



City of Franklin

109 3rd Ave S
Franklin, TN 37064
(615)791-3217

Meeting Agenda

Work Session

Tuesday, February 11, 2020

5:00 PM

Board Room

Call to Order

Citizen Comments

WORKSESSION DISCUSSION ITEMS

1. [20-0132](#) Civil War Historical Commission Update
Sponsors: Emily Hunter
Attachments: [CWHC Update 2.11.20](#)
2. [20-0096](#) Stormwater Fund Review Update.
Sponsors: Michael Walters Young and Holland Schellhase
Attachments: [Presentation Stormwater Fund Review - BOMA.pdf](#)
[November 2018 - Stormwater Fund Review.pdf](#)
Legislative History
1/28/20 Work Session referred to the Work Session
3. [20-0145](#) Discussion And Consideration On The City Participating In The Road Impact Fee Development Agreement For The Proposed Southbrooke Development By Contributing Additional Funding For The Purpose Of The Southbrooke Developer Fully Improving The Goose Creek Bypass/Lewisburg Pike Intersection.
Sponsors: Vernon Gerth and Paul Holzen
Attachments: [COF 2019-0221 Exhibit A \(Intersection Improvements Only\).pdf](#)
4. **19-1301** DRAFT Consideration Of Water And Sewer Impact Fees And The Addition Of A Reclaimed Water Impact Fee. (WS 2/11/20)
Sponsors: Michelle Hatcher
Attachments: 20200211_PPT_Worksession Presentation_V2.pdf

5. [20-0134](#) Overview Of The 2019 Annual Development Permit Activity Report.
- Sponsors:** Eric Stuckey and Vernon Gerth
- Attachments:** [Final - Development Activity Report BOMA Worksession Presentation- 2.11.202](#)
[December 2019 - final.pdf](#)
[QUARTERLY PERMIT SUMMARY - Oct - Dec 19.pdf](#)
6. [20-0031](#) Consideration Of Ordinance 2019-59, An Ordinance To Rezone 20 Acres From Planned District (PD) To Planned District 12.7 (PD 12.7) For The Property Located North Of Del Rio Pike And East Of Brink Place, Located At 801 Del Rio Pike (The Madison PUD). (FMPC 1/23/20, 8-0; WS 2/11/20; BOMA 2/11/20, 8-0; 3/10/20, 7-1) THIRD AND FINAL READING
- Sponsors:** Amy Diaz-Barriga and Emily Hunter
- Attachments:** [ORD 2019-59 The Madison Rez_with Exhibits.Law Approved](#)
[MAP The Madison Rez-DP](#)
[THE MADISON REZONING PLANS](#)
- Legislative History**
- | | | |
|---------|--|--|
| 1/23/20 | Franklin Municipal Planning Commission | recommended favorably to the Board of Alderman and to the Work Session |
|---------|--|--|
7. [20-0032](#) PUBLIC HEARING: Consideration Of Resolution 2019-134, A Resolution To Approve A Development Plan For The Madison PUD Subdivision With 2 Modifications Of Standards, Both For Reductions Of The Class C Buffer, For The Property Located North Of Del Rio Pike And East Of Brink Place, On 20 Acres, Located At 801 Del Rio Pike. (FMPC 1/23/20, 8-0; WS 2/11/20)
- Sponsors:** Amy Diaz-Barriga and Emily Hunter
- Attachments:** [RES 2019-134 The Madison PUD_with Exhibit.Law Approved](#)
[MAP The Madison Rez-DP](#)
[7141 The Madison_DP_Conditions of Approval_01](#)
[THE MADISON PUD DEVELOPMENT PLANS](#)
[The Madison Franklin-Stillman Public Comment](#)
- Legislative History**
- | | | |
|---------|--|--|
| 1/23/20 | Franklin Municipal Planning Commission | recommended favorably to the Board of Alderman and to the Work Session |
|---------|--|--|

8. [19-1282](#) Consideration Of COF Contract No. 2019-0370 Parkland Impact Fee (Payment Of Fee Only) Agreement For The Madison Between The City Of Franklin And Franklin Meadowview Apartments, LLC For The Amount Of Two Hundred Seventy-Five Thousand Four Hundred Fifty-Six Dollars (\$275,456.00). (WS 2/11/20)
- Sponsors:** Lisa Clayton and Parks
- Attachments:** [2019-0370 The Madison Parkland Impact Fee Agreement.Law Approved.Signer](#)
9. [20-0035](#) PUBLIC HEARING: Consideration Of Resolution 2020-02, A Resolution Approving A Revised Development Plan For McKays Mill PUD Subdivision, For The Property Located North And South Of Liberty Pike And East Of Turning Wheel Lane. (FMPC 1/23/20, 8-0; WS 2/11/20)
- Sponsors:** Amy Diaz-Barriga and Emily Hunter
- Attachments:** [2020-02 RES McKays Mill animal services with Exhibits.Law Approved](#)
[MAP 7159 MCAYS MILL RES 2020](#)
[COF 7159 McKays Mill Concept Plan](#)
- Legislative History**
- | | | |
|---------|--|--|
| 1/23/20 | Franklin Municipal Planning Commission | recommended favorably to the Board of Alderman and to the Work Session |
|---------|--|--|
10. [19-1307](#) PUBLIC HEARING: Consideration Of Resolution 2019-131, A Resolution Initiating The Annexation Process And Draft Plan Of Services, For The Annexation Of 841 Old Charlotte Pike. (WS 2/11/20)
- Sponsors:** Emily Hunter
- Attachments:** [Annexation Draft POS Aerial Old Charlotte Pike](#)
[2019-131 RES 7161 Old Charlotte Pike Annexation with Exhibits.Law Approver](#)
[Exhibit B- Draft Plan of Services](#)
11. [20-0147](#) *Consideration Of Resolution 2020-06, A Resolution Authorizing The Use Of The Competitive Sealed Proposal Procurement Method For Selecting The Solution And Service Provider For Wastewater Flow Monitoring Services (Purchasing Office Procurement Solicitation No. 2020-021) For The Water Management Department.
- Sponsors:** Michelle Hatcher and Brian Goodwin
- Attachments:** [Res 2020-06 Competitive Sealed Proposal Method.Law Approved](#)

12. [19-1203](#) Consideration Of Procurement Award To Middle Tennessee Infrastructure, Inc. Of Murfreesboro, Tennessee In The Total Amount Of \$554,057.40 For Holiday Court Sewer System Improvements For The Sewer-General Division Of The Water Management Department (Purchasing Office Procurement Solicitation No. 2020-017; City Project No. 2019-016; \$500,000 Budgeted In 431-89320-52219 For Fiscal Year 2020; City Contract No. 2019-0310) (WS 2/25/20)

Sponsors: Michelle Hatcher and Brian Goodwin

Attachments: [2020-017 Tabulation of bids 2020.02.19.1119](#)
 [2019-0310 C-520 Agreement with all but attachments 2a, 2b and 9c.Law Review](#)
 [2020-017 Tabulation of bid line-item pricing 2020.02.06](#)
 [Master](#)

13. [20-0091](#) Consideration Of Resolution 2020-03, A Resolution To Amend COF Contract No. 2019-0007 Parkland Agreement Impact Fee And Greenway Trail System Construction As Amended, Agreement Between The City Of Franklin And Clayton Properties Group, Inc. (WS 2/11/20; BOMA 2/25/20, deferred to the 3/10/20 meeting)

Sponsors: Lisa Clayton and Parks

Attachments: [2020-03 RES 2nd Resolution to Amend _ Reese Farms Parkland agmnt.Law Ap](#)

Other Business

Adjournment

Anyone requesting accommodations due to disabilities should contact ADA coordinator at 791-3277.

Civil War Historical Commission Update

BOMA Work Session Presentation
February 11, 2020



HISTORIC
FRANKLIN
TENNESSEE



Role of CWHC

The Franklin Civil War Historical Commission serves as an advisory body to the Board of Mayor and Aldermen and City Administrator in the

- identification,
- preservation,
- interpretation,
- maintenance, and
- recognition

of battlefields and sites related to all aspects of Civil War history within the City of Franklin in order to protect and maintain the city's irreplaceable historical wealth for this and future generations.



CWHC Membership

African American Heritage
Society

Battle of Franklin Trust

Franklin's Charge

Heritage Foundation

Historic Franklin Masonic Hall

Lotz House

Save the Franklin Battlefield

Sons of Confederate Veterans

Sons of Union Veterans

Tennessee Preservation Trust

Williamson County CVB

COF Alderman Scott Speedy

One (1) Education Liaison

Five (5) At-Large Members





photo by Brandy Blanton



photo by Brandy Blanton



photo by B



Subcommittee Restructuring

- Historic Cemeteries
- Public Outreach & Interpretation
- Wayfinding Signage



HISTORIC CEMETERIES ACTION ITEMS

- Assisting Staff with Prioritization of Needs for City & Rest Haven Cemeteries
- Proposing a Memorandum of Agreement with Save the Franklin Battlefield for cemetery donations
- Developing Rules & Regulations for Historic Cemeteries
- Assisting with Volunteer Group Development for Burial Marker Cleaning



PUBLIC OUTREACH & INTERPRETATION ACTION ITEMS

- Evaluating the Historic Parks Audio Tour for accuracy, consistent messaging, appropriate timing, and additional interpretation needs/tour stops
- Audio Tour has 15 stops currently
- Plans include working with staff to develop updated print and digital brochure upon conclusion of update



WAYFINDING SIGNAGE OBJECTIVES

- Consistent
- Aesthetically Pleasing
- Economical
- Accurate
- Expandable







PHASED WAYFINDING PLAN –
RECOMMENDATIONS TARGETED
FOR 2021





City of Franklin, Tennessee
Board of Mayor and Aldermen

Stormwater Fund Review Update

BOMA Work Session

January 28, 2020

Agenda

- Review of November 2018 Study**
- Progress**
 - Billing Structure**
 - Update to Impervious Surface Maps**
 - Financial Sustainability**
- Options**
- Next Steps**
- Questions**



City of Franklin, Tennessee

Stormwater Fund Review Update

Slide 3

Review of November 2018 Study

- Finance Department spearheaded review of the Stormwater Fund
- Analyzed financial and operational stability of City Stormwater Fund
- Researched 14 other municipalities within Tennessee & Nationally to determine how others funds function. Found Franklin to have a basic fee structure and comparatively lower rates
- *Staff recommended more funding for fund, billing structure be analyzed, and Title 23 be amended to ensure a review every five years of the fee and fund*

City of Franklin, Tennessee

Stormwater Fund Review Update

Review of November 2018 Study

- Fee Structure: Based upon “ERU” – Equivalent Residential Unit
- Fee has not increased since 2004 (inception of the fund)

STORMWATER				
Applies to all properties inside the city limits of Franklin				
	SMALL ($<3,350$ ft*)	LARGE ($>3,350$ ft*)	Designated Rate	ERU ($3,350$ ft*)
3,350 = impervious surface*				
Residential - Inside City	\$2.74	\$4.38	NA	NA
Duplexes/Trailers (not codified)	NA	NA	\$2.74	NA
Apts/Condos (not codified)	NA	NA	\$2.74	NA
Commercial - Inside City (per ERU)	NA	NA	NA	\$3.65

- BOMA asked staff to continue to research and bring back refined recommendations

Progress - Billing Structure

- **Engineering, Finance, and Revenue Management reviewed existing stormwater customers and classifications to better understand our current billing structure**
- **Analyzed customer data to understand how multi-family units are billed**
- ***Determined current billing structure is suitable for system needs***



City of Franklin, Tennessee

Stormwater Fund Review Update

Slide 6

Progress - Impervious Surface Maps

- **Administration, Finance, Information Technology (GIS) and Revenue Management reviewed impervious surface maps in comparison to billing data to determine billing accuracy**
- **Integrated 2018 aerial (LIDAR) information into maps used to determine impervious surface.**
- ***Determined City, for the most part, is accurately capturing existing and new impervious surface areas and minimal change required to current ERU***



City of Franklin, Tennessee

Stormwater Fund Review Update

Slide 7

Progress - Financial Sustainability

- Finance and Stormwater (Engineering and Streets) divisions reviewed current and forecast revenues and expenditures for the stormwater fund
- Staff worked to refine necessary operational capital equipment needs (for streets division)
- *Validated earlier 2018 study that in order to maintain financial sustainability of the stormwater fund, either a fee increase or expense shift to the general fund is required or both*

