and accumulate. Tracts which had been acquired as part of the CCG, but had originally been promoted for development, flooded. Had these tracts been developed any structures which would have been constructed would have flooded. This clearly demonstrates the important role which green infrastructure can play to mitigate flooding, and shows how it supplements structural solutions to flood mitigation. 2018 was a year of repair and reopening for many of the parks which had their facilities and amenities severely impacted by Harvey. Harris County Precincts 3 and 4, as well as many MUDs and HOAs, did an outstanding job of getting their facilities repaired and reopened for the public.
- **Kickerillo-Mischer Preserve** – 2018 was the first full year of operation for the Kickerillo Mischer Preserve (KMP) following its 4/1/17 grand opening. The KMP is on the north side of Cypress Creek just east of SH 249. Commissioner Jack Cagle's Precinct 4 Parks Department developed and maintains the 82 acre property which includes a 40 acre lake, a 1.7 mile paved hiking and biking loop trail around the lake, restrooms, parking, fishing piers, picnic tables, and camping facilities for scouting groups.

CCFCC and the CCGP began efforts to create the Preserve in 2004. Through efforts along with several partners including the HP Park Alliance (a local grass roots community group), HP, Harris County, HCFCF, and Harris County Precinct 4 a donation of the acreage to Harris County was obtained from V & W Partners (Kickerillo Properties and Mischer Investments) in 2009.

When funding became available Harris County Precinct 4 began development of the Preserve. The Prestonwood Utility District leases a former fire station to Precinct 4 for use as the KMP headquarters and participated in the construction of a bridge connecting the headquarters to the Preserve, both of which helped to accelerate the development and opening of the Preserve.

In addition to a maintenance staff Precinct 4 has assigned a park director, an education director, and a naturalist to the KMP. The staff offices on site and has developed an outstanding and ever-expanding outreach and public education program which reaches all ages. Prior to the opening of the KMP residents had to go to Jesse Jones Park which is located about 17 miles to the east for similar programming. With exceptional programming being offered at the KMP local residents are not only able to locally enjoy and learn more about the outdoors, but also to develop a better appreciation and awareness of the wonderful amenity we have with the Cypress Creek Greenway.

The Precinct 4 Trails as Parks Program (TAP) works with the KMP staff to regularly schedule and provide pontoon boat rides, and also makes canoes available for paddling, on the lake at the KMP.

Precinct 4 was selected by the H-GAC Parks and Natural Areas Subcommittee as a recipient of an award in the On-the-Ground Projects Over \$500,000 category for its development of the KMP. On 4/14/18 the Houston Northwest Chamber of Commerce, Precinct 4 Parks Department and others held the Paddle N Pedal Fest event at the KMP to help promote the Preserve to the public. A newly structured Precinct 4 event is planned for the KMP on 4/27/19. The KMP is an extremely popular and much appreciated amenity for area residents.

- **Cypress Creek/SH 249 Area Trail Master Plan** – The completed trail master plan continues to serve as a planning tool for the approximately 14 square mile area surrounding “a nucleus” consisting of the Lone Star/HP campus and The Vintage area near Cypress Creek and SH 249. Our discussions with several partners and potential partners regarding trail connectivity projects were underway prior to the Harvey flooding and several opportunities were largely on hold through 2018 while key partners (YMCA, HP, etc.) focused on flood recovery. However, partners less affected by flooding did continue adding new trail segments and additional partners have initiated planning efforts for additional trail development. A copy of the plan can be viewed at <http://www.ccfcc.org/CCREKTMP/index.html>.
- **Trash Bash at Collins Park** – Bayou Preservation Association’s Trash Bash event was held at Collins Park on Cypress Creek on Saturday, 3/24/18. The CCGP coordinates in the organization of this event. Approximately 430 volunteers participated in the event during which a significant amount of trash was picked up along Cypress Creek and its tributaries. There continues to be an increasing and successful focus on education at the event. In addition to getting a lot of trash removed from the waterways, the event results in volunteers experiencing the wonderful areas along Cypress Creek and gaining a greater appreciation for the value and benefits of the Cypress Creek natural corridor.
- **Cypress Creek Paddling Trail** – Although approval was received from TPWD to establish the Bayou Preservation Association-sponsored Paddling Trail on Cypress Creek progress has been slow on moving forward with the project. The CCGP is coordinating with Bayou Preservation in the creation of the trail. The trail will extend from SH 249 to US 59. Reconnaissance paddle trips have been made to assess the post-Harvey effects on the creek and paddle trail. There was significant damage to some previously constructed launch sites as a result of Harvey.

Precinct 4 acquired Edgewater Park, a 90-acre tract on the north side of the San Jacinto River downstream from the US 59 bridge. The Spring Creek Greenway trail will pass through and connect to the park. Eventually this will be the downstream terminus and take out point for the Cypress Creek Paddling Trail.

- **Invasive Species Removal** – The Bayou Preservation Association sponsors the removal of invasive plant species along area waterways as part of its Stream Corridor Restoration Program. Crews funded by Bayou Preservation have continued to work along Cypress Creek at Meyer Park and Bud Hadfield Park on these efforts. Collins Park is largely invasive free as a result of this program. The CCGP continues to support and encourage this program.
- **Precinct 4 Cypress Creek Greenway Activity** – The Precinct 4 Parks Department in coordination with HCFCD continues to focus on obtaining acreage and easements for trail access along the entire Cypress Creek Greenway from the confluence of Cypress Creek with Spring Creek upstream to the west as far as Grant Road, the boundary with Precinct 3. Critical Cypress Creek Greenway tracts were acquired in 2018.

Precinct 4 began the development of Champions Forest Park on Cypress Creek near the intersection of Cutten Road and Cypresswood Drive. The park is on the Cypress Creek Greenway and will be connected

by a trail to the Kickerillo Mischer Preserve along the south side of Cypress Creek. The seven acre property will include four youth soccer fields, picnic tables, restrooms, a playground, and parking.

On 9/29/18 Precinct 4 held its first Civic Adventure Day at the Kickerillo Mischer Preserve. Information booths from a variety of Harris County Departments provided information to the public about their services and civic leaders were there to speak with residents. In addition, the event was an opportunity of residents to see the Kickerillo Mischer Preserve. The Cypress Creek Greenway Project had a booth at the event.

- **Precinct 3 Cypress Creek Greenway Activities** – Precinct 3 has developed the plans for the creation of a new anchor park along Cypress Creek at Grant Road. Approximately 90 homes have been bought out in the Grantwood subdivision following repeated flood events in this area. The park will be a passive park with picnic facilities, hiking and biking trails, restrooms, etc. The tract is forested and will be the fourth anchor park created along Cypress Creek from North Eldridge Parkway to SH 249 in the relatively recent past. It will join Precincts 3's Cypress Park and Precinct 4's 100 Acre Wood and Kickerillo Mischer Preserve. Future trail connectivity between these four parks is desirable but faces many challenges relative to cost and accessibility.
- **Cypress Creek Greenway Miscellaneous Activities** – I continued to participate in events such as Bridgeland's NatureFest and Precinct 4's NatureFest at Jesse Jones Park by staffing a booth and promoting the development of the Cypress Creek Greenway. I made numerous presentations about the Cypress Creek Greenway Project to a variety of organizations including MUD boards, HOAs, civic groups, clubs, etc. Through the years continuing contact with MUDs who have not yet decided to participate in the Cypress Creek Greenway has kept the door open to their eventual partnering and participation. Requests during 2018 from some of these MUDs to set up meetings to discuss partnering opportunities for them to participate in the Greenway have been encouraging.

