The Basin–Wide Approach New 303(D) Vision

Addressing Bacterial Impairments in Upper Trinity River Watersheds

ATEXAS A&M GRILIFE RESEARCH





 Implement a *River <u>Basin</u> Approach* for addressing multiple bacterial impairments simultaneously

Project Partners

- Texas Institute for Applied Environmental Research (TiAER)
 North Central Texas Council of Governments (NCTCOG)
- ⊙ Conduct initial outreach to raise awareness in the watershed

TCEQ Tasking



Public Education and Outreach Task

 Facilitating watershed leaders with General Education & Outreach needs across Target Watersheds

- Summarize Existing Water Quality Data Task
 - Collection of known existing data information, & previously developed reports
 - Overall assessment of the watershed, its impairments, and potential sources

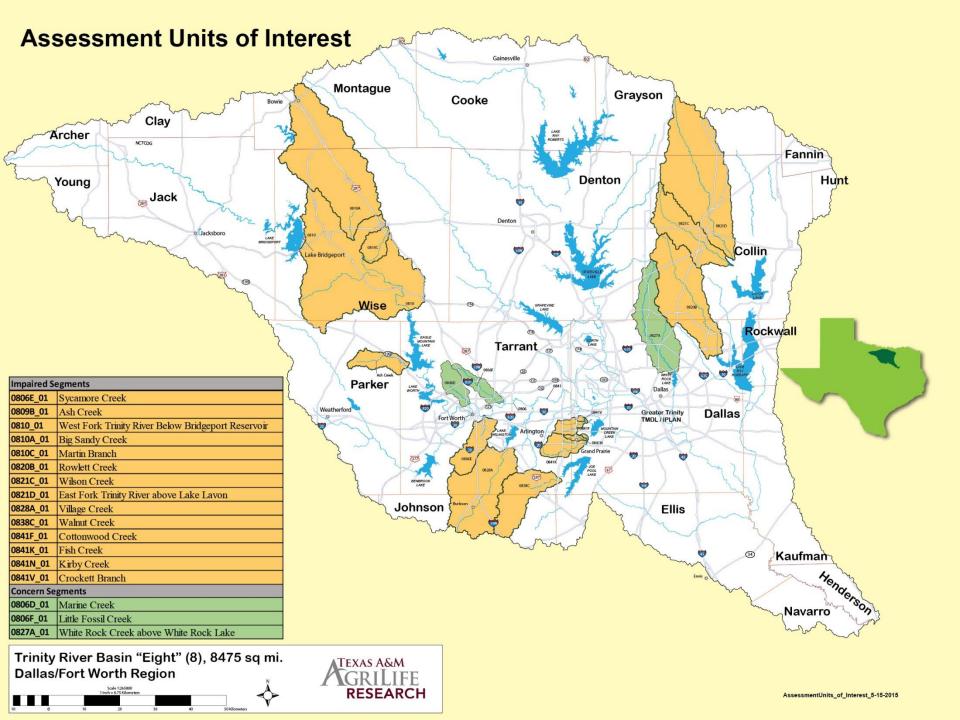
Impaired and Concern Segments/ AUs

Impaired Segments		Square miles
0806E_01	Sycamore Creek	37
0809B_01	Ash Creek	27
0810_01	West Fork Trinity River Below Bridgeport Reservoir	309
0810A_01	Big Sandy Creek	228
0810C_01	Martin Branch	21
0820B_01	Rowlett Creek	137
0821C_01	Wilson Creek	76
0821D_01	East Fork Trinity River above Lake Lavon	209
0828A_01	Village Creek	121
0838C_01	Walnut Creek	67
0841F_01	Cottonwood Creek	11
0841K_01	Fish Creek	26
0841N_01	Kirby Creek	3
0841V_01	Crockett Branch	1
	Subtotal	1,275
Concern Se	gments	
0806D_01	Marine Creek	22
0806F_01	Little Fossil Creek	20
0827A_01	White Rock Creek above White Rock Lake	84
	Subtotal	126
	Watershed total	8,475
	Current tasked acreage	1,401
	Area not currently under study.	7,074