Options for Financial Sustainability

Parameters

- Staff analyzed 3, 5 and 10 year scenarios
- Assumed 0.5% growth in revenues (new customers), 5% net growth in Personnel costs (no new personnel) and 2% net growth in operations, regular equipment replacement
- Maintain at least \$1,000,000 in Fund Balance (for state requirements & emergencies)
- Options DO NOT ASSUME sufficient resources for Stormwater Capital Projects – only Operational needs

City of Franklin, Tennessee

Stormwater Fund Review Update

Options for Financial Sustainability

Status Quo: No fee increase, no expense shift

	2020 Forecast	2021 Forecast	2022 Forecast	2023 Forecast	2024 Forecast
Beginning Balance	\$ 3,800,010	\$ 1,337,282	\$ 1,337,614	\$ 801,619	\$ 269,701
Revenues	\$ 2,647,500	\$ 2,660,738	\$ 2,674,041	\$ 2,687,411	\$ 2,700,848
Personnel	\$ 1,632,440	\$ 1,714,062	\$ 1,799,765	\$ 1,889,753	\$ 1,984,241
Operations	\$ 927,788	\$ 946,344	\$ 965,271	\$ 984,576	\$ 1,004,268
Capital	\$ 2,550,000	\$ -	\$ 445,000	\$ 345,000	\$ 257,000
Streets Capital	\$ -	\$ -	\$ 445,000	\$ 345,000	\$ 257,000
Engineering Capital	\$ 2,550,000	\$ -	\$ -	\$ -	\$ -
Expenses	\$ 5,110,228	\$ 2,660,406	\$ 3,210,036	\$ 3,219,329	\$ 3,245,509
Remaining Fund Balance	\$ 1,337,282	\$ 1,337,614	\$ 801,619	\$ 269,701	\$ (274,959)

Annual Rate Increase	0.0%
Annual Growth In System (a.k.a. customers)	0.5%
Annual Personnel Increase	5.0%
Annual Operations Increase	2.0%



Options for Financial Sustainability

Option #1: Fee Increase of 5% annually

	2020 Forecast	2021 Forecast	2022 Forecast	2023 Forecast	2024 Forecast
Beginning Balance	\$ 3,800,010	\$ 1,337,282	\$ 1,470,651	\$ 1,208,745	\$ 1,100,431
Revenues	\$ 2,647,500	\$ 2,793,774	\$ 2,948,130	\$ 3,111,015	\$ 3,282,898
Personnel	\$ 1,632,440	\$ 1,714,062	\$ 1,799,765	\$ 1,889,753	\$ 1,984,241
Operations	\$ 927,788	\$ 946,344	\$ 965,271	\$ 984,576	\$ 1,004,268
Capital	\$ 2,550,000	\$ -	\$ 445,000	\$ 345,000	\$ 257,000
Streets Capital	\$ -	\$ -	\$ 445,000	\$ 345,000	\$ 257,000
Engineering Capital	\$ 2,550,000	\$ -	\$ -	\$ -	\$ -
Expenses	\$ 5,110,228	\$ 2,660,406	\$ 3,210,036	\$ 3,219,329	\$ 3,245,509
Remaining Fund Balance	\$ 1,337,282	\$ 1,470,651	\$ 1,208,745	\$ 1,100,431	\$ 1,137,820

Yr over Year \$	\$ 133,369	\$ (261,905)	\$ (108,315)	\$ 37,390
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Annual Rate Increase	5.0%
Annual Growth In System (a.k.a. customers)	0.5%
Annual Personnel Increase	5.0%
Annual Operations Increase	2.0%



Options for Financial Sustainability

Option #2: Shift Expenses to Streets Dept.

- Shift \$350,000-\$450,000 annually back to G/F

	2020 Budget	2021 Forecast	2022 Forecast	2023 Forecast	2024 Forecast
Beginning Balance	\$ 3,800,010	\$ 1,337,282	\$ 1,542,614	\$ 1,471,869	\$ 1,315,964
Revenues	\$ 2,647,500	\$ 2,660,738	\$ 2,674,041	\$ 2,687,411	\$ 2,700,848
Personnel	\$ 1,632,440	\$ 1,509,062	\$ 1,584,515	\$ 1,663,741	\$ 1,746,928
Operations	\$ 927,788	\$ 946,344	\$ 965,271	\$ 984,576	\$ 1,004,268
Capital	\$ 2,550,000	\$ -	\$ 195,000	\$ 195,000	\$ 257,000
Streets Capital	\$ -	\$ -	\$ 195,000	\$ 195,000	\$ 257,000
Engineering Capital	\$ 2,550,000	\$ -	\$ -	\$ -	\$ -
Expenses	\$ 5,110,228	\$ 2,455,406	\$ 2,744,786	\$ 2,843,317	\$ 3,008,195
Remaining Fund Balance	\$ 1,337,282	\$ 1,542,614	\$ 1,471,869	\$ 1,315,964	\$ 1,008,617

Yr over Year \$	\$ 205,332	\$ (70,745)	\$ (155,906)	\$ (307,347)
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Annual Rate Increase	0.0%
Annual Growth In System (a.k.a. customers)	0.5%
Annual Personnel Increase	5.0%
Annual Operations Increase	2.0%

Next Steps

- Staff will prepare a budget recommendation for FY 2021 to be presented in March to Budget & Finance**
- FY 2021 budget recommendation in May will include some combination either fee increase or expense shift**
- Staff will work towards a five-year rate plan for the Stormwater Fund similar to Water & Sewer and ask BOMA to consider adopting multiple years of rates at one time.**



City of Franklin, Tennessee
Stormwater Fund Review Update

Slide 13

Questions

City of Franklin, Tennessee

Stormwater Fund Review

November 2018



HISTORIC
FRANKLIN
TENNESSEE



City of Franklin, Tennessee

Stormwater Fund Review

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Section I:

Executive Summary



Section I: Executive Summary

The City of Franklin, like many cities in the state and nation, has established a Stormwater Fund for purpose of accounting for and providing services related to the maintenance and proper treatment of Stormwater related activities. The purpose of this review is to answer the following questions:

- 1) What is the current design, funding, operation and structure of the Stormwater Fund in Franklin?
- 2) What should the function of the Stormwater fund be?
- 3) Is the revenue stream capable of providing for the needs of the fund in the future and if not to make recommendations on how to adjust the fees?
- 4) What should be the services and responsibilities charged to the fund and if necessary make recommendations on opportunities to reduce what is charged to the Stormwater Fund and identify where these operations could be charged (e.g. General Fund)?
- 5) What are the necessary and affordable capital projects that have Stormwater components and where they should be afforded from?

This review has been requested because the accumulated fund balance is forecast to no longer meet the needs of both ongoing operations and capital projects which staff has identified should be charged against the fund. But it is also the City's first formal examination of the sustainability of one of its funds. This review will examine the financial and operational sustainability of the Stormwater Fund and make appropriate recommendations for the Board of Mayor and Alderman to follow both in the short and longer terms.

The need to examine one's operations for efficiencies is not merely a good idea but a hallmark of any effective organization. The City of Franklin, Tennessee and governments at all levels have embraced as a standard operating procedure the phrase "do more with less." Evaluation of any service must be performed via the use of industry-accepted metrics. Subjectivity, though a part of anything having to do with political governance, must always take a back seat to pragmatic and practical data. That being said, to measure a program based upon the "bottom line" alone inappropriately disregards non-monetary and other less tangible – but not necessarily less valuable – aspects of public service.

This report and the analysis contained herein is intended, to the greatest extent possible, to reach objective, well-reasoned conclusions which provide policy makers within the City of



City of Franklin, Tennessee

Stormwater Fund Review

Franklin, Tennessee and ratepayers of the Stormwater Fund the information they need to have the most efficient and effective services possible.



City of Franklin, Tennessee

Stormwater Fund Review

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Section II:

Current Service Delivery Model



Section II: Current Service Delivery Model

To understand how to improve the sustainability of the Stormwater Fund, it is necessary first to understand its history, its structure and the services which are provided by it.

History of the Stormwater Fund

The Stormwater Fund was created in Fiscal Year 2003 in order to account for activities necessary for the City's compliance with Phase II of the National Pollution Discharge Elimination System (NPDES) Municipal Separate Storm Sewer System (MS4) program that became effective in March 10, 2003. This system, created by the Clean Water Act of 1972, addresses water pollution through the regulation of discharge into waterways.¹ Stormwater runoff – that portion of rain or melting snow that does not soak into the ground which runs off impervious surfaces – directly enters storm drains or waterways and thus has been deemed necessary to regulate and control to ensure the continued health of the nation's waters.

To pay for the costs of addressing that runoff, one option from which municipalities can choose is to create a stormwater utility and charge a fee to developed properties, including homes and businesses. These fees produce a dedicated revenue stream, restricted for use only on stormwater system management including maintenance, operations and capital projects. The stormwater utility provides funding to implement new programs in support of the six minimum control measures in the MS4 permit that includes public education and outreach, public participation/involvement, illicit discharge detection and elimination, construction site storm water runoff control, post-construction storm water management in new development / redevelopment, and pollution prevention/good housekeeping for municipal operations. Franklin chose to create a separate ordinance² and fee³ to comply with the NPDES (MS4) Phase II Permit.

Work studying how the City would comply with the rules of the MS4 permit began several years earlier, culminating in Ordinance 2001-53 which adopted a Stormwater Management Ordinance. In the ensuing years from 2001 to 2004, BOMA modified both the ordinance and the fee associated with Stormwater functions until approving the current fee via Ordinance 2004-25 on March 9, 2004.⁴

The fee currently is based on ERU's or Equivalent Residential Units, which are equivalent to 3,350 square feet of impervious area. The rate is \$3.65/ERU/month. There are two categories of charges – non-residential and residential. Non-Residential (Commercial) properties pay the rate, times the impervious area of the site, divided by the ERU. Residential properties pay dependent upon their size:

¹ <https://www.epa.gov/npdes/about-npdes>

² See Section VI: Appendices: Ordinance 2001-53, Page 46

³ See Section VI: Appendices: Ordinance 2002-14, Page 78 and Ordinance 2004-25, Page 83.

⁴ *Ibid.*



City of Franklin, Tennessee

Stormwater Fund Review

- Smaller than 3,350 sq. ft. pay at a rate of 75% of the ERU/month
- Larger than 3,350 sq. ft. pay at a rate of 120% of the ERU/month

This is detailed on Exhibit 1:

Exhibit 1: City of Franklin Current Stormwater Fees:

STORMWATER				
Applies to all properties inside the city limits of Franklin				
3,350 = impervious surface*	SMALL (<3,350 ft*)	LARGE (>3,350 ft*)	Designated Rate	ERU (3,350 ft*)
Residential - Inside City	\$2.74	\$4.38	NA	NA
Duplexes/Trailers (not codified)	NA	NA	\$2.74	NA
Apts/Condos (not codified)	NA	NA	\$2.74	NA
Commercial - Inside City (per ERU)	NA	NA	NA	\$3.65

The fee has NOT been adjusted since passage of Ordinance 2004-25, fourteen (14) years ago. It is charged monthly.

On average, the fee raises about \$2.4 million annually and has grown slowly. From FY 2013 to FY 2017, total Stormwater fees increased by 8%. Between 2016 and 2017, fee revenues only increased less than 1%, or \$21,249. Overall revenues for FY 2019 are forecast around \$2.7 million and include additional fees for plan review, inspections, fines, late pays and earned interest on cash balances.

Exhibit 2: Revenue Model History & Estimates for the Stormwater Fund:

	Actual					Budget	Actual	Budget
	FY 2013	FY 2014	FY 2015	FY 2016	FY 2017	FY 2018	FY 2018	FY 2019
PLANS REVIEW FEE	-	9,908	24,500	15,100	26,400	25,500	15,000	24,990
DRAINAGE INSPECTIONS	-	5,477	68,947	25,303	102,519	61,200	50,176	59,976
STORMWATER PERMIT FEE	5,950	12,482	10,789	8,225	15,075	40,877	8,913	40,059
FEMA/TEMA GRANTS (FED/STATE)	-	3,691	-	-	-	-	-	-
STORMWATER FEES	2,225,948	2,277,908	2,521,597	2,381,431	2,402,680	2,598,344	2,379,597	2,546,377
STORMWATER FINES	100	-	9,675	14,125	-	10,200	43,486	9,996
STORMWATER LATE PAY PENALTIES	21,179	20,754	23,398	21,640	18,869	31,518	23,279	30,888
INTEREST INCOME	20,719	8,930	14,441	83,971	(8,864)	10,200	28,288	9,996
SALE OF SURPLUS ASSETS	-	-	-	-	33,508	-	-	-
CUSTOMER SERVICE	-	(4,776)	-	(3,307)	-	-	-	-
MISCELLANEOUS REVENUE	-	-	-	193	-	-	-	-
CONTRIBUTIONS - OTHERS	110,000	6,589	-	-	-	-	-	-
Totals	\$ 2,383,896	\$ 2,340,963	\$ 2,673,347	\$ 2,546,681	\$ 2,590,187	\$ 2,777,838	\$ 2,548,739	\$ 2,722,281

Structure of the Stormwater Fund

The Stormwater Fund provides funding for two divisions contained within – the Streets and Engineering departments.