Please feel free to contact me if you have questions or if I can provide any additional information.

Jim Robertson, Chairman
Cypress Creek Greenway Project

JHRVER@aol.com
281-370-8243

Army Corps, Harris County to study reservoirs

Staff Report

Oct. 12, 2018

The Harris County Flood Control District joined its federal partner, the U.S. Army Corps of Engineers in signing a Feasibility Cost Sharing Agreement (FCSA) for a comprehensive study of the Addicks and Barker Reservoirs and surrounding watersheds. The \$6 million study will include Buffalo Bayou and its tributaries and Corps will serve as the lead agency.

The signing of the agreement marks the beginning of a three-year study period in which the Corps, with input from the flood control district, will evaluate and recommend projects and operational changes to improve the effectiveness of the reservoirs in reducing flood risks upstream and downstream. The public will be engaged at intervals throughout the study. Over the next year, the study team will focus on identifying and evaluating alternatives, and developing a recommended plan for more detailed analysis.

Although the reservoirs are owned, operated and maintained by the Corps, the flood control district is responsible for other flood control infrastructure throughout Harris County, including tributaries upstream and receiving channels downstream of the reservoirs. The study will provide critical information for the the Corps, flood control district and the public to help identify and minimize flood risks upstream and downstream of the reservoirs.

"The flood control district is excited to launch this long-awaited study and to continue its successful partnership with USACE under this agreement," said Russ Poppe, executive director of the flood control district. "With the agreement signed as well as the team and funding in place, we are poised to move forward with the study and toward implementation."

The agreement for the \$6 million, three-year study was approved by Harris County Commissioners Court on Oct. 9. Under the provisions of the Bipartisan Budget Act of 2018 (BBA 2018), which was signed into law on Feb. 9, the study will be fully funded by the federal government. The agreement therefore does not commit local funds to the study, but does formally recognize the flood control district as a working partner. BBA 2018 also provides that projects identified by the study may be eligible for construction funding provided by the Act.

"We are very excited to sign the FCSA with the HCFCD for the Buffalo Bayou and Tributaries Resiliency Study," said Col. Lars Zetterstrom, commander, Galveston District Corps of Engineers. "While this study will be at full federal expense, we welcome partnering with the Harris County Flood Control District to enhance the study and ensure our alternatives proposed have the full participation and involvement of the district as the non-federal sponsor and other federal, state, county and local governmental and non-governmental partners."

The Addicks and Barker reservoirs were built in the 1940s as part of a federal project to reduce flooding risks along Buffalo Bayou, which runs west to east through downtown Houston. The U.S. Army Corps of Engineers completed construction of Addicks Dam in 1948 and Barker Dam in 1945. The Corps owns, operates and maintains the reservoirs, including leases or permits for some compatible recreational uses within the basins. Operation of the outlet facilities controls discharges from the reservoirs into Buffalo Bayou. Environmentally-sensitive areas and a wide range of wildlife habitats exist within the reservoir boundaries and along the upper tributary reaches that extend into the Katy Prairie.

To learn more about the flood control district, visit www.hcfcd.org or follow it on Twitter @HCFCD for all the latest #HCFCDnews.

<https://www.chron.com/news/politics/houston/article/Harris-County-to-begin-work-on-new-floodplain-maps-13256550.php>

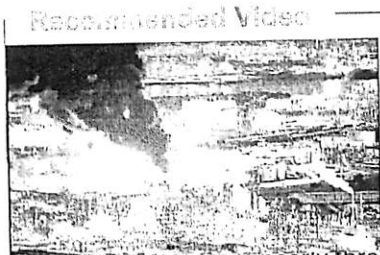
Harris County to begin work on new floodplain maps

By Zach Despart Updated 5:19 pm CDT, Tuesday, September 25, 2018

Harris County will soon begin redrawing its floodplain maps after Hurricane Harvey showed the existing maps were inaccurate. Most of the structures that were flooded by the monster storm were outside of mapped floodplains.

More than a year after Hurricane Harvey showed the Houston area's floodplain maps were outdated and inaccurate, Harris County is prepared to begin the years-long process of drawing new maps.

Commissioners Court on Tuesday agreed to accept \$6.5 million in federal FEMA funds to complement \$8 million in local dollars to create new maps, to be completed by 2023.



"We're excited about that, and it's going to be a big undertaking," said Russ Poppe, executive director of the Harris County Flood Control District. He added the county has already begun the search for contractors.

found that of the more than 204,000 county homes and apartments that flooded during Harvey, nearly three in four were outside the 100-year floodplain. In those zones, which have a 1 percent chance of flooding in a given year, homeowners are required to purchase subsidized flood insurance through the federal National Flood Insurance Program.

County Judge Ed Emmett said there is no need to wait for new maps to complete the more than 230 projects included in the \$2.5 billion flood bond voters approved in August.

"The maps are really more important to the homeowners and business owners and insurance than they are to our projects," Emmett said. "Flood Control knows that the projects are needed to prevent flooding."

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He said the redefined floodplains will be essential to planning future development and assessing flood risk in communities. For years, he said government and private developers failed to keep track of where creeks and bayous drained, and where water flowed when waterways crested their banks.

The re-drawn maps also will allow the county to more fairly enforce its new floodplain building codes. In the year after Harvey, Houston and Harris County added new requirements for floodplain development.

The county's flood control district hopes to hire contractors through the end of the year to begin work in January. Director of Operations Matt Zeve said engineers hope to complete the new maps, which will cover nearly 800 miles of waterways, by 2023.

The new maps will cover Harris County's 23 watersheds, including bayous, creeks, the San Jacinto River, Addicks and Barker reservoirs and Galveston Bay.

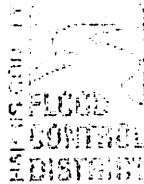
Zeve noted that the last time Harris County mapped its floodplains, starting in 2001, the project took six years. With better technology, the county now can do it in four.

Engineers will use LiDAR, a laser-based system used to measure land elevation, as well as Atlas 14, a tool developed by the National Oceanic and Atmospheric Administration, to study hypothetical flood-producing rainfall events.

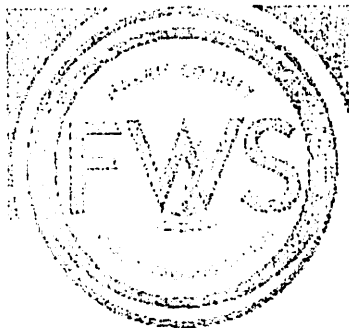
"It's a better product for the public," Zeve said.