New Approach to Address Impaired Water Bodies



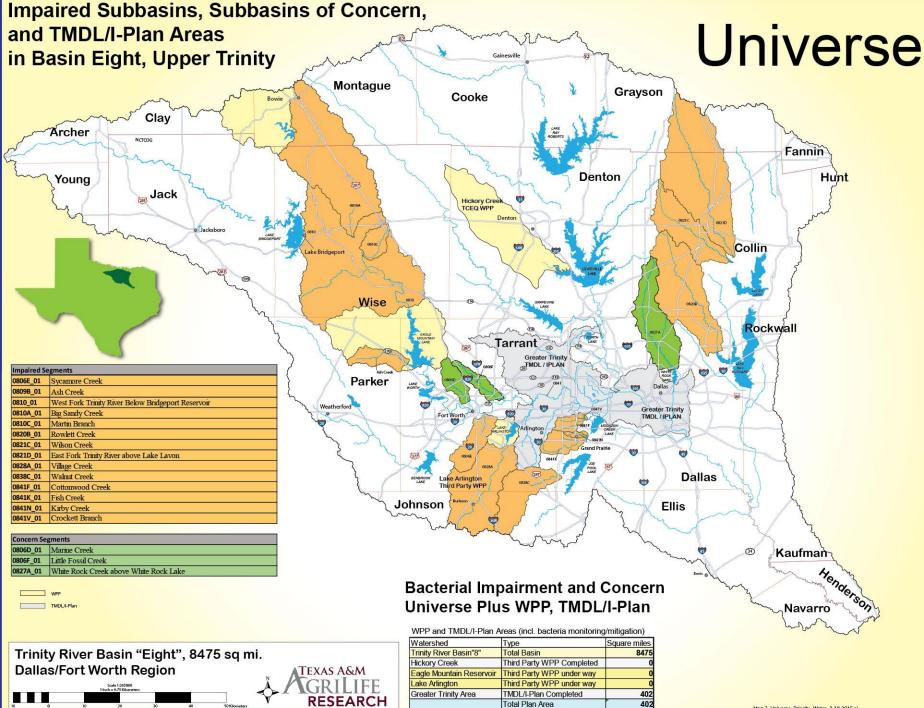
- Developed in 2011 by the State of Texas and EPA
- A strategy to improve on the TMDL approach to addressing impairments
- Provides the opportunity to use different methods to address impairments
- Will be built into the National Water Program Guidance

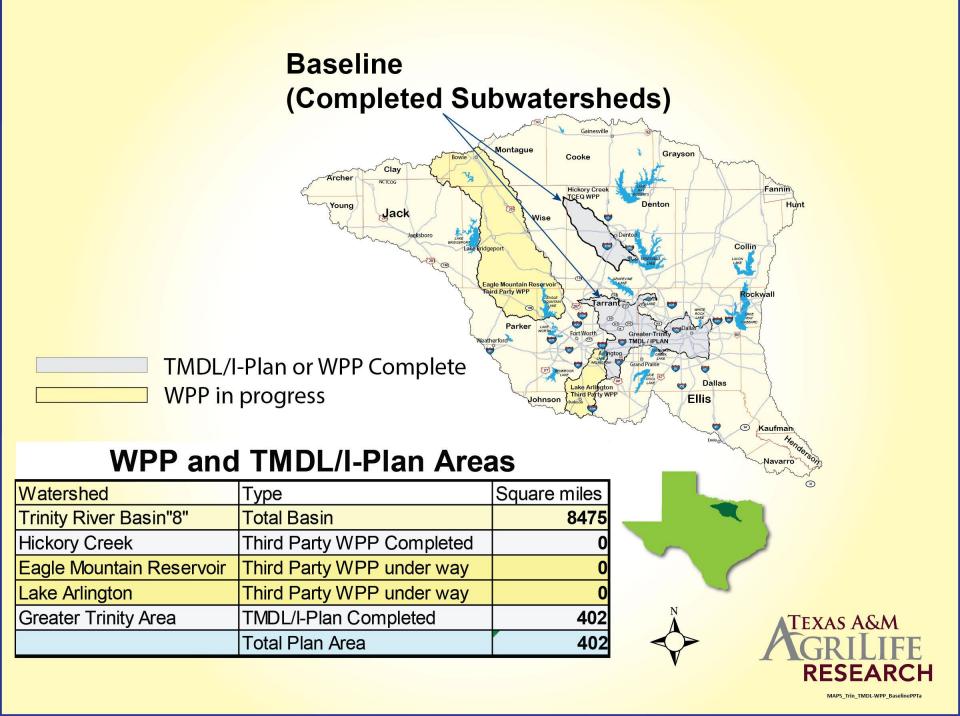






- The Baseline is the percentage of the Universe that has an approved plan in place [Starting Point]
- Approved plans include
 - TCEQ adopted and EPA approved TMDL with TCEQ approved Implementation Plan
 - EPA approved Watershed Protection Plan