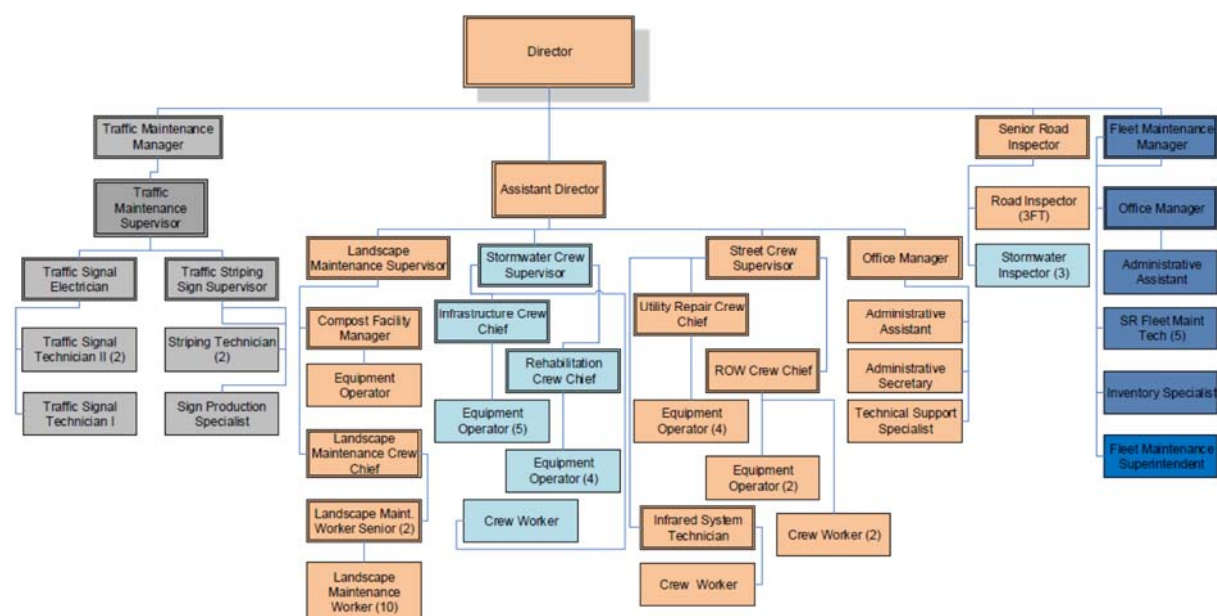
Streets

The Street Department, Stormwater Division performs maintenance as well as small repairs and upgrades to failing drainage systems. Work activities are performed daily, and include routine maintenance procedures, as well as small repairs and upgrades to failing drainage systems, vacuuming storm drains and street sweeping.

The Stormwater-Streets division consists of 16 employees: one supervisor, three Stormwater inspectors, 2 crew chiefs & 10 maintenance personnel.

In recent years the division performed sweeping operations throughout the City with two Street sweepers. Due to the increase of construction activities and additional curb and gutter along Mack Hatcher Parkway and Hillsboro Rd, the streets division will increase operations to three sweeping units daily.

Exhibit 3: Streets Department Organizational Chart *(shaded in light blue)*



As you can see from above, services within the Streets division funded from the Stormwater Fund are integrated into the overall operation of the City's Streets Department. Most of the employees funded through the Stormwater Fund function like other Streets Department crews (Landscaping, Street Repair) and report to the Assistant Director.

The authorized personnel counts for the last five fiscal years of the Stormwater Fund, Streets Division are shown on Exhibit 4:



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 4: Streets Division Authorized Staffing, FY 2015-2019

Position	Pay Grade	FY 2015		FY 2016		FY 2017		FY 2018		FY 2019	
		F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T
Stormwater - Streets											
Stormwater Inspector	Grade F	2	0	2	0	3	0	3	0	3	0
Stormwater Supervisor	Grade F	1	0	1	0	1	0	1	0	1	0
Crew Chief	Grade E	2	0	2	0	2	0	2	0	2	0
Equipment Operator	Grade D	8	0	8	0	8	0	8	0	9	0
Crew Worker	Grade B	1	0	1	0	1	0	1	0	1	0
Totals		14	0	14	0	15	0	15	0	16	0

Exhibit 5: Stormwater-Streets Division Budget

	Actual 2016	Actual 2017	Budget 2018	Estd 2018	Budget 2019	Difference	
						\$	%
Personnel							
Salaries & Wages	600,545	664,191	698,797	750,918	771,802	73,005	10.4%
Employee Benefits	295,606	345,034	410,345	449,569	403,212	(7,133)	-1.7%
Total Personnel	896,151	1,009,225	1,109,142	1,200,487	1,175,013	65,871	5.9%
Operations							
Transportation Services	327	94	300	199	320	20	6.7%
Operating Services	413	658	795	1,795	1,795	1,000	125.8%
Notices, Subscriptions, etc.	1,681	110	1,050	1,050	1,050	-	0.0%
Utilities	53,214	37,301	57,000	45,000	45,735	(11,265)	-19.8%
Contractual Services	-	(96,298)	15,000	1,400	15,000	-	0.0%
Repair & Maintenance Services	77,283	139,442	114,500	125,300	139,300	24,800	21.7%
Employee programs	1,960	4,464	4,970	5,100	3,500	(1,470)	-29.6%
Professional Development/Travel	3,120	668	14,850	15,010	11,160	(3,690)	-24.8%
Office Supplies	972	1,425	920	925	925	5	0.5%
Operating Supplies	12,307	16,844	15,325	13,925	14,525	(800)	-5.2%
Fuel & Mileage	27,770	37,028	40,000	40,000	46,800	6,800	17.0%
Machinery & Equipment (<\$182,000)	49,472	15,720	23,450	22,950	17,050	(6,400)	-27.3%
Repair & Maintenance Supplies	84,981	67,533	123,650	115,242	99,300	(24,350)	-19.7%
Operational Units	181,976	189,676	196,569	196,569	261,197	64,628	32.9%
Property & Liability Costs	24,764	41,337	19,602	23,697	25,483	5,880	30.0%
Rentals	1,961	-	1,200	1,200	1,300	100	8.3%
Permits	500	-	1,000	1,000	1,000	-	0.0%
Financial Fees	5,735	4,270	9,000	9,000	9,180	180	2.0%
Debt Service and Lease Payments	144,828	145,966	144,828	72,414	-	(144,828)	-100.0%
Total Operations	673,264	606,238	784,009	691,776	694,620	(89,390)	-11.4%
Capital	210,138	285,464	-	-	331,000	331,000	
Total Stormwater - Streets	1,779,552	1,900,927	1,893,151	1,892,263	2,200,633	307,482	16.2%



City of Franklin, Tennessee

Stormwater Fund Review

Engineering

The City of Franklin is granted authorization to discharge Stormwater through its Stormwater infrastructure and into receiving water bodies through a NPDES permit issued by the EPA and administered through TDEC. A condition of this permit coverage is that six minimum control measures are met by the end of the permit cycle. The City is required annually to submit an “annual report,” which is essentially a report to document the progress the City is making towards meeting its current permit requirements. Current minimum control measures are:

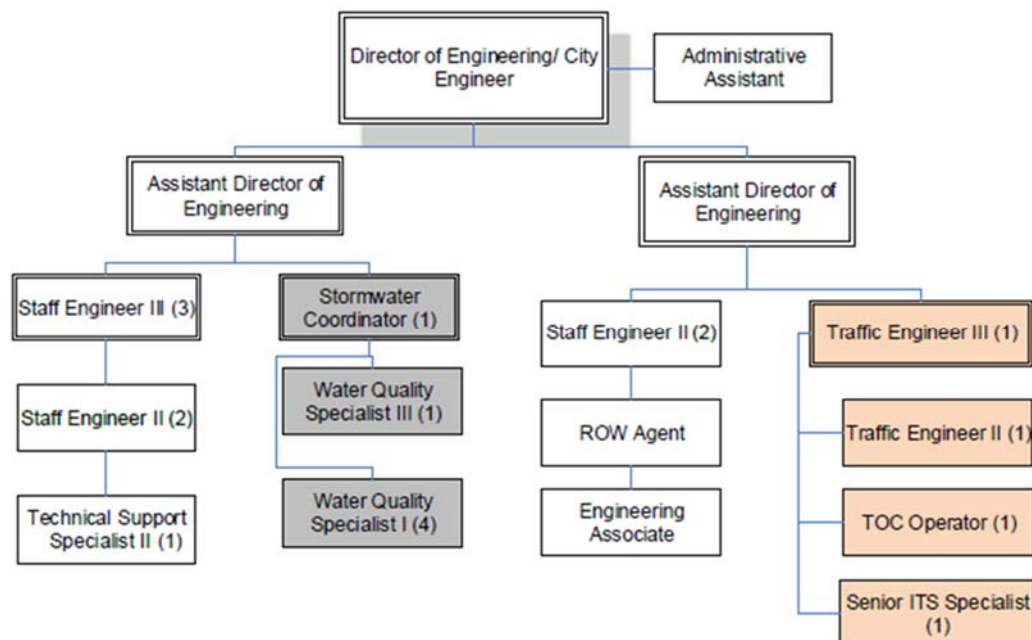
- 1) Public Education and Outreach
- 2) Public Involvement and Participation
- 3) Illicit Discharge Detection and Elimination
- 4) Construction Site Stormwater Runoff Control
- 5) Permanent Stormwater Management in Development and Redevelopment
- 6) Pollution Prevention for Municipal Operations

In addition to the above minimum control measures, the City is required to do annual ambient monitoring which includes:

- 1) Macroinvertebrate Sampling
- 2) E.Coli Sampling
- 3) Visual Stream Assessments

The Stormwater-Engineering division consists of 6 employees: one coordinator and 5 water quality specialists.

Exhibit 6: Engineering Division Organizational Chart *(shaded in gray)*





City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 7: Engineering Division Authorized Staffing, FY 2015-2019

Position	Pay Grade	FY 2015		FY 2016		FY 2017		FY 2018		FY 2019	
		F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T
Stormwater - Engineering											
Stormwater Man. Coordinato	Grade I	1	0	1	0	1	0	1	0	1	0
Water Quality Specialist III	Grade H	0	0	0	0	0	0	1	0	1	0
Water Quality Specialist II	Grade G	1	0	3	0	3	0	2	0	0	0
Water Quality Specialist I	Grade F	2	0	1	0	1	0	2	0	4	0
Totals		4	0	5	0	5	0	6	0	6	0

The Engineering budget contains annual allotments for capital projects which are charged against the Stormwater fund. The budget is often larger than the actual expenditure as projects which are anticipated to be completed within a budget year often are pushed to another.