With the approval of several additional projects by Commissioners Court on Tuesday, the flood control district has begun work on about 40 flood bond projects, or about 17 percent of the total.

This website is provided as a service to the general public by the members of the Cypress Creek Flood Control Coalition. It is intended to be used as a source of information to assist neighborhood communities located in the Cypress Creek Watershed and elsewhere develop awareness, analyze risks and plan methods for dealing with storm water flooding and preservation of forested floodplain corridors. No information should be considered as being completely accurate nor warranted for any purpose. The Cypress Creek Flood Control Coalition is a participating Project Impact partner pledged to support developing a more disaster –resistant community in Harris County and surrounding area.



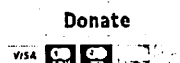
MEMBER OF PROJECT IMPACT



CYPRESS CREEK TRAILS
MASTER PLAN

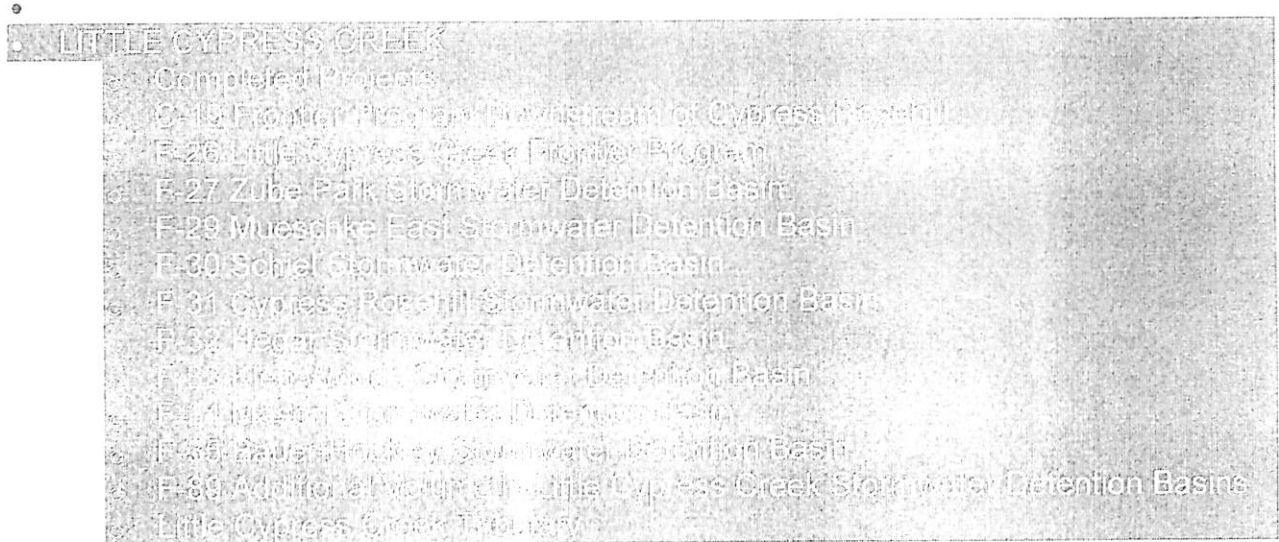
CYPRESS CREEK CASE STUDY

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Annual Report 2018 website



LITTLE CYPRESS CREEK FRONTIER PROGRAM ¹

RECENT ACTION

March 12, 2019 – Harris County Commissioners Court approved a \$1.35 million agreement with an engineering firm for additional services needed to update the master plan and provide program management and staffing in support of this project

January 8, 2019 – Harris County Commissioners Court authorized negotiations with an engineering firm for final design of this project

December 18, 2018 – Harris County Commissioners Court formally accepted the Little Cypress Creek Watershed Master Drainage Plan and authorized the Flood Control District to proceed with implementation of the master plan, acquisition of right-of-way and design and construction of stormwater detention basins and channel improvements to reduce flooding risks in the Little Cypress Creek watershed

PROJECT DESCRIPTION

The Little Cypress Creek Frontier Program is one component of the Harris County Flood Control District's overall Frontier Program, which is an organized effort to plan for regional drainage infrastructure in advance of future land development.

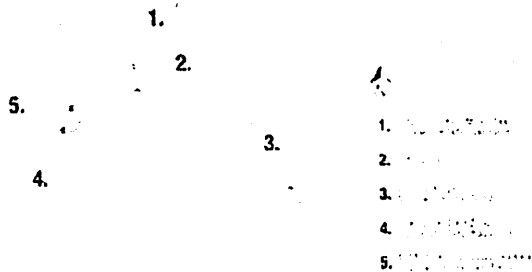
> [Download Little Cypress Creek Master Drainage Plan \(PDF\)](#)

The Little Cypress Creek Frontier Program focuses on the 52-square-mile Little Cypress Creek watershed in northwest Harris County. This area, which is experiencing rapid development with construction of the Grand Parkway, lacks sufficient natural drainage to accommodate expected growth.

> [Questions or Comments about this page? \(Feedback and Log Out\)](#)

By collaborating with land owners and developers, the program is working to identify a large-scale, mutually beneficial plan for drainage that cost-effectively maximizes stormwater mitigation and water quality, as well as opportunities for public recreational amenities and open space.

¹ Source: HCFCF Website 03/22/19



MAJOR COMPONENTS

Major components of the Little Cypress Creek Frontier Program plan include:

- > Kluge Stormwater Detention Basin L498-02-00 (completed)
- > Zube Stormwater Detention Basin L506-01-00
- > Little Cypress Creek Tributary / L112-01-00
- > Kieh Woods Stormwater Detention Basin L512-01-00
- > Bauer-Hockley Stormwater Detention Basin L614-01-00
- > Schiel Stormwater Detention Basin L590-09-00

Property acquisition is underway for several components of the Little Cypress Creek Frontier Program Master Plan, including stormwater detention basins and future channel projects to increase stormwater storage and carrying capacity within the Little Cypress Creek watershed.

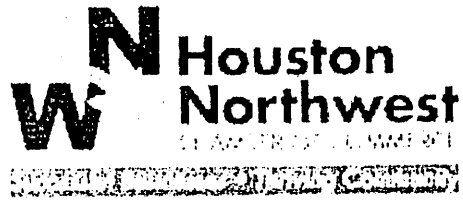
INNOVATIVE APPROACH

This innovative approach is in contrast to typical efforts in which individual land owners and developers install drainage infrastructure that serves their site alone, resulting in smaller, isolated stormwater detention basins and minimum-width channels for stormwater management. By taking a regional approach, the Frontier Program protects existing developments and provides proper drainage access for newly developing properties.

Developers participate in the Frontier Program by paying a \$4,000-per-acre fee to develop in the watershed service area. Developers also participate by excavating a portion of regional drainage facilities and by dedicating property for right-of-way. The Little Cypress Creek Frontier Program will use impact fees primarily to acquire right-of-way along the channel and for stormwater detention basins.