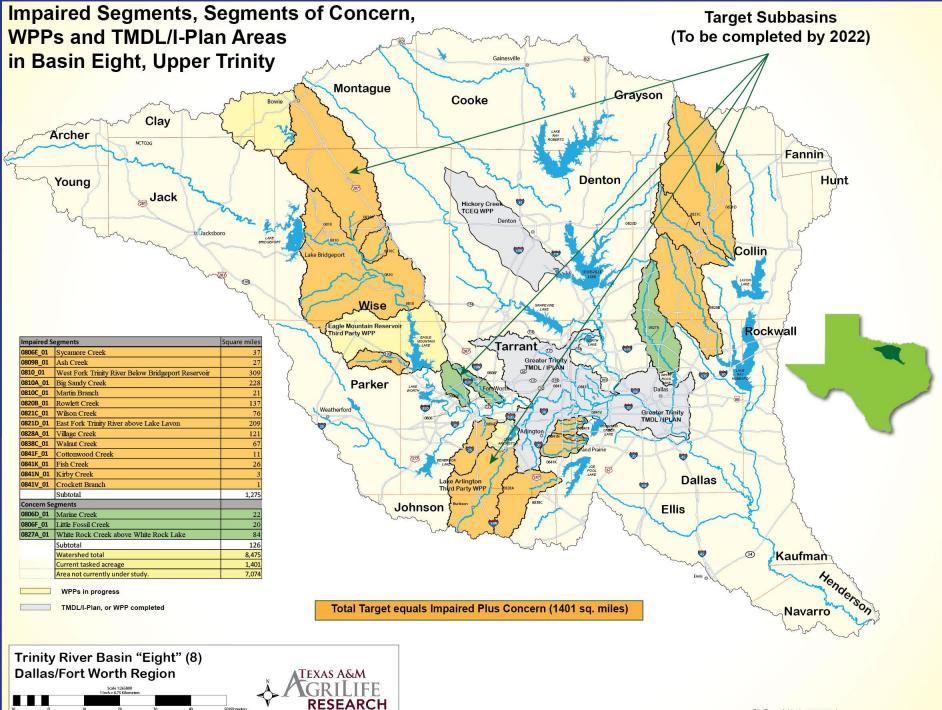








- The extent of areas within the Universe projected to have a TMDL I-Plan, Watershed Protection Plan, or other per year by 2022
- Coordinating Committee will identify annual commitments in each fiscal year to work toward the 2022 target
 - The commitments to watershed based plans will be small in the initial years because of the initial work needed for outreach and education so stakeholders can make an informed decision on the approach to be used in their watershed



Time Frame



- \odot 7 years to complete the plans
- Years 1-4
 - Initial outreach to raise awareness in the watershed
 - Determine <u>the need</u> for Recreational Use Attainability Analyses (RUAAs) and additional sampling
 - Complete the RUAAs and sampling

Time Frame



- Years 4-7
 - Coordinating Committee will determine what approach will be used to develop plans
 - Develop plans
 - TMDL/Implementation Plan
 - Watershed Protection Plan
 - Both
 - Other

Additional Tasking



- Recovery Potential Index (RPI)
 - EPA Recovery Potential Screening Tool

- ⊙ Texas State Stream Team (TSST)
 - Assessing Capacity for Bacteria

Upper Trinity River Basin Eight Score Card Draft 05/17/2015				
Listed Stream Segments	Square miles			
Impaired, Plus Concern Watershed Targets		Projected completion	Cumulative percent of Targeted	
*Cottonwood Creek (unclassified water body) - 0841F_01 **Fish Creek (unclassified water body) - 0841K_01 **Kirby Creek (unclassified water body) - 0841N_01 *Crockett Branch (unclassified water body) - 0841V_01	11.5 26.0 3.1 1.2	2016		
Subtotal	41.7		3%	
***West Fork Trinity River Below Bridgeport Reservoir - 0810_01 ***Big Sandy Creek (unclassified water body) - 0810A_01 ***Martin Branch (unclassified water body) - 0810C_01 Ash Creek - 0809B_01	309.4 227.8 21.3 26.6	2017		
Subtotal	585.2		45%	
Village Creek (unclassified water body) - 0828A_01 Walnut Creek (unclassified water body) - 0838C_01	121.4 67.3	2018		
Subtotal	188.7		58%	
<pre># Marine Creek (unclassified water body) - 0806D_01 # Little Fossil Creek (unclassified water body) - 0806F_01 Sycamore Creek (unclassified water body) - 0806E_01</pre>	21.9 19.7 37.1			
Subtotal	78.6		64%	
Rowlett Creek (unclassified water body) - 0820B_01 # White Rock Creek above White Rock Lake (unclassified water body) - 0827A_01	136.8 84.3	2020		
Subtotal	221.1		80%	
Wilson Creek (unclassified water body) - 0821C_01 East Fork Trinity River above Lake Lavon (unclassified water body) - 0821D_01	76.4 209.4	2021		
Subtotal	285.8		100%	
		% of Uni	verse	
Targeted	1401.0	16.53%		
Universe total	8475.0	100.00		



Contact

Larry J. Beran, PhD Senior Research Scientist Texas A&M AgriLife Research and Extension Center - Stephenville Texas A&M AgriLife Research

1229 North US Highway 281| Stephenville, Texas 76401 p: (254) 968-4144 Ext 230 | c: (254) 592-6059 | f: (254) 965-3759 <u>Iberan@ag.tamu.edu</u>