Exhibit 8: Stormwater-Engineering Division Budget

	Actual 2016	Actual 2017	Budget 2018	Estd 2018	Budget 2019	Difference	
						\$	%
Personnel							
Salaries & Wages	218,670	263,778	339,999	359,320	369,734	29,735	8.7%
Employee Benefits	62,628	72,210	103,203	109,428	123,782	20,579	19.9%
Total Personnel	281,298	335,988	443,202	468,748	493,516	50,314	11.4%
Operations							
Transportation Services	798	894	840	650	682	(158)	-18.8%
Operating Services	211	237	1,332	1,000	1,000	(332)	-24.9%
Notices, Subscriptions, etc.	5,996	14,064	13,190	12,190	12,250	(940)	-7.1%
Utilities	3,106	4,459	4,978	4,350	5,040	62	1.2%
Contractual Services	137,067	295,628	153,104	153,400	153,560	456	0.3%
Repair & Maintenance Services	9,681	3,955	11,735	5,325	3,551	(8,184)	-69.7%
Employee programs	86	38	289	289	303	14	4.8%
Professional Development/Travel	7,967	5,882	11,500	11,500	12,000	500	4.3%
Office Supplies	862	329	584	850	985	401	68.7%
Operating Supplies	1,207	543	4,015	4,215	3,000	(1,015)	-25.3%
Fuel & Mileage	846	1,533	1,733	1,354	1,422	(311)	-17.9%
Machinery & Equipment (<\$121,0	10,518	5,048	18,723	13,020	8,000	(10,723)	-57.3%
Property & Liability Costs	-	15,388	16,159	11,958	12,554	(3,606)	-22.3%
Repair & Maintenance Supplies	450	228	3,870	2,000	1,000	(2,870)	-74.2%
Permits	3,460	10,210	10,721	3,510	3,513	(7,208)	-67.2%
Transfers to Other Funds		50,000				-	0.0%
Financial Fees				100	105	105	100.0%
Debt Service	25,537	4,860	25,538	-	-	(25,538)	-100.0%
Total Operations	207,792	413,296	278,311	225,711	218,965	(59,347)	-21.3%
Capital	187,539	126,016	3,605,000	500,000	3,175,000	(430,000)	-11.9%
Total Stormwater-Engineering	676,629	875,300	4,326,513	1,194,459	3,887,481	(439,032)	-10.1%



City of Franklin, Tennessee

Stormwater Fund Review

Summary

As the preceding pages show, the Stormwater Fund provides for the revenues and employees necessary to discharge the City's responsibilities under the MS4 permit – maintenance the City's storm drains and drainage systems, public education about impervious surfaces and storm drainage and sampling of local waterways to ensure quality discharge back into the streams and rivers which pass through Franklin.

Financially, the City now takes in about as much in revenues (\$2.4-\$2.7 million annually) as it spends on maintaining operations for the 22 personnel, consulting and equipment maintenance charged against the fund (\$2.6 million).

Section III will analyze how other cities in the region and the nation provide for stormwater services.



Section III:

Tennessee & Comparable Cities



Section III: Tennessee & Comparable Cities

Now that the existing service has been defined, the next step is to compare it to other municipalities which operate a Stormwater Fund. Finance Department staff researched 14 cities in the state and beyond on four questions:

- Research what other cities in Tennessee have Stormwater Utilities/Funds
- Research which of our peer cities have Stormwater Utilities/Funds
- Determine what their fees are, what they are based off of and when they were last updated
- Determine if the funds are used for Operations only or for Operations and Capital

Staff researched 14 Tennessee and comparable communities including:

- | | |
|--------------------|------------------|
| - Brentwood, TN | - Cary, NC |
| - Chattanooga, TN | - Eagan, MN |
| - Gallatin, TN | - Germantown, TN |
| - Johnson City, TN | - Kirkland, WA |
| - Kingsport, TN | - LaVergne, TN |
| - Lenexa, KS | - Maryville, TN |
| - Murfreesboro, TN | - Nashville, TN |
| - Redmond, WA | |

These cities were chosen because either they are a) neighboring cities, b) cities which Franklin often benchmarks itself against or c) cities that have established Stormwater utilities. The breakouts of certain cities on the following pages provide greater detail into how municipalities within Tennessee and outside structure their funds. At the end of the section, a summary table is provided detailing all cities information.

Cities within Tennessee

City of Brentwood, TN

Brentwood does not have a Stormwater fee or dedicated fund. For 2019 they budget \$50k for both Stormwater operating and capital activities, totaling \$100k. This is funded through the General Fund.

City of Gallatin, TN

Gallatin just began collecting a Stormwater fee this fiscal year, FY 2019 (July 2018). It is based on ERU's of three sizes – less than 2,114 sq. ft., 2,115-6,560 sq.ft. and larger than 6,561 sq. ft. It is billed monthly.



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 9: Gallatin, TN Stormwater Fee Calculation

STORMWATER	
Residential (impervious)	Monthly Fee
< 2,114 sq ft	\$3
2,115 - 6,560 sq ft	\$5
> 6,561 sq ft	\$9
Non-Residential	
Per ERU - 3,650 sq ft	\$5

Since the fee was just established this past July, there is no budget information for Fiscal 2018.⁵

City of Germantown, TN

Germantown also has a Stormwater fee and bills monthly. The fee is determined through the use of ERU's of sizes much larger than what Franklin uses. Germantown, however uses parcel size versus amount of imperviousness per parcel. It is detailed below:

Exhibit 10: Germantown, TN Stormwater Fee Calculation

Residential Stormwater Rates

Rates per Single Family Residential (SFR) parcel Annual Fee

ERU parcels less than 0 to 10,000 sq. ft. \$3.00/month (\$36/yr.)

ERU parcels between 10,001 – 22,000 sq. ft. \$3.25/month (\$39/yr.)

ERU parcels greater than 22,000 sq. ft. \$3.50/month (\$42/yr.)

Other Developed Property Stormwater Rates

User Fee Determination

The City will use a gross property area and intensity of development methodology to assess stormwater user fees to property owners. The fee will be based on the amount of runoff each property contributes to the City's stormwater runoff as determined by an average runoff coefficient for that property. The City Administrator or his/her designee is authorized to develop policies and procedures in accordance with this ordinance for the implementation and calculation of stormwater user fees. Runoff Coefficients shall be as follows:

LAND USE	RUNOFF COEFFICIENT
Residential	0.4
Other Developed Property	0.9
Parkland/Cemetery/Golf Course/Agricultural	0.25
Vacant Property	0.2

The monthly stormwater user fee for Other Developed Property, Vacant Property and Parkland/Cemetery/Golf Course - - referred to in this document as Other Property - - will be calculated using a formula which applies a Runoff Coefficient (based on the classification of the real property as set forth below) to the gross area square footage of the parcel and the ERU.

Monthly Stormwater Fee = AOT/AR * ROT/RR * ERU Rate * QF

Where: AOT = Other Developed Property Area (measured in acres)

ROT = Applicable Other Property Runoff Coefficient

AR = Average Residential Property Area (acres) = 0.34 acres

RR = Average Residential Runoff Coefficient (C) = 0.4

ERU Rate = Equivalent Residential Unit = \$3.25/month

QF = Quality Factor = 1.0

⁵ City of Gallatin, TN. "Stormwater Utility Frequently Asked Questions".

www.gallatintn.gov/DocumentCenter/View/4008/COG_Stormwater-Fee-Fact-Sheet.



City of Franklin, Tennessee

Stormwater Fund Review

As shown on the previous page, Germantown also employs a runoff coefficient to determine the monthly fee.⁶ The fees are placed into a dedicated Stormwater Fund and are used for both operating and capital activities. For FY 2018, the annual revenues total just under \$1,050,000. Capital contributions for FY18 total \$100,000.

Exhibit 11: Germantown, TN Stormwater Revenue & Expense Budget Summaries

Revenues:⁷

	Actual FY16	Budget FY17	Estimated FY17	% Chg.	Budget FY18
Stormwater Management Fee	\$ 994,425	1,009,964	1,035,000	0.50%	1,040,175
Other Revenue	331	-	-	-	-
Stormwater Permits	9,000	9,000	5,000	50.00%	7,500
OPERATING REVENUES	\$ 1,003,756	1,018,964	1,040,000	0.74%	1,047,675
Investment Income	2,608	1,700	3,200	9.38%	3,500
NONOPERATING REVENUES	\$ 2,608	1,700	3,200	9.38%	3,500

Expenses:⁸

BUDGET CATEGORY SUMMARY

CATEGORY	Actual FY16	Budget FY17	Estimated FY17	Amt. Chg.	% Chg.	Budget FY18
Personnel	\$ 514,965	548,443	548,233	26,813	4.89%	575,046
Communication	2,248	1,800	1,800	1,200	66.67%	3,000
Professional Fees	900	-	-	5,000	100%	5,000
Other Maintenance	24,517	30,000	30,000	(180)	-0.60%	29,820
Supplies	10,280	22,500	22,500	6,600	29.33%	29,100
Allocations	43,149	43,392	34,068	4,499	13.21%	38,567
Roads & Mains	249,232	290,000	290,000	(5,000)	-1.72%	285,000
TOTAL	\$ 878,422	968,967	963,021	41,432	4.30%	1,004,453
Capital Outlay	\$ -	50,000	50,000	54,851	109.70%	100,000

City of Nashville, TN

Nashville's Stormwater fee is more complex than others in Tennessee as it breaks out Residential and Non-Residential properties by impervious square footage area. The residential

⁶ City of Germantown, TN. "FAQ". www.germantown-tn.gov/live/new-advanced-components/vision-cms-components/faq.

⁷ City of Germantown, TN. "Fiscal Year 2019 Budget, July 1, 2018 – June 30, 2019", Page 165. www.germantown-tn.gov/home/showdocument?id=19172.

⁸ *Ibid.*



City of Franklin, Tennessee

Stormwater Fund Review

fee is also divided based upon whether or not the dwelling unit is a single-family residential home or a condominium. Non-Residential properties are divided the same way (Non-Residential vs. Condominium buildings), but there are eight different billing categories for the non-residential Stormwater fee. It is billed monthly and was last updated this year (2018).

Exhibit 12: Nashville, TN Stormwater Fee Schedule⁹

Property Type: Impervious Area (Square Feet)	Fee/month
Less than 400	-
Tier 1 – Residential : 400 – 2,000	1.50
Tier 2 – Residential: 2,001 – 6,000	6.00
Tier 3 – Residential: more than 6,000	11.00
Residential Condo (per unit)	3.00
Less than 400	-
Tier 1 – Non-Residential: 400-6,000	10.00
Tier 2 – Non-Residential: 6,001 – 12,800	30.00
Tier 3 – Non-Residential: 12,801 – 25,600	70.00
Tier 4 – Non-Residential: 25,601 – 51,200	150.00
Tier 5 – Non-Residential: 51,201 – 300,000	300.00
Tier 6 – Non-Residential: 300,001 – 1,000,000	650.00
Tier 7 – Non-Residential: more than 1,000,000	1,300.00
Non-Residential Condo (per unit)	10.00

Additionally, Nashville has a robust fee credit system where fees are reduced for meeting certain criteria outlined in a credit manual.¹⁰

Stormwater fees are placed into a dedicated Stormwater Fund and are used for both operating and capital activities. Operating activities include both the Streets and Engineering divisions similar to Franklin. Total budgeted revenues for FY 2018 total more than \$34,600,000 (Nashville passed a significant rate increase in 2018). Capital contributions for FY 2018 total just under \$7,300,000.

⁹ City of Nashville, TN. “Stormwater Program FAQ”.

www.nashville.gov/Portals/0/SiteContent/WaterServices/Stormwater/docs/FeeRestructure/Stormwater%20Program%20FAQ%20v2018.1.11.pdf.

¹⁰ Metro Water Services. “Stormwater User Fee Credit Manual”, City of Nashville, TN. February, 2016.

www.nashville.gov/Portals/0/SiteContent/WaterServices/Stormwater/docs/SWMM/2016/StormwaterUserFeeCreditManual_2016.pdf.