The program calls for stricter stormwater detention requirements to mitigate runoff from new developments and will result in at least seven regional detention basins with a combined minimum storage of 14,000 acre-feet.

- End of Little Cypress news



FOR IMMEDIATE RELEASE

For More Information,
Contact: Barbara Thomason, President
281-440-4160, BarbaraT@HoustonNWChamber.org

Flood Mitigation Task Force Hosts Flood Information Forum

Northwest Houston, Spring, Klein, Champions - The Houston Northwest Chamber of Commerce appointed a task force to advocate for flood mitigation projects for three critically important watershed areas: Cypress Creek, Little Cypress Creek, and Spring Creek prior to the August 25th Harris County Flood Bond Election. The task force insured that "Vote for Prop A" signs decorated northwest Harris County. Now that the Bond passed with an unprecedented 85.6% county-wide approval rate, the task force is shifting its focus to one of education and project advocacy.

On Thursday, September 20th at 6:30 p.m., the Houston Northwest Chamber of Commerce and its Flood Mitigation Task Force will host a Flood Information Forum entitled, "**Prop A Passed – Next Steps?**" The event is open to the public and takes place at Cypress Creek Christian Church, 6823 Cypresswood Drive, Spring 77379. This church fell victim to severe flooding during Hurricane Harvey.

"No one is of a mind to forget Hurricane Harvey," explains task force chair Al Haines, "We felt it was appropriate to host this first forum in a place representative of area faith based communities where this and so many other congregations toiled tremendously to bring their storm damaged worship and sanctuary facilities back to their original purposes. This wonderful and embracing community has reached out to invite us to use it. We are most grateful!"

Haines, himself a member of the Church of Jesus Christ of Latter-day Saints (Mormon) and leader in the church's Houston Temple, which was also flood damaged, knows first-hand of the sacrifices of so many faith-based organizations in the greater northwest Harris County area post Harvey. As former Chief Administrative Officer for the City of Houston, he also played a key leadership role in the city's recovery from Tropical Storm Allison.

Other task force members include Dr. Bret Champion, Klein ISD superintendent; Tim Puthoff, CEO of Houston Northwest Medical Center; Jim Robertson, Cypress Creek Flood Control Coalition; Alan Smith, owner, Hasta La Pasta Restaurant; Brad Sondock, owner, Retail Properties Group; Nancy Blackwell, president, AEI Engineering; Tom Petrick, Cy Forest PUD; David Riddle, Owner of The Breeder's Assistant; Bobby Lieb, vice-president for Economic Development/Grow Northwest, Houston Northwest Chamber; and Barbara Thomason, Houston Northwest Chamber of Commerce.

The Forum program will be kicked off by Harris County Precinct 4 Commissioner R. Jack Cagle, who played a key recovery role during and after Hurricane Harvey, though his own home sat under two feet of water. He then joined his colleagues in the work to educate the public as well as to listen to our questions and concerns prior to the August 25th Bond election. Now we are interested to know where the Bond money will be used and in what priority order. To answer these questions, several experts have been invited to join us on September 20th.

Matt Zeve, P.E., CFM, M. ASCE, Chief Operations Officer for the Harris County Flood Control District will describe for us the bond-funded projects for the Cypress Creek, Upper Cypress Creek and Spring Creek watersheds, the anticipated timelines, challenges and strategies. Then two representatives from the U.S. Army Corps of Engineers, Mr. Andrew Weber, P.E. and Mr. Eduardo Irigoyen, will share what their roles are with respect to Cypress Creek, and the interrelationship between our community and the Barker and Addicks Reservoirs. We will hear about the feasibility of a third reservoir and the required timelines to bring that project to reality.

The Forum will be kept to a strict time limit though it is intended that some questions and answers will be allowed.

"We hope interested citizens will attend. It is important that we understand the process going forward so that we can have patience with our public officials, do our part to facilitate the process and to insure that our bond dollars are applied most efficiently and effectively," summarized chamber president Barbara Thomason.

About Houston Northwest Chamber of Commerce

The Houston Northwest Chamber of Commerce is a 44-year old association serving the interests of business and the community of northwest Harris County. For more information about the Chamber, go to www.HoustonNWChamber.org. To learn more about the "Grow Northwest" Initiative, go to www.GrowHoustonNW.com

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May 24, 2018

Recovering from Hurricane Harvey

Since Hurricane Harvey devastated our communities, Rep. Culberson has been working with his colleagues in the House and Senate to provide the resources Houstonians need to recover and rebuild. Rep. Culberson's number one priority in Washington has been getting federal assistance to his neighbors impacted by Harvey. He worked across the aisle to unite the Texas and Florida Congressional delegations to ensure that they did not settle for insufficient disaster requests from the Administration. The efforts were successful – Congress has provided over \$55 billion more than the Office of Management and Budget requested.

The combined total provided in all three disaster bills is over \$141 billion, with a large portion of that funding headed to Texas. Now that the funding has been provided to the agencies, Governor Abbott and Rep. Culberson have met with the Federal Emergency Management Agency (FEMA), the Department of Housing and Urban Development (HUD), the U.S. Army Corps of Engineers, and other relevant agencies to ensure Texas receives the assistance it needs.

This critical funding will help Houstonians recover from these storms and mitigate against future flooding damage. The funding allows FEMA to continue to provide assistance to individuals and households, to provide funding for housing, to provide money for local flood mitigation projects, to reimburse state and local first responders, to pay for debris removal and to direct the Army Corps to undertake studies and projects that will mitigate the impacts of future storm events.

Below is a detailed overview of the three disaster relief supplemental bills that have been signed into law since Hurricane Harvey.

September 8, 2017 – First Disaster Supplemental – \$15.25 billion in overall funding including:

- \$7.4 billion for the FEMA Disaster Relief Fund
 - The Disaster Relief Fund is used by FEMA for response and recovery efforts following a major disaster.
 - This fund pays for things like hotel stays, home repair grants, rental assistance and other critical needs.

- It also funds repair and restoration of qualifying disaster damaged public infrastructure, hazard mitigation initiatives, and financial assistance to eligible disaster survivors.
- **\$7.4 billion – Community Development Block Grant Disaster Recovery (CDBG-DR)**
 - Texas received a \$5.024 billion allocation of this funding.
 - These funds can be used for housing, business, infrastructure, and mitigation needs for communities to recover from disasters.
 - Housing recovery is a major aspect of this program, and individual homeowners can be eligible for rebuilding funds after previous storms.
 - On February 9, HUD issued the Federal Register Notice with guidance for the grantees which is the next step towards getting this money to the communities that desperately need assistance.
 - **The General Land Office administers these funds in Texas, and has developed an implementation plan, with community input, for approximately \$2.75 billion of the allocation.**
 - **Harris County and the City of Houston each received approximately \$1.1 billion of this funding, and will develop an implementation plan for their funds.**
- **\$450 million – SBA Disaster Loan Program**
 - These are low interest loans that are available to many individuals and businesses to help them recover from the storm.