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 12: Nashville, TN Stormwater Funds Budget Summary¹¹

Stormwater Funds						
	FY2016 Budget	FY2016 Actuals	FY2017 Budget	FY2018 Budget	FY17-FY18 Difference	FY17-FY18 % Change
OPERATING EXPENSES:						
PERSONAL SERVICES	7,472,500	6,234,818	7,471,400	8,064,100	592,700	7.93%
OTHER SERVICES:						
Utilities	109,200	42,256	100,800	101,800	1,000	0.99%
Professional & Purchased Services	1,475,700	1,315,353	1,844,000	3,019,800	1,175,800	63.76%
Travel, Tuition, and Dues	26,400	27,038	28,200	35,900	7,700	27.30%
Communications	217,800	147,428	228,800	217,600	(11,200)	-4.90%
Repairs & Maintenance Services	1,171,200	1,619,998	2,296,600	3,814,800	1,518,200	66.11%
Internal Service Fees	633,300	599,700	503,000	530,900	27,900	5.55%
Other Expenses	393,300	575,450	460,800	11,549,500	11,088,700	2406.40%
TOTAL OTHER SERVICES	4,026,900	4,327,223	5,462,200	19,270,300	13,808,100	252.79%
TOTAL OPERATING EXPENSES	11,499,400	10,562,041	12,933,600	27,334,400	14,400,800	111.34%
TRANSFERS TO OTHER FUNDS/UNITS	2,943,800	3,262,442	5,509,600	7,287,800	1,778,200	32.27%
TOTAL EXPENSES & TRANSFERS	14,443,200	13,824,483	18,443,200	34,622,200	16,179,000	87.72%
PROGRAM REVENUE:						
Charges, Commissions, & Fees	14,443,200	14,537,080	14,443,200	34,622,200	20,179,000	139.71%
Federal (Direct & Pass Through)	0	0	0	0	0	0.00%
State Direct	0	0	0	0	0	0.00%
Other Government Agencies	0	0	0	0	0	0.00%
Other Program Revenue	0	0	0	0	0	0.00%
TOTAL PROGRAM REVENUE	14,443,200	14,537,080	14,443,200	34,622,200	20,179,000	139.71%
NON-PROGRAM REVENUE:						
Property Taxes	0	0	0	0	0	0.00%
Local Option Sales Tax	0	0	0	0	0	0.00%
Other Tax, Licenses, & Permits	0	0	0	0	0	0.00%
Fines, Forfeits, & Penalties	0	0	0	0	0	0.00%
Compensation From Property	0	0	0	0	0	0.00%
TOTAL NON-PROGRAM REVENUE	0	0	0	0	0	0.00%
TRANSFERS FROM OTHER FUNDS/UNITS	0	0	0	0	0	0.00%
TOTAL REVENUE & TRANSFERS	14,443,200	14,537,080	14,443,200	34,622,200	20,179,000	139.71%

¹¹ Barry, Megan. "Recommended Operating Budget for Fiscal Year 2017-2018". City of Nashville, TN. May 2017, Page J-65-8.

www.nashville.gov/Portals/0/SiteContent/Finance/docs/OMB/citizens_budget/budgetbook/FY2018%20Operating%20Budget%20Book.pdf.



City of Franklin, Tennessee

Stormwater Fund Review

Cities outside Tennessee

City of Cary, NC

The City of Cary, North Carolina is one of the City of Franklin's most used comparable cities. However, Cary does not operate a Stormwater utility and is not applicable to the study.

City of Eagan, MN

The City of Eagan, Minnesota is a suburb of the Twin Cities similar to Franklin in size (66,000 est. pop.) and distance from the Metro area (18.4 miles) as Franklin, applies a Stormwater fee quarterly according to the following table:

Exhibit 13: Eagan, MN Stormwater Fee Calculation (as of 2018)¹²

STORMWATER		
	Monthly Fee p/ERU	ERU Factor
R1 (SFR) & R2 (Duplex)	\$5.68	1.0
R3 (Townhomes)	\$3.52	0.8 p/unit
R4 (Multi-Family)	\$7.97	Calculation based on impervious to acre ratio
Commercial	\$6.74	
Public	\$7.76	

**Note: this table has been converted from quarterly to monthly.*

Stormwater fees are used for both operating and capital activities. The annual revenues for FY 2018 are forecast to be just under \$2,600,000 – almost identical to Franklin. Capital contributions for FY18 total \$143,000.

Exhibit 14: Eagan, MN Stormwater Fund Revenues¹³

	Actual 2015	Actual 2016	Budget 2017	Budget 2018	Budget 2019
Storm Drainage/Water Quality					
4540 Storm Drainage Service Fees	1,562,052	2,393,291	2,486,500	2,530,000	2,570,000
4541 Storm Drainage Penalties	6,236	7,609	4,500	5,000	5,000
4226 Developer Escrow Reimbursmt	26,529	29,815	30,000	30,000	30,000
4672 Water Quality Dedication Fees	-	19,816	10,000	-	-
	1,594,817	2,450,531	2,531,000	2,565,000	2,605,000

¹² City of Eagan, MN. "2018 Fee Schedule". 19 December 2017. Page 12.

www.cityofeagan.com/images/Finance/2018/2018%20fee%20schedule.pdf.

¹³ City of Eagan, MN. "2018-2019 Adopted Budget". 1 January 2018. Page 166.

www.cityofeagan.com/images/Finance/2019/2018-19%20Budget.pdf.



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 15: Eagan, MN Stormwater Fund Expenses¹⁴

Acct	PERSONAL SERVICES	Actual 2015	Actual 2016	Budget 2017	Budget 2018	Budget 2019
6110	SALARIES AND WAGES-REGULAR	\$ 69,233	\$ 83,761	\$ 68,000	\$ 73,100	\$ 77,300
6112	OVERTIME-REGULAR	1,034	1,514	5,700	7,300	7,300
6130	SALARIES AND WAGES-TEMPORARY	13,225	6,589	13,300	13,900	13,900
6142	PERA-COORDINATED	5,222	6,520	5,500	6,000	6,300
6144	FICA	6,092	6,839	6,700	7,200	7,500
6151	HEALTH INSURANCE	11,717	15,349	10,200	11,100	12,000
6152	LIFE	110	112	-	-	-
6154	DISABILITY - LONG TERM	203	262	-	-	-
6155	WORKERS COMPENSATION	3,058	3,619	6,300	6,800	7,100
	TOTAL PERSONAL SERVICES	109,894	124,565	115,700	125,400	131,400
	PARTS & SUPPLIES					
6210	OFFICE SUPPLIES	60	-	-	-	-
6224	CLOTHING/PERSONAL EQUIPMENT	604	444	700	700	700
6230	REPAIR/MTN SUPPLIES-GENERAL	17	206	300	300	300
6232	SMALL EQUIPMENT REPAIR PARTS	-	91	-	200	200
6233	BUILDING REPAIR SUPPLIES	17	-	-	-	-
6235	FUEL, LUBRICANTS, ADDITIVES	6	4	400	400	400
6240	SMALL TOOLS	100	720	500	500	500
6255	STREET REPAIR SUPPLIES	-	561	1,000	1,000	1,000
6260	UTILITY SYSTEM PARTS/SUPPLIES	2,455	8,417	9,000	9,000	9,000
	TOTAL PARTS & SUPPLIES	3,259	10,443	11,900	12,100	12,100
	SERVICES & OTHER CHARGES					
6310	PROFESSIONAL SERVICES-GENERAL	3,018	303	120,000	58,000	46,000
6311	LEGAL	333	1,602	-	-	-
6385	INSURANCE	3,900	3,900	3,900	3,900	3,900
6408	ELECTRICITY-LIFT STATIONS	113,862	162,220	134,500	137,500	139,300
6429	STREET REPAIR-LABOR	-	860	-	-	-
6432	UTILITY SYSTEM REPAIR - LABOR	37,207	54,402	50,000	120,000	120,000
6457	MACHINERY AND EQUIPMENT	342	2,019	1,000	1,000	1,000
6476	CONFERENCES AND SCHOOLS	340	-	400	400	400
6480	LICENSES, PERMITS AND TAXES	-	176	-	100	100
6805	TRANSFER OUT	23,700	29,282	25,400	25,400	25,400
6539	WASTE REMOVAL/SANITATION SERVICE	-	-	500	500	500
6569	MAINTENANCE CONTRACTS	411	-	-	-	-
	OTHER SERVICES AND CHARGES	183,113	254,764	335,700	346,800	336,600
	TOTAL OPERATING	296,266	389,772	463,300	484,300	480,100
					4.5%	-0.9%
	CAPITAL CONSTRUCTION/PROJECTS					
6630	RENEWAL AND REPLACEMENT - OUTLAY	136,228	21,040	611,000	152,000	143,000
	TOTAL CAPITAL	136,228	21,040	611,000	152,000	143,000
					-75.1%	-5.9%
	TOTAL STORM DRAINAGE DEPARTMENT	\$ 432,494	\$ 410,812	\$ 1,074,300	\$ 636,300	\$ 623,100
					-40.8%	-2.1%
	DEPRECIATION					
6488	DEPRECIATION EXPENSE	\$ 1,034,157	\$ 1,040,627	\$ 1,041,600	\$ 1,041,600	\$ 1,041,600

¹⁴ Ibid. Page 187.



City of Franklin, Tennessee

Stormwater Fund Review

City of Kirkland, WA

The City of Kirkland, Washington is another suburb similar to Franklin with an estimated population of 88,630 (2017 census estimate) and distance to metro Seattle (11 miles). They have a Stormwater fee which is billed monthly and applied according to the following table:

Exhibit 16: Kirkland, WA Stormwater Fee Calculation¹⁵

STORMWATER			
	Fee p/ERU	Utility Tax	Total Monthly
Residential - Single Family	\$17.55	\$1.32	\$18.87
Commercial & Multi-Family*	\$17.55	\$1.32	\$18.87
*ERU = 2,600 sq ft impervious			

Sample Calculation

An apartment complex has 10,000 ft² of impervious surface (parking lots, walkways, rooftops, etc.), so the surface water fee would be:

$10,000 \text{ ft}^2 / 2600 \text{ ft}^2 = 3.85 \text{ ESU}$

$3.85 \text{ ESU} \times \$17.55 \text{ per month per ESU} = \$67.57 \text{ per month plus } 7.5\% \text{ utility tax} = \$871.65/\text{year}$

Stormwater fees are used for both operating and capital activities. Operating activities include both the Street/Storm Maintenance and Engineering divisions. Capital contributions for FY19 total more than \$5,100,000.

Exhibit 17: Kirkland, WA Stormwater Budget Summary¹⁶

FINANCIAL SUMMARY BY OBJECT					
	2013-2014 Actual	2015-2016 Estimate	2015-2016 Budget	2017-2018 Budget	Percent Change
Salaries and Wages	3,169,737	4,000,276	4,793,868	5,295,397	10.46%
Benefits	1,408,781	1,952,138	2,650,163	2,585,116	-2.45%
Supplies	398,338	489,543	623,802	626,301	0.40%
Other Services	4,301,105	5,120,986	5,320,244	5,430,696	2.08%
Government Services	8,297,433	7,445,553	7,363,849	7,640,435	3.76%
Capital Outlay	77,909	33,017	33,000	89,735	171.92%
Reserves*	3,352,761	4,139,412	4,139,412	5,444,832	31.54%
TOTAL	21,006,064	23,180,925	24,924,338	27,112,512	8.78%
FINANCIAL SUMMARY BY DIVISION					
	2013-2014 Actual	2015-2016 Estimate	2015-2016 Budget	2017-2018 Budget	Percent Change
Customer Service	3,071,094	3,675,483	3,828,845	3,573,390	-6.67%
Administration	8,762,498	11,514,124	11,672,779	13,818,149	18.38%
Capital Construction	6,422,454	4,760,118	4,880,926	5,130,889	5.12%
Operations and Maint.	2,750,018	3,231,200	4,541,788	4,590,084	1.06%
TOTAL	21,006,064	23,180,925	24,924,338	27,112,512	8.78%
POSITION SUMMARY BY DIVISION					
	2013-2014 Actual	Adjustments	2015-2016 Budget	Adjustments	2017-2018 Budget
Customer Service	7.75	1.00	8.75	0.00	8.75
Administration	1.64	1.16	2.80	0.00	2.80
Operations and Maint.	18.30	4.10	22.40	2.75	25.15
TOTAL	27.69	6.26	33.95	2.75	36.70

¹⁵ City of Kirkland, WA. "Stormwater Utility Rate".

www.kirklandwa.gov/depart/Public_Works/Utilities/Storm_Surface_Water/About_the_Stormwater_Utility/Stormwater_UTILITY_Rate.htm.

¹⁶ City of Kirkland, WA "2017-2018 City of Kirkland, Washington Budget." Page 388.

www.kirklandwa.gov/Assets/Finance+Admin/2017-2018+Budget/2017-2018+Budget+Document.pdf.



City of Franklin, Tennessee

Stormwater Fund Review

City of Lenexa, KS

Lenexa, Kansas is an established suburb of Kansas City with an estimated population of 52,903 as of 2016 and distance of 16.0 miles to downtown Kansas City, MO. The Stormwater Fee is billed monthly and is among the simpler surveyed, with the exception that in addition to a residential and a commercial fee, there is also a development based Stormwater Fee. These are detailed below:

Exhibit 18: Lenexa, KS Stormwater Fee Schedules:¹⁷

STORMWATER	
	Monthly Fee p/ERU
Residential - Single Family	\$9.08
Commercial & Multi-Family*	\$9.08
*ERU = 2,750 sq ft impervious	

STORMWATER Development / Permitting	
	Fee p/ERU
Flat capital charge	\$1,086
Variable capital charge	3% total permitted project cost

The fees are used for both operating and capital activities, but the capital charges applied at permitting of new development are dispersed to the general fund. Stormwater fee revenues for FY 2018 total \$6.2 million. Capital contributions for FY18 total \$2.5 million.

Exhibit 19: Lenexa, KS Budget Summary¹⁸

Expenditure Information					
Expenditure Category	FY 2015 Actual	FY 2016 Actual	FY 2017 Original Budget	FY 2017 Revised Budget	FY 2018 Budget
Personal Services	\$1,285,664	\$1,277,182	\$1,472,798	\$1,472,798	\$1,636,175
Contractual Services	89,715	101,931	167,995	167,995	172,195
Commodities	52,170	64,889	132,870	132,870	133,180
Capital Outlay	183,307	213,760	0	214,483	75,000
Debt Service	3,822,306	3,864,769	4,111,014	3,825,113	4,078,915
Transfers	662,717	1,160,336	400,000	600,000	1,300,000
Reserves	0	0	1,033,001	0	827,016
Total	\$6,095,879	\$6,682,867	\$7,317,678	\$6,413,259	\$8,222,481

¹⁷ Finance Department. "Schedule of Fees As of September 1, 2018." City of Lenexa, KS. 1 September 2018. Page 50. www.lenexa.com/UserFiles/Servers/Server_4323159/File/Government/Departments/Finance/Schedule_of_Fees.pdf.

¹⁸ City of Lenexa, KS. "2018 Annual Budget Document". Page 132. www.lenexa.com/UserFiles/Servers/Server_4323159/File/Government/Departments/Finance/Budget/2018LenexaBudget.pdf.



City of Franklin, Tennessee

Stormwater Fund Review

City of Redmond, WA

The City of Redmond, Washington is similar to Kirkland but has the most complex fee and credit system surveyed. The monthly fee was last amended in 2018 and is applied according to the following exhibits:

Exhibit 20: Redmond, WA Stormwater Fee Calculations & Credit Structure¹⁹

Base Rate

The current base rate of \$16.56/impervious unit was initiated at the beginning of 2007. The minimum charge for any developed parcel is the base rate of \$16.56

Impervious Units

1 impervious unit = 2000 square feet of impervious area
Impervious units are truncated to the nearest tenth.
If, for example, a site had 33,000 square feet of roof and pavement area the impervious unit calculation would be: $33,000/2000 = 16.5$ impervious units.

Rate Adjustments

The rate adjustment increases or decreases the stormwater bill for a property to account for two factors that impact the quantity and quality of stormwater leaving a site: the Impervious Coverage Factor and Stormwater Credits.

Impervious Coverage – The percentage of land covered by impervious surfaces is called the “coverage”. If, for example, a 50,000 square foot site had 33,000 square feet of roof and pavement area, the site coverage would be $33,000/55,000 = 66\%$ and the rate adjustment (see table below) would be 1.40. The coverage factor adjustment accounts for the principal that the same square footage of impervious area from a small site has more impact than it does from a larger site and that systems serving higher density areas are more costly to maintain, repair, and replace.

For Impermeable Coverage Over	Rate Adjustment Is
30%	+1.10
40%	+1.20
50%	+1.30
60%	+1.40
70%	+1.50
80%	+1.60
90%	+1.70

Areas that drain to onsite infiltration systems receive a coverage factor of 1.0. If only a portion of a site drains to an infiltration system, the site receives a prorated coverage factor.

Stormwater Credits – Sites that have privately owned and maintained stormwater systems may qualify for stormwater credits. This is to account for the idea that these systems reduce the burden on the public stormwater system by reducing or slowing down the amount of water and/or removing pollutants from the water before it leaves the site. Credits are prorated for sites with multiple systems and for systems that only serve a portion of the site. There are two general types of credits: Flow Control and Water Quality.

¹⁹ City of Redmond, WA. “General Information on Redmond’s Stormwater Utility and Stormwater Billing” December 2016. <http://www.redmond.gov/common/pages/UserFile.aspx?fileId=197593>.



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 20: Redmond, WA (continued)

Flow Control Credits: These credits are given to systems that reduce or slow the volume of stormwater leaving the site. Types of systems that qualify for flow control credit include:

- On-site detention: ponds, vaults, or tanks that hold stormwater during rain events and slowly release it from the site;
- Direct discharge: piped systems that directly connect to Lake Sammamish or the Sammamish River;
- Infiltration: ponds, pipes, dry wells or other systems that infiltrate stormwater into the ground

The city offers 4 levels of flow control credits. Flow control credits are relative and proportionate to the ability of the system to control higher volumes of runoff. (See table below)

	Description	Examples	Discount
High Performance	Designed systems that prevent the majority of runoff from leaving the site.	Rainwater Harvesting and Reuse Full Infiltration or dispersion LID Performance Standard + Flow Control	-0.40
Full Control	Designed systems that control the majority of runoff from the site.	Detention (2001 Standard) Private Direct Discharge Infiltration (91% annual runoff volume)	-0.20
Partial Control	Designed systems that partially control the runoff from the site.	Detention (1992 Standard) Rainwater Harvesting (State Definition)	-0.10
Other Controls	Designed systems that reduce or control runoff in some manner but do not meet the criteria above. Typically older systems.	Other designed flow control Other designed infiltration LID Performance Standard	-0.05

Water Quality Credits: These credits are given to systems that remove pollution such as sediment, metals, and other chemicals from stormwater. Credit is also given to systems that infiltrate or reuse runoff from surfaces that do not require water quality treatment. Greater credit is given to systems that provide a higher level of water quality treatment.

Types of systems include bioswales, wet ponds and vaults, bioretention, rain gardens, Filterra units, and oil water separators. A credit is issued based on the level of treatment the system was designed to provide. The city offers 4 levels of water quality credits (See table below)

	Description	Examples	Discount
Advanced	Designed system that separates runoff from non pollution generating surfaces.	Infiltration of non pollution generating surfaces Rainwater Harvesting and Reuse	-0.20
Enhanced	Designed system that removes sediment, metals, and/or phosphorus to current ecology standard.	Enhanced Treatment	-0.15
Basic	Designed system that removes sediment to current ecology standard.	Basic Treatment	-0.10
Other	Designed systems that improve or monitor water quality in some manner but do not meet the criteria above.	State or City Required Monitoring Oil/Water Separator Other designed water quality	-0.05



City of Franklin, Tennessee

Stormwater Fund Review

Summary

Compared to the referenced cities with dedicated Stormwater fees and funds, Franklin appears to be on the low-end of both fees and complexity. Simplicity is not a negative, however if operational and capital demands are outpacing fund revenues, an increased fee structure could be warranted. The following exhibit is an attempt to consolidate the information collected and demonstrate the various fee structures researched:

Exhibit 21: Consolidated Stormwater Fee Schedule & Structures

City	Population	ERU	Type	Tiers	Monthly Rate	Tier Description
Franklin, TN	70,908	3,650	Residential	2	2.74	< 3,350 sq ft (impervious)
					4.38	> 3,350 sq ft (impervious)
			Non-Residential	1	3.65	p / ERU = 3,350 sq ft
Gallatin, TN	35,734	3,650	Residential	3	3.00	< 2,114 sq ft (impervious)
					5.00	2,115 - 6,560 sq ft (impervious)
					9.00	> 6,561 sq ft (impervious)
Nashville, TN	691,243	N/A	Non-Residential	1	5.00	p / ERU = 3,650 sq ft
			Residential	5	-	< 400 (impervious)
					1.50	400-2,000 (impervious)
					6.00	2001-6,000 (impervious)
					11.00	> 6,000 (impervious)
					3.00	p / unit
			Non-Residential	9	-	< 400 (impervious)
					10.00	400-6,000 (impervious)
					30.00	6,001-12,800 (impervious)
					70.00	12,801-25,600 (impervious)
					150.00	25,601-51,200 (impervious)
					300.00	51,201-300,000 (impervious)
					650.00	300,001-1,000,000 (impervious)
					1,300.00	> 1,000,000 (impervious)
					10.00	p / unit
Murfreesboro, TN	131,947	3,470	Residential	1	3.25	All
			Non-Residential	1	3.25	p / ERU = 3,470 sq ft (impervious)
			Residential	1	3.50	All
La Vergne, TN	35,717	3,181	Non-Residential	1	3.50	p / ERU = 3,181 sq ft (impervious)
			Residential	3	3.00	Parcel = < 10k sq ft
					3.25	Parcel = 10-22k sq ft
Germantown, TN	39,141	N/A			3.50	Parcel = > 22k sq ft
			Non-Residential	1	3.25	p / ERU (calculation of impervious, land use & runoff coefficient set by engineering dept.)



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 21: Consolidated Stormwater Fee Schedule & Structures (cont.)²⁰

City	Population	ERU	Type	Tiers	Monthly Rate	Tier Description
Chattanooga, TN	177,571	3,200	Residential	1	9.60	p / ERU = 3,200 sq ft (impervious)
			Non-Residential	1	9.60	p / ERU = 3,200 sq ft (impervious)
Maryville, TN	28,765	2,400	Residential	2	3.97	All
					2.38	small residential exemption
			Non-Residential	1	3.97	p / ERU = 2,400 sq ft (impervious)
Johnson City, TN	66,391	3,315	Residential	4	1.51	< 1,691 sq ft (impervious)
					3.00	1,691-5,575 sq ft (impervious)
					5.04	> 5,575 sq ft (impervious)
			Non-Residential	1	2.13	Apartment/Condo p / unit
Kingsport, TN	53,374	3,794	Residential	4	3.00	p / ERU = 3,315 sq ft (impervious)
					3.50	Standard residential
					2.45	Small residential (calculation unknown)
			Non-Residential	1	4.90	Large residential (calculation unknown)
Lenexa, KS	53,553	2,750	Residential	1	2.10	Apartment/Condo p / unit
			Non-Residential	1	3.00	p / ERU = 3,794 sq ft (impervious)
Eagan, MN	66,428	N/A	Residential	1	9.08	p / ERU = 2,750 sq ft (impervious)
			Non-Residential	1	9.08	p / ERU = 2,750 sq ft (impervious)
			Residential	2	3.52	Townhomes (p / unit)
			Non-Residential	3	7.97	Multi-Family (impervious / acre ratio)
Kirkland, WA	87,701	2,600	Residential	1	6.74	Commercial (impervious / acre ratio)
			Non-Residential	1	7.76	Public (impervious / acre ratio)
Kirkland, WA	87,701	2,600	Residential	1	17.55	p / ERU = 2,600 sq ft (impervious)
			Non-Residential	1	17.55	p / ERU = 2,600 sq ft (impervious) -- commercial & multi-family

For single-family residences (SFR), Franklin applies a small (\$2.74) or large (\$4.38) lot fee based on a flat mark of 3,350 sq. ft. impervious surface. Thus, SFR's with large amounts of impervious area are charged the same fee as SFR's with 3,351 sq. ft. Large houses and driveways are common factors that increase impervious surface substantially. Compared to other cities within the Tennessee, Franklin's fees are within range. Outside the state, fees trend higher depending on the region. It is common for other cities to have a multi-tiered fee schedule based on impervious surface area, consistent to Franklin's current approach.

For commercial property, Franklin's ERU factor of 3,350 sq. ft. is on the high end of this analysis. Cities in other states tend to hover between the 2,500-3,000-sq. ft., while Tennessee

²⁰ Information on the following Tennessee cities not otherwise detailed in this section can be found here:

Chattanooga: www.chattanooga.gov/public-works/water-quality-program/wq-fees-incentives.

Johnson City: www.johnsoncitytn.com/publicworks/stormwater/userfees/.