October 10, 2017 – Second Disaster Supplemental – \$36.5 billion in overall funding including:

- **\$18.7 billion - FEMA Disaster Relief Fund**
- **\$16 billion - National Flood Insurance Program**
 - This funding was included to ensure they could meet all claims resulting from 2017 hurricane season.

February 9, 2018 – Third Disaster Supplemental – \$89.3 billion in overall funding including:

- **\$23.5 billion - FEMA Disaster Relief Fund**
- **\$17.39 billion - U.S. Army Corps of Engineers**
 - **\$15.055 billion for repairs to ongoing construction projects, and to expedite construction projects that will help mitigate future disaster damage.**
 - The completion of ongoing projects, such as Project Brays, would be at full Federal expense.
 - **\$10.425 billion of the construction funding will be used to expedite construction of projects for flood and storm damage reduction in areas affected by Hurricanes Harvey, Irma, or Maria. All authorized projects in Harris County, such as Hunting Bayou, White Oak Bayou, and Clear Creek are eligible for this funding.**
 - **\$4.63 billion of the construction funding will be used for projects in states that have had more than one flood-related major disaster since 2014. Harris County would also be eligible for this funding.**

- **Construction funds can be used for projects that are studied using investigation funds in the bill. This will allow us to study potential new projects such the 3rd reservoir, and have the funding available to begin construction.**
- **\$608 million - Operation and Maintenance**
 - **This can be used for vital dredging of our federal navigation channels like the Port of Houston, which accumulated vast amounts of silt following Hurricane Harvey.**
 - **The Corps has identified nine Texas projects that will receive funding from an initial allocation of \$359 million. This includes Buffalo Bayou and Tributaries as well as the Houston Ship Channel.**
- **\$810 million for Flood Control and Coastal Emergencies to repair damages**
 - **The Corps has identified four Texas projects, one of which is Buffalo Bayou and Tributaries, to receive funding from an initial \$424 million allocation.**
- **\$135 million to expedite high-priority studies to help mitigate future disaster damage**
 - **\$75 million would be available to areas impacted by Hurricanes Harvey, Irma, and Maria.**
 - **The remaining \$60 million would be available to areas that have had more than one flood-related major disaster since 2014. Harris County would be eligible for this funding.**
- **\$28 billion - HUD CDBG-DR program**
 - **Texas received a \$5.035 billion allocation.**
 - **\$652 million is for remaining unmet needs**
 - **\$4.383 billion is for mitigation to prepare for future storms**
 - **These funds will be allocated by HUD and administered by the Texas General Land Office.**
 - **The total CDBG-DR allocation for Texas following Hurricane Harvey is now over \$9.808 billion. Texas has received over \$10.551 billion in total CDBG-DR funding since 2015.**
- **\$1.65 billion - SBA disaster loan program.**
 - **This will allow SBA to make up to \$12.2 billion in disaster loans to small businesses and homeowners in all affected areas for recovery and rebuilding.**
- **\$2.79 billion - Department of Education**
 - **These funds will be used to restart operations in schools in affected areas, including school rebuilding and refurbishment and replacement of educational material.**
- **\$1.87 billion – Department of Defense and Homeland Security**
 - **This provides adequate funding to repair Army, Navy, Marine Corps, Air Force, Reserve, National Guard, Coast Guard, and medical military facilities, and to repair or replace equipment damaged by the hurricanes in all affected areas.**
- **\$1.374 billion - Department of Transportation**

- Texas received \$75.8 million of this funding for 2017 disasters.
- This funding will address damages to federal highways caused by Hurricane Harvey. These funds are provided directly to states and localities for repairs. The bill also includes \$330 million to help communities restore hurricane-damaged mass transit systems.

Total funding provided by Congress for 2017 disasters was over \$141 billion including:

- \$49.4 billion - FEMA Disaster Relief Fund
- \$35.4 billion – Community Development Block Grant Disaster Recovery
 - Texas received approximately \$10 billion of this funding.
- \$17.39 billion - U.S. Army Corps of Engineers
 - As of May 24, approximately \$783 million has been allocated to short-term repairs.
 - The Corps is currently working on finalizing their long-term disaster recovery investment program that will allocate additional funding.
- \$16 billion - National Flood Insurance Program
- \$12.2 billion – SBA Disaster Loans
- \$2.79 billion – Department of Education
- \$1.87 billion – Department of Defense and Homeland Security
- \$1.374 billion – Department of Transportation
 - Texas received \$75.8 million of this funding.

Supporting Flood Mitigation Projects

Since Fiscal Year 2002, Representative Culberson has secured approximately \$570.1 million for flood control projects in Harris County through the regular appropriations process. This includes:

- \$201.5 million in federal funds for Brays Bayou
- \$157.1 million in federal funds for Buffalo Bayou
- \$149.8 million in federal funds for Sims Bayou
- \$36.3 million in federal funds for Greens Bayou
- \$10.1 million in federal funds for Clear Creek
- \$8.4 million in federal funds for the Coastal Texas Study
- \$3.8 million in federal funds for Hunting Bayou
- \$2.8 million in federal funds for White Oak Bayou
- Rep. Culberson increased Army Corps construction funding by \$215 million for flood control and storm damage reduction projects in the Fiscal Year 2018 Omnibus.
- Rep. Culberson also included language in the Fiscal Year 2018 Omnibus directing the Administration to prioritize projects like Brays when allocating the additional funding provided. This language will help ensure reimbursement projects HCFCD is currently working on will continue to have the federal support they need to be completed.
- After devastating floods in 2015 and 2016, Rep. Culberson worked with Rep. Al Green to introduce the 2016 Tax Day Floods Supplemental Funding Act. They also worked together and had two amendments signed into law as part of the 2016 Water Resources Development Act. The amendments prioritize projects like Brays Bayou and direct the Army Corps to expedite review and decision on recommendations for Brays.
- In September 2016, Rep. Culberson led a Texas delegation letter to House leadership advocating for Texas to receive disaster recovery funding for the 2015 and 2016 storms. The letter resulted in the State of Texas receiving over \$434 million in Community Development Block Grant – Disaster Recovery funds to help communities recover.
- Although less than 15 percent of presidentially declared disasters historically receive supplemental funding from Congress, Rep. Culberson has secured supplemental funding for Texas following Hurricanes Ike, Dolly, Rita, and Harvey; the 2011 wildfires; and, the 2015 and 2016 floods.

It is an honor and a privilege to represent you and Texas in the United States Congress.

Cypress Creek Flood Control Coalition

From: "Ashton, Gus" <Gus.Ashton@mail.house.gov>
Date: Thursday, June 21, 2018 4:39 PM
To: "Cypress Creek Flood Control Coalition" <floodalliance@ccfcc.org>
Cc: "Schneider, Mary" <Mary.Schneider@mail.house.gov>
Subject: RE: Overview of Disaster Supplemental Funding

Dick,

It was good speaking with you yesterday. The Congressman certainly agrees that OMB should not delay allocating the funding and would like to get the money out to the door as soon as possible. When he and Governor Abbott met with Corps leadership after the disaster supplemental passed in February, they anticipated it would take about six months to pull together all of the information and make decisions how to allocate the funding that was provided.