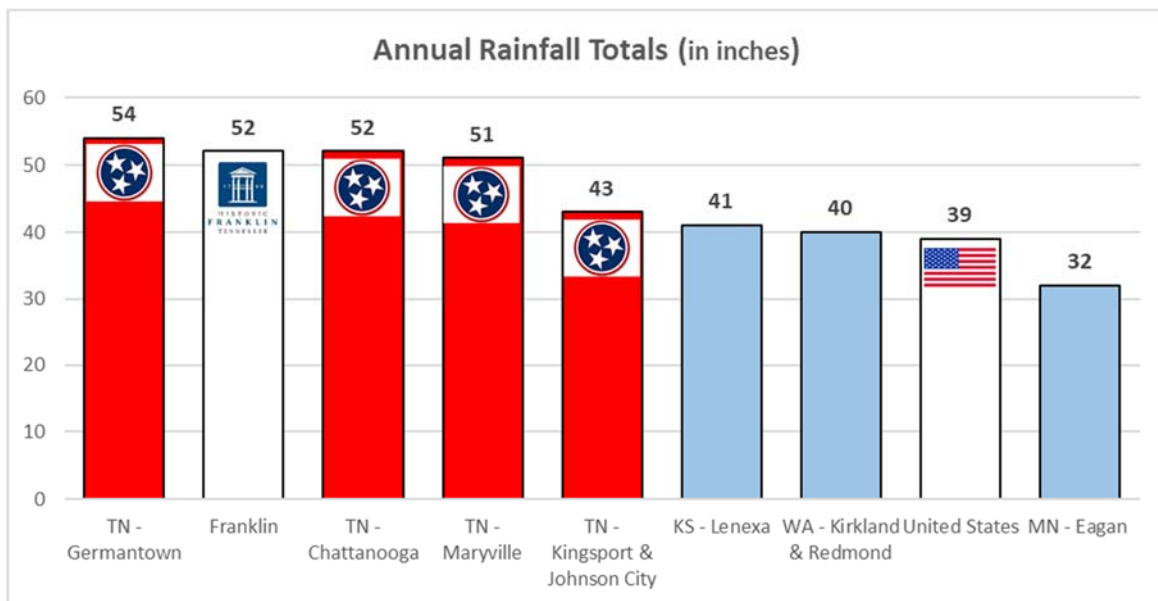
Kingsport: www.kingsporttn.gov/water-services/stormwater/.

Maryville: www.maryvillegov.com/storm-water-management.html#stormwaterrates.

jurisdictions trend between 3,000-3,300-sq. ft. Additionally, compared to other cities, Franklin's fee of \$3.65 p/ERU is on the low-end of this analysis.

Finally, Rainfall and climate is a factor to consider when comparing fees across different states. Areas with higher rainfall and wetter climates will naturally demand more surface water capital infrastructure and operational activities. While the other regions (upper Midwest, Pacific Northwest) have extended and consistent rain and /or snowfall patterns, in Middle-Tennessee rainfall comes in a more condensed heavy pattern. Both have unique but similar challenges with flooding and overall surface water mitigation, resulting in high capital and operational demands. However, by comparison, Franklin does see considerable rainfall, averaging 52 inches annually.

Exhibit 22: Annual Rainfall Totals





City of Franklin, Tennessee

Stormwater Fund Review

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Section IV:

Fund Analysis

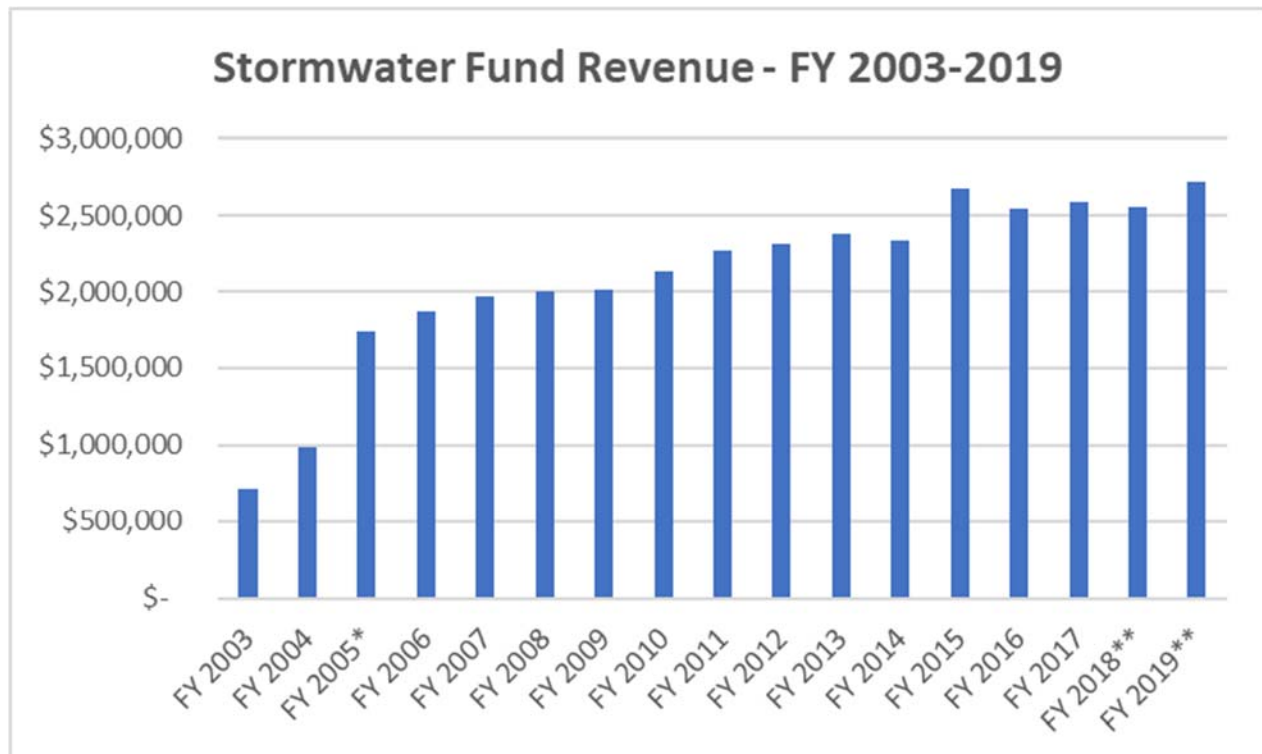


Section IV: Fund Analysis

Now that the operations of the fund have been examined and how other municipalities have provided for Stormwater services, sufficient information exists to analyze the fund.

The current fee, set last in 2004 has provided a reliable amount of revenue for the fund since its inception.

Exhibit 23: Historic Stormwater Fund Collections – Inception to Today



**2005 had an audit adjustment in revenues. **2018 and 2019 are estimated amounts.*

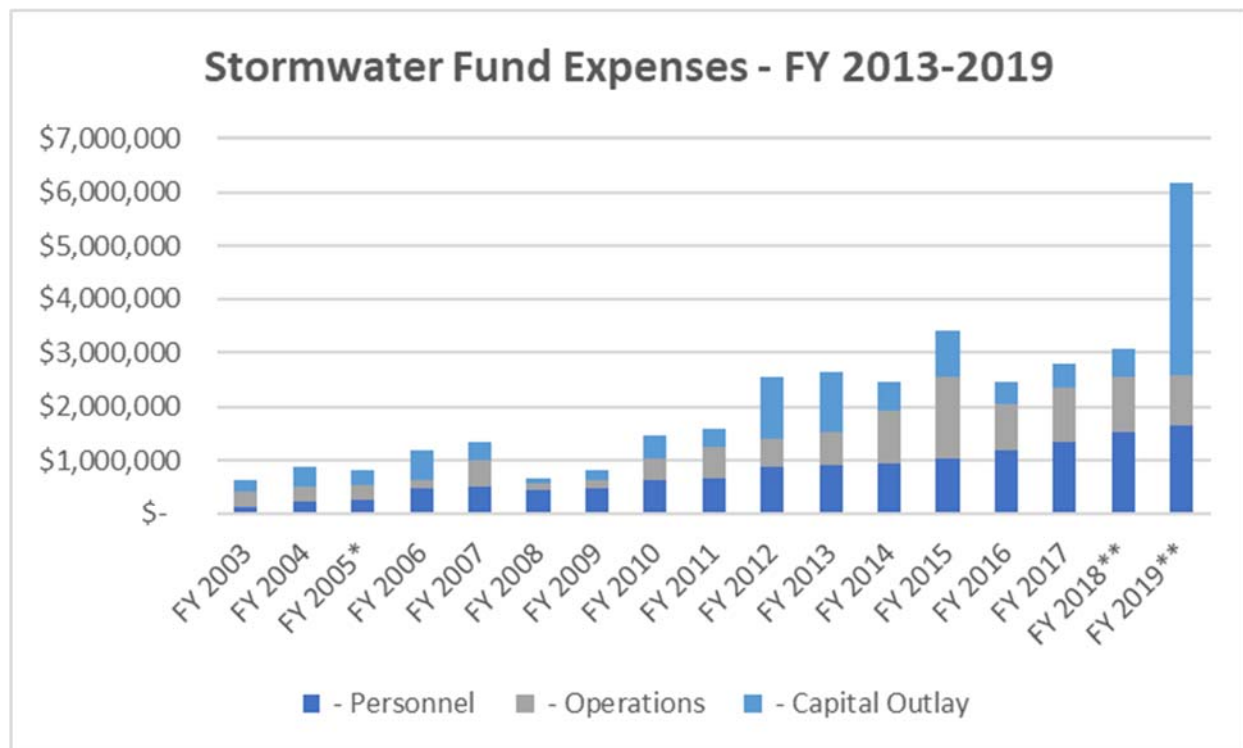
From a starting point of under \$1,000,000 annually, revenues collected from primarily Stormwater use fees grew significantly in the early years, but the rate of growth has slowed in the last decade. Since the fee has not been raised, this growth has been entirely attributable to growth within the community.



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 24: Historic Stormwater Fund Expenses – Inception to Today



*2005 had an audit adjustment in revenues. **2018 and 2019 are estimated amounts.

Expenses in the fund have focused in two areas – operations and capital contributions. The operations costs – both personnel and operating expenses – pay for the 22 employees and support the city’s compliance with maintaining our MS4 permit. Capital contributions include those costs of projects directly related to improving the proper collection and disbursement of Stormwater or the components of bigger transportation projects which have an eligible Stormwater component.

Over time, operating costs have steadily increased as a) the demands of meeting our obligations under the NPDES permit have increased, and b) the community has continued to grow. This growth has led to the City hiring ever increasing numbers of employees (see Appendices for a history of authorized staffing FY 2003-2019) both as Water Quality Specialists inspecting waterways and construction sites but also equipment operators responsible for cleaning ever increasing numbers of catch basins and sweeping streets.

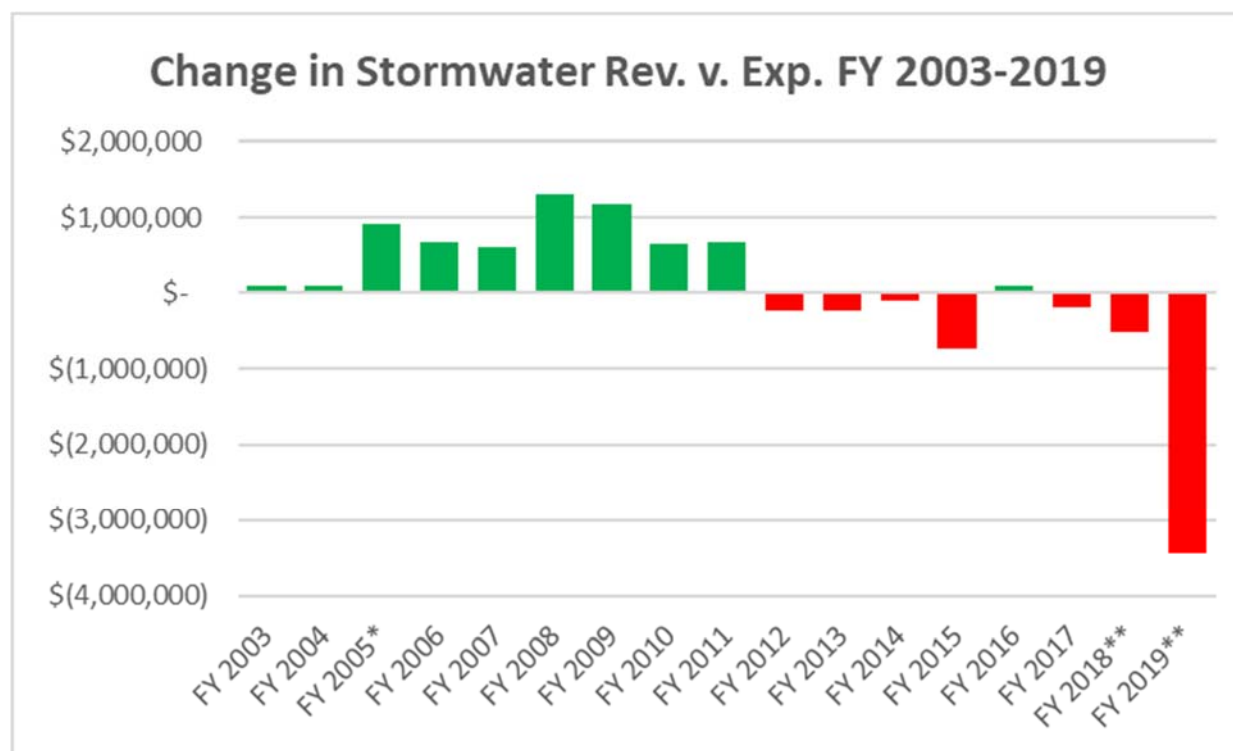


City of Franklin, Tennessee

Stormwater Fund Review

The healthy revenue growth has kept pace with the standard operations of the fund, until recently. Over the first decade and one-half, revenues outpaced expenses for the first nine years. But in the last 8 years, only one has produced a surplus as shown in Exhibit 25:

Exhibit 25: Historic Year-Over-Year Stormwater Fund Balance Change – Inception to Today



**2005 had an audit adjustment in revenues. **2018 and 2019 are estimated amounts.*

The reasons for this decrease in fund balance vary. In some years, revenue collection has declined slightly year over year while operating costs have steadily increased (see Appendices Historic Financials FY 2003-2019). When a large spike in expenses occur, however, it has been attributable each time to either direct spending on (or a transfer for a Stormwater component) of a capital project.