I'm not justifying why they predict it will take six months, but wanted to provide some background on the timetable. When an annual appropriations bill passes, the Corps has 60 days to submit their work plan to Congress for how they plan to spend the money for that year. The total funding for the Corps in FY18 through the regular appropriations process was \$6.83 billion, a \$789 million increase over FY17 enacted levels. Because of the effectiveness of Rep. Culberson in his role on the Appropriations Committee and the Texas delegation, the disaster supplemental signed into law in February provided \$17.4 billion in supplemental funding for the Corps, which was almost equal to the \$18.86 billion total they received in traditional funding for FY16, FY17, and FY18 combined.

When you break it down further, the disaster supplemental included \$15 billion specifically for Corps construction of flood and storm damage reduction projects. Over the ten fiscal years from 2008-2017 the total discretionary appropriations for the Corps to conduct flood related construction was \$9.1 billion. So, the funding Rep. Culberson made sure was signed into law was over 1.5 times the amount of money the Corps spent on flood related construction over the past 10 years. This is part of the reason behind why it is taking some time for them to put together how they plan to spend the money.

With that being said, any hold up by OMB once the Corps sends them how they plan to allocate the funding is unnecessary. The Corps are the experts in flood control and Congressman Culberson will continue to keep pressure on Director Mulvaney to get this money flowing as soon as possible.

Please don't hesitate to reach out with any questions in the future.

Regards,

Gus

From: Cypress Creek Flood Control Coalition [mailto:floodalliance@ccfcc.org]
Sent: Thursday, June 21, 2018 2:51 PM
To: Ashton, Gus <Gus.Ashton@mail.house.gov>
Cc: Schneider, Mary <Mary.Schneider@mail.house.gov>; Congressman M. McCaul Colleen Gilbert, <colleen.gilbert@mail.house.gov>
Subject: Re: Overview of Disaster Supplemental Funding

33

3/23/2019

Gus and Mary,

Thank you for your helpful and prompt response to my telephone request. Our greatest goal is to seek out and facilitate a favorable government decision-making followed by action to locate, design and construct a **drainage system** which effectively manages the ever increasing **catastrophic upper watershed run-off** flowing downstream in 1) Cypress Creek Watershed communities.

The meetings in Galveston last year with Col. Zetterstrom USACE Galveston District Commander concluded a systems engineering approach is essential to achieving this goal - - - the "system" encompassing as primary elements the Addicks reservoir/watershed / Cypress Creek Overflow and the upper Cypress Creek Watershed. We wish to confirm our understanding based on the information provided in your message below that the -216 Phase 2 study will do this. Therefore the delay in OMB encomberment of the Disaster funding associated with this -216 Phase 2 study must be resolved without further beaucratic delay.

It is respectfully requested that Congressman Culberson advise/counsel us on what we can do to be helpful in bringing resolution to this delay

R.D. (Dick) Smith
President
Cypress Creek Flood Control Coalition
Tel: 281-469-5161
floodalliance@ccfcc.org
www.ccfcc.org

From: Ashton, Gus
Sent: Wednesday, June 20, 2018 12:46 PM
To: floodalliance@ccfcc.org
Subject: Overview of Disaster Supplemental Funding

Hi Dick,

Apologies that we got disconnected. Attached is the handout I mentioned before we got disconnected.

For a third reservoir, the Congressman supports looking into all possible ideas to reduce the impacts of flooding and protect people's homes and lives. Congressman Culberson met with USACE leadership following passage of the Bipartisan Budget Act of 2018, the bill that included the comprehensive disaster supplemental, and expressed that a Section 216 study of the Buffalo Bayou and Tributaries Watershed, which includes Addicks and Barker, needs to be at the top of the USACE's priority list for the investigations they will complete with the funding provided by the bill. A Section 216 study looks at the operations and management of a water resources project and makes recommendations. The Buffalo Bayou and Tributaries 216 study would look at all possible options such as: an additional reservoir/dam; increased reservoir storage capacity; reservoir water level equalization; improved outlet discharge capacity; improved inflow and

3RD RESERVOIR

34

3/23/2019

outlet discharge channels; acquisition of flowage easements and buyouts; changes in dam operation plan; and, development of ways to better inform residents of their risk.

The disaster supplemental also authorizes construction funding for projects identified by investigations undertaken with the funds provided by the disaster supplemental. Therefore, if the Section 216 study identifies a third reservoir, excavation of the reservoirs, or a combination of solutions as the best course of action, that project would be eligible for construction funding provided by the disaster supplemental.

Please don't hesitate to call me back when you are available, I can be reached at 202-225-2571.

Regards,
Gus

Gus Ashton
Legislative Assistant
Office of Congressman John Culberson (TX-07)
2161 Rayburn House Office Building
P: (202) 225-2571 F: (202) 225-4381

35

3/23/2019

Cypress Creek Flood Control Coalition

From: "Ashton, Gus" <Gus.Ashton@mail.house.gov>
Date: Wednesday, June 20, 2018 12:46 PM
To: <floodalliance@ccfcc.org>
Attach: Updated Flood Control Handout (May 24, 2018).pdf
Subject: Overview of Disaster Supplemental Funding

Hi Dick,

Apologies that we got disconnected. Attached is the handout I mentioned before we got disconnected.

For a third reservoir, the Congressman supports looking into all possible ideas to reduce the impacts of flooding and protect people's homes and lives. Congressman Culberson met with USACE leadership following passage of the Bipartisan Budget Act of 2018, the bill that included the comprehensive disaster supplemental, and expressed that a Section 216 study of the Buffalo Bayou and Tributaries Watershed, which includes Addicks and Barker, needs to be at the top of the USACE's priority list for the investigations they will complete with the funding provided by the bill. A Section 216 study looks at the operations and management of a water resources project and makes recommendations. The Buffalo Bayou and Tributaries 216 study would look at all possible options such as: an additional reservoir/dam; increased reservoir storage capacity; reservoir water level equalization; improved outlet discharge capacity; improved inflow and outlet discharge channels; acquisition of flowage easements and buyouts; changes in dam operation plan; and, development of ways to better inform residents of their risk.

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36

3/23/2019

McCaul Orders Army Corps to Expedite Flood Mitigation Studies

Jun 8, 2018

Press Release

WASHINGTON, DC – Congressman **Michael McCaul (TX-10)**, along with Congressman **John Culberson (TX-07)**, offered an amendment to the *Water Resource Development Act (WRDA) of 2018* to require the U.S. Army Corps of Engineers to expedite the completion of flood and storm damage reduction studies to reduce the risk of damage from future floods and hurricanes in the Houston and Coastal Texas areas.

WRDA bills provide the U.S. Army Corps of Engineers with direction and reforms for federal investments in water resources infrastructure.

McCaul's amendment was adopted and the U.S. House of Representatives passed WRDA by a vote of 408 – 2.

Congressman McCaul: *"As Texas continues to recover from the worst natural disaster in our history, one of the best ways to prevent future flooding is to expedite flood mitigation studies in the Houston area. Congress has appropriated \$12.1 billion to the Army Corps to conduct studies for projects like the Cypress Creek solution, but sadly, these studies often take years to complete. We do not have the luxury of time for another major flood event. The federal government is plagued with what I like to call 'paralysis of analysis' and Texans need action now."*

"I appreciate Representatives Culberson, Brady, Olson, Weber, Poe, and Al Green for cosponsoring my amendment. And I thank Chairman Shuster for working with me on this vital issue to Southeast Texas."

Congressman Culberson: *"Many families and business owners across Houston have experienced the devastation of watching their homes and businesses flood. I'm proud to be a lead sponsor of Representative McCaul's (TX-10) amendment to ensure that the U.S Army Corps of Engineers will clear the backlog of studies that are so desperately needed to protect our communities from future storms like Harvey. This amendment will make sure that the Army Corps of Engineers completes these studies rapidly and that they execute quickly in building whatever is recommended to help protect the people of Houston and Southeast Texas from the next storm."*

Post-Harvey Flood Control Regulations Are Hitting Developers Hard

March 19, 2019 | Tierra Smith, Bisnow Houston

Want to get a jump-start on upcoming deals? Meet the major Houston players at one of our upcoming events!

FEATURED SPEAKER
ROGER GREGORY



Since the first round of new local flood plain regulations went into effect at the beginning of 2018, the real estate industry has been scrambling to understand and implement the standards. The ordinances, put into place after Hurricane Harvey's flooding devastated Houston, called for stricter regulations on properties within the region's flood plains.

With some experience building within the new codes under their belts, some developers and contractors throughout Harris County say their burden — higher construction costs, fewer favorable sites and increased time to permit and build — is too steep.



"It is almost a tax to people," Edifis Group President Josh Aruh said. "If things cost us more to develop, we are going to pass that back down to the tenant. What do you think the tenant is going to do? He is going to charge more to the customers."

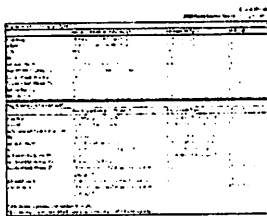
The new codes took effect in most of Harris County on Jan. 1, 2018, and in the city of Houston Sept. 1. Within Houston city limits, the

new standard is to build 24 inches above the 500-year flood plain for all new construction and additions larger than a third of the original footprint.

The rest of Harris County requires the lowest finished level to be at the 500-year flood level plus 36 inches, a big change over the former policy of 100-year level plus 18 inches. New construction will have to be at least twice as high. For projects within the 100-year flood plain, permits will also require a pier-and-beam foundation and additional wind design. ←

No longer can developers in the city build slab-on-grade foundations, a standard in the industry. (Sites within Harris County can use slab on grade.) Industry leaders will discuss best practices and challenges under the new flood plain regulations at the Houston State of the Market event May 1.

"The new regulations are planning for things that historically have not been the case," Aruh said. "Raising and building to the new regulations are very costly."



Construction of 249 Business Park near the intersection of Highway 249 and Beltway 8 was being planned as the new regulations were being discussed, and building up to those codes would have increased costs by \$2M, Alston

Construction Vice President Radie Stroud said.

"We are not talking about a little money on a project. These are big increases," Stroud said.

The new regulations would have required increased mitigation, such as bigger detention ponds and higher elevations, so the developer pushed the construction timeline ahead. Instead of only constructing Phase 1, which had two industrial buildings, the developer secured the appropriate permitting before the new codes were set and is building all four buildings at one time

were not and is building all four buildings at one time.

"It may not have helped the developer, but it did help us," Stroud said. "It was going to make doing the second phase of the project really challenging."

The new detention policies aren't just more expensive; they are also more complicated. ←

Previously, there was a specific formula across the board to determine detention. With the new requirements, it is more site-specific and takes a more holistic view of the community, Lee & Associates principal Patrick Wolford said.

Developers must weigh the unknowns that may lead to higher land costs, construction costs and rents, Wolford said. He suggested developers work with engineers early in the pre-planning process to discover the detention requirements at a property.

"It causes issues for developers because they don't know when they purchase a land tract how much detention will be required for any specific tract of land," he said. "It is a big question mark."



Many clients are passing on sites within the 100-year flood plain in unincorporated Harris County because they have become economically unfeasible to develop under the new codes, Wolford said.

In September, Harris County launched the years-long process of drawing new maps, according to the Houston Chronicle. ←

"If [Harris County] expands the 100-year flood plains then that will reduce the amount of dirt outside of the flood plains for development, which will drive prices up," he said. ←

The new regulations will impact areas like Kingwood that were

flooded for the first time in Harvey, Aruh said. Edifis Group owns and manages properties in Kingwood, and if it wanted to redevelop any of the properties now they would have to be raised above the 500-year flood plain.

While Aruh hasn't calculated the cost difference, he said retail properties will be required to build stairs, ramps and other improvements to accommodate the elevation difference for customers while meeting American Disability Act standards.



There is a workaround, Stroud said. A developer can submit a Letter of Map Revision (a LOMR-F) to the Federal Emergency Management Agency to request a land site be removed from the 100-year flood plain. This process can take between six and eight months and there is no guarantee it would be approved, he said.

Sophisticated property owners will opt to increase mitigation prior to marketing sites as it might be easier to sell, Stroud said.

"No one is going to want to buy a site without knowing the LOMR-F has been approved," he said. "It slows down the transaction process."

Aruh believes the regulations happened too fast and further research needs to be considered for commercial property vs. residential property since the loss of life — though maybe not the loss of property — is lower at commercial property.

"In a storm, people stay at home," he said. "Usually, people know when a storm it is coming. They close down the businesses and go home. Forcing commercial developers to build to the 500-year regulation is pretty punitive."

Along with the impact of flood control regulations, industry experts such as Transwestern CEO Larry Heard, Midway CEO Jonathan

Brinsden and The Howard Hughes Corp. Central Region President Paul Layne will discuss the state of the market, opportunity zones and the Innovation District on May 1.

See Also: From Drumming With Prince And Beyoncé To Building With Shipping Containers: Queen Cora Constructs Hurricane-Resistant Projects

Related Topics: Kingwood, Alston Construction, City of Houston, Lee & Associates, Building Codes, flooding, Harris County, Patrick Wolford, Radie Stroud, Harris County Flood Control District, Lee & Associates Houston, Edifis Group, Houston Flooding, Hurricane Harvey, code enforcement, Rising construction cost, Josh Aruh

Cypress Creek Flood Control Coalition

Profit and Loss Standard

01/15/19

January through December 2018

	<u>Jan - Dec '...</u>
Ordinary Income/Expense	
Income	
I - 2 — Resident Voluntary Contribu...	20,342.14
I - 4 — Interest Earnings	9.57
	<hr/>
Total Income	20,351.71
Expense	
9- — ATT internet service	116.84
10 — Office Supplies, Print, Postage	2,725.83
13 — Contributions & Membership ...	310.00
14 — Houston-Galveston Area Cou...	250.00
18 — Engineering/Technical Consu...	20,000.00
23 — Cypress Creek Greenway Pr...	3,074.64
7 — Administration Expense	2,902.08
8 — Fed Income Tax Preparation	20.85
11 — Computer ops and maintenanc...	5,328.33
12 — D&O L Liability Insurance	914.00
6230 — Admin / Management Expe...	4.00
9 — Earthlink, SBC,DSL,Symantec	678.58
	<hr/>
Total Expense	36,325.15
	<hr/>
Net Ordinary Income	-15,973.44
	<hr/>
Net Income	-15,973.44

Cypress Creek Flood Control Coalition Balance Sheet Standard

01/15/19

As of December 31, 2018

	<u>Dec 31, '18</u>
ASSETS	
Current Assets	
Checking/Savings	
1.1110 — Checking - Amegy Bank 365...	42,027.42
1.1130 — Investments - Amegy	<u>16,099.50</u>
Total Checking/Savings	<u>58,126.92</u>
Total Current Assets	58,126.92
Fixed Assets	
1.1300 — Computer & Office Equipment	<u>2,334.30</u>
Total Fixed Assets	<u>2,334.30</u>
TOTAL ASSETS	<u><u>60,461.22</u></u>
LIABILITIES & EQUITY	
Equity	
3000 — Opening Bal Equity	24,870.64
3900 — Retained Earnings	51,564.02
Net Income	<u>-15,973.44</u>
Total Equity	<u>60,461.22</u>
TOTAL LIABILITIES & EQUITY	<u><u>60,461.22</u></u>

CCFCC
2018 Budget

Funds/Expense			2018 Budget	Total 2018	Proposed 2019 Budget	Current		Total 2019
						1/16/19	02/20/19	
Funds								
	Bank Balance Checking					\$43,257.61		
	Bank Balance Savings					\$16,099.50		
	Total Funds Available					\$59,357.11		
1-1	MUD/HOA Contributions							
1-2	Resident Vountary Contribution		\$21,000.00	\$21,154.41	\$22,000.00	\$1,282.60	\$2,314.59	\$3,597.19
1-3	Grant Applications							
	3a.- Houston Endowment							
	3b. - Other Sources (See Treasurer's Report)(Web site)						\$5.27	
Total	1-3 Grant Applications							
	Misc							
1-4	Interest Earnings (Includes cking & savings)		\$6.00	\$7.93	\$8.00	\$2.24	\$2.24	\$4.48
Total	Income		\$21,500.00	\$21,162.34	\$22,007.00	\$1,284.84	\$2,322.10	\$3,606.94
Expense								
1	Membership Bus. & Community Outreach							
2	Annual Meeting							
3	Preservation Committee							
4	IT Mgt-Evaluation Comm.							
5	AWBD Committee							
6	Legal & Accounting Fees & Banking fees							
7	Administration Expense		\$1,000.00	\$1,682.11	\$2,200.00			\$0.00
8	Fed Income Tax Preparation							
9	ATT, SBC,DSL,Symantec		\$1,500.00	\$1,106.34	\$1,400.00	\$318.32	\$58.42	\$376.74
10	Office Supplies,Print Postage		\$1,500.00	\$3,174.12	\$3,200.00	\$22.68	\$40.40	\$63.08
11	Computer ops & maint.			\$5,533.96	\$3,000.00		\$595.11	\$595.11
12	D&O Liability Insurance		\$1,000.00	\$914.00	\$1,000.00		\$914.00	\$914.00
13	Contributions & membership Dues		\$1,500.00	\$910.00	\$1,000.00			\$0.00
14	Houston-Galveston Area Council							
15	Publications	Web Site			\$2,000.00		\$750.00	
16	Environmental Affairs Committee							
17	Seminar/Conference Expense		\$100.00	\$65.00	\$100.00			\$0.00
Total 1->17			\$6,600.00	\$13,848.51	\$13,900.00	\$341.00	\$2,357.93	\$2,698.93
18	Engr / Tech Consultation							
	18-1 PY Work to be Paid in '2019							
	Rice Univ. NAI Project							
	LG Dunbar-Engineering Consulting		\$12,000.00	\$0.00	\$40,000.00			\$0.00
	Total 18-1 PY Work to be Paid In '19		\$12,000.00	\$0.00	\$40,000.00			\$0.00
	18-ii CY 2018 Work							
	Rice Univ-stream gage study		\$20,000.00	\$20,000.00				\$0.00
	Future Conditions-begin 4/1/10 (L Dunbar)							
	Houston Endowment for Future Conditions)(Encumbered Grant)							
	Aerial Photo's							
	Total 18-ii-CY 2019 Work							
Total 18	Engr / Tech Consultation		\$32,000.00	\$20,000.00	\$40,000.00	\$0.00		\$0.00
19	Reserve for Future Requirements							
20	Grant Proposal Expense							
21	Operator Fee - Customer Billing							
22	Bookkeeping							
23	Cypress Creek Greenway Project-J Robertson		\$3,000.00	\$2,474.64	\$2,500.00			\$0.00
	23a Meyer Park / REI (Encumbered Grant)							
	23b Memorial Lady Bug (Encumbered Grant)							
	23d Cypress Creek Greenway Project-other							
Total 23	Cypress Creek Greenway project		\$3,000.00	\$2,474.64	\$2,500.00	\$0.00		\$0.00
24	Detention Pond Committee							
25	Contingencies							
26	Misc. office Equipment							
Total expense			\$41,600.00	\$36,323.15	\$56,400.00	\$341.00	\$2,357.93	\$2,698.93
Total Income			\$21,500.00	\$21,162.34	\$22,007.00	\$1,284.84	\$2,322.10	\$3,606.94

Cypress Creek Flood Control Coalition

Board and Committee Members

January 01, 2018

Directors / Officers

	<u>3-year term ending¹</u>
M. (Dave) Baldwin	2020
GP (Pat) Kelly	2020
Vacancy (open for election/appointment)	2020
John Porea, Treasurer	2021
James H. Robertson	2020
John J. Sakoloski, Secretary	2021
John E. Sherman	2019
Richard D. Smith, President	2019
Peter R. Smullen, Vice President	2019
Carl Zeitler	2021

Committees / Special Chair

- Civic Association / MUD Membership Committee
(A volunteer is needed to fill vacancy)
- Communications and Public Outreach Committee
Dick Smith, Acting Chair
Lisa Foley, Nick Lyras, Dave Baldwin
- Cypress Creek Greenway Project
Jim Robertson, Chair
- Insurance and Corporate “Fact Sheet”
Carl Zeitler
- IT Management
Joe Velasco
- Nomination Committee
Jack Sakolosky Chair
Lisa Foley and (plus another member’s delegate to be appointed)
- Preservation Committee
Patsy Gillham, Chair
- Technical Management Committee
Pete Smullen, Chair
Jack Sakolosky

Year 2018 Annual Report BOD

¹ Term ends in March of the year shown below.