Moving forward, this trend is expected to continue. The forecast on the next page shows the FY 2019 budget and a forecast for FY 2020-2022. Only recurring revenues and expenses along with approved capital projects are shown.



City of Franklin, Tennessee

Stormwater Fund Review

Exhibit 26: Stormwater Fund Forecast FY 2019-2022

	2019 Budget	2020 Forecast	2021 Forecast	2022 Forecast
Beginning Balance	\$ 4,324,344	\$ 2,573,511	\$ 2,376,750	\$ 2,156,718
Revenues	\$ 2,722,281	\$ 2,776,727	\$ 2,832,261	\$ 2,888,906
Personnel	\$ 1,668,528	\$ 1,755,021	\$ 1,841,962	\$ 1,934,060
Operations	\$ 913,586	\$ 938,466	\$ 960,331	\$ 979,538
Capital	\$ 1,891,000	\$ 280,000	\$ 250,000	\$ 250,000
Streets Capital	\$ 331,000	\$ 250,000	\$ 250,000	\$ 250,000
Engineering Capital (Commitments)	\$ 1,560,000	\$ 30,000	\$ -	\$ -
Expenses	\$ 4,473,114	\$ 2,973,487	\$ 3,052,293	\$ 3,163,598
Remaining Fund Balance	\$ 2,573,511	\$ 2,376,750	\$ 2,156,718	\$ 1,882,027

As shown above, the recurring expenses of the fund have now begun to outstrip recurring revenues. With or without further capital expenditure, the fund will eventually end up in a negative balance should this trend continue.

Capital projects, however, are a large consideration as the city has many projects which are eligible for funding via the Stormwater Fund if resources are available. The FY 2019-2028 Capital Improvement Plan forecasts \$14,476,000 million in direct Stormwater funded projects, with and \$5,749,000 more in transportation projects that have a Stormwater component which could be funded from the Stormwater Fund.

Exhibit 27: Stormwater Projects in the FY 2019-2028 Capital Investment Program²¹

Category	#	Priority	FY 19	FY 20	FY 21	FY 22	FY 23	FY 24	FY 25	FY 26	FY 27	FY 28	Total
Stormwater													
Ralston Creek at Liberty Hills Stream Restoration	SWP6001	2	50,000	300,000									350,000
Parkview Drainage Project	SWP6002	1					120,000	450,000	1,680,000				2,250,000
100 Block Battle Avenue Drainage Improvements	SWP6003	2	1,500,000	350,000									1,850,000
Figurs Drive Area Drainage Improvements	SWP6004	1				150,000	400,000	1,296,000					1,846,000
Jordan Branch (Cool Springs E) Stream Restoration	SWP6005	4	760,000										760,000
Maplewood Stormwater Project	SWP6007	4	500,000	30,000									530,000
Carnton Ln Bridge Replacement	SWP6008	4	300,000										300,000
Carlisle HOA Culvert Project	SWP9001	3	35,000	500,000									535,000
Fairground Drainage Improvements	SWP9002	1			100,000	1,500,000							1,600,000
USACE - Home Raising Project	SWP9003	2	250,000	3,750,000									4,000,000
West Main Bridge Widening Project	SWP9004	3			60,000	395,000							455,000
Stormwater Total			3,395,000	4,930,000	160,000	2,045,000	520,000	1,746,000	1,680,000				14,476,000
GRAND TOTAL			3,395,000	4,930,000	160,000	2,045,000	520,000	1,746,000	1,680,000				14,476,000

²¹ City of Franklin, TN. "FY 2019-2028 Capital Investment Program. 11 October 2018. Page 211.
www.franklintn.gov/home/showdocument?id=28118.



City of Franklin, Tennessee

Stormwater Fund Review

These forecasts indicate that the fund will not be able to sustain either operations nor capital contributions moving forward. The table below shows the anticipated balance on the fund over the next ten years if the fee is not adjusted and only operations are funded at their current level.

Exhibit 28: FY 2019-2028 – Ten-Year Forecast of the Stormwater Fund*

	2019 Budget	2020 Forecast	2021 Forecast	2022 Forecast	2023 Forecast
Beginning Balance	\$ 4,324,344	\$ 2,573,511	\$ 2,376,750	\$ 2,156,718	\$ 1,882,027
Revenues	\$ 2,722,281	\$ 2,776,727	\$ 2,832,261	\$ 2,888,906	\$ 2,946,685
Personnel	\$ 1,668,528	\$ 1,755,021	\$ 1,841,962	\$ 1,934,060	\$ 2,030,763
Operations	\$ 913,586	\$ 938,466	\$ 960,331	\$ 979,538	\$ 999,128
Capital	\$ 1,891,000	\$ 280,000	\$ 250,000	\$ 250,000	\$ 250,000
Streets Capital	\$ 331,000	\$ 250,000	\$ 250,000	\$ 250,000	\$ 250,000
Engineering Capital	\$ 1,560,000	\$ 30,000	\$ -	\$ -	\$ -
Expenses	\$ 4,473,114	\$ 2,973,487	\$ 3,052,293	\$ 3,163,598	\$ 3,279,891
Remaining Fund Balance	\$ 2,573,511	\$ 2,376,750	\$ 2,156,718	\$ 1,882,027	\$ 1,548,820
	2024 Forecast	2025 Forecast	2026 Forecast	2027 Forecast	2028 Forecast
Beginning Balance	\$ 1,548,820	\$ 1,153,026	\$ 690,347	\$ 156,247	\$ (454,061)
Revenues	\$ 3,005,618	\$ 3,065,731	\$ 3,127,045	\$ 3,189,586	\$ 3,253,378
Personnel	\$ 2,132,301	\$ 2,238,916	\$ 2,350,862	\$ 2,468,405	\$ 2,591,826
Operations	\$ 1,019,111	\$ 1,039,493	\$ 1,060,283	\$ 1,081,489	\$ 1,103,118
Expenses	\$ 3,151,412	\$ 3,278,409	\$ 3,411,145	\$ 3,549,894	\$ 3,694,944
Capital	\$ 250,000	\$ 250,000	\$ 250,000	\$ 250,000	\$ 250,000
Streets Capital	\$ 250,000	\$ 250,000	\$ 250,000	\$ 250,000	\$ 250,000
Engineering Capital	\$ -	\$ -	\$ -	\$ -	\$ -
Expenses	\$ 3,401,412	\$ 3,528,409	\$ 3,661,145	\$ 3,799,894	\$ 3,944,944
Remaining Fund Balance	\$ 1,153,026	\$ 690,347	\$ 156,247	\$ (454,061)	\$ (1,145,627)

*Forecast assumes 2% annual growth in Revenues with a 5% increase in Personnel Expenses and 2% annual growth in Operations Expenses.

Summary

The forecast indicates that the fund will be depleted of fund balance by FY 2027 should the status quo be maintained. It would be in violation of State Fund Balance requirements by FY 2025. This forecast drop in fund balance would increase far quicker if additional funds are spent on the over \$20,000,000 in proposed Stormwater capital projects. Staff recommends that additional funding for Stormwater activities, both operating and capital, be identified to maintain a high level of service. Options for such funding may be an increase to the Stormwater utility rates, a transfer from the General Fund or some combination thereof.



Section V:

Recommendations & Next Steps



Section V: Recommendations & Next Steps

The City of Franklin's Stormwater Fund was created in Fiscal Year 2003 in order to account for activities necessary for the City's continued compliance with the National Pollution Discharge Elimination System (NPDES). Over time it has grown to fund necessary compliance activities, street sweeping and catch basin maintenance and overall educational efforts to reduce the City's overall storm water discharge. All of the activities – whether they be maintenance and supervision in operations or one-time capital contributions and projects which reduce flooding risk have merit, but the fund is no longer able to sustain all of the activities it has in the past without structural change.

Staff recommends to the Board a few recommendations and a series of next steps:

Recommendations:

- 1) **Additional funding should be dedicated to Stormwater operations and capital needs.**
First and foremost, the fee should likely be adjusted. It has not been raised in 14 years, and comparative fees throughout Tennessee and the United States indicate that Franklin is on the low end of scale – both in the fee assessed and the rate structure. How that is to be achieved is up for further discussion and debate (see **Next Steps**).
- 2) Title 23, the section of City Code which contains the authorization for the Stormwater Fund, should be amended to include language similar to other funds which require a mandatory review of the fee no less than every five fiscal years. In addition, Title 23 needs the same standard cleanup to include the same language on assessing penalties and interest which Title 17 and Title 18 have gone through in recent years.

Next Steps:

- 1) Review this report and provide feedback to staff. The key question which the BOMA should consider is to what level should the Stormwater Fund continue to support both operations and capital expenses which in the past have been charged against the fund.
- 2) Should the BOMA wish, direct staff to prepare several options which show what different residential and non-residential tiers look like, as well as how fees could be increased (or not dependent upon how the tiers are structured).
- 3) Also should the BOMA wish, staff will also prepare the impacts of transfers from the General Fund for funding a part or all of identified Stormwater capital projects through the FY 2019-2028 Capital Investment Program.
- 4) Staff will prepare the various options as part of the FY 2020 annual operating budget process and have a review ready by the March 2019 Budget review of the Stormwater Fund. This would also enable the BOMA to have sufficient time to review changes to the fee structure and approve in May & June as part of the annual operating budget process.



Section VI: Appendices

Historic Financials Since Inception of Fund (2003) to Today (2019)

Historic Staffing Levels Since Inception of Fund (2003) to Today (2019)

City of Redmond, Washington Rate Adjustment Examples

Monthly Fee per Typical Residence for Larger Municipalities (2017)

Ordinance 2001-53: Authorizing Stormwater Management Ordinance

Ordinance 2002-14: Original Authorizing Ordinances for the Stormwater Fee

Ordinance 2004-25: Current Authorizing Ordinance for the Stormwater Fee



City of Franklin, Tennessee

Stormwater Fund Review

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City of Franklin, Tennessee

Stormwater Fund Review

Historic Financials – FY 2003-2019

Stormwater Fund - Activity since Inception - FY 2003 to FY 2019

The following table shows the performance of the Stormwater Fund over the seventeen-year existence of the fund - FY 2003 through FY 2019.

	FY 2003	FY 2004	FY 2005*	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011
Beginning Fund Balance	\$ -	\$ 85,142	\$ 44,982	\$ 954,988	\$ 1,640,902	\$ 2,255,949	\$ 3,573,362	\$ 4,754,751	\$ 5,407,750
+ Revenues	\$ 717,192	\$ 982,148	\$ 1,735,994	\$ 1,868,164	\$ 1,962,406	\$ 1,999,575	\$ 2,014,752	\$ 2,129,259	\$ 2,271,022
- Year over Year Growth	N/A	36.94%	76.75%	7.61%	5.04%	1.89%	0.76%	5.68%	6.66%
- Personnel	\$ 104,778	\$ 253,929	\$ 264,441	\$ 486,853	\$ 530,277	\$ 449,041	\$ 472,903	\$ 647,942	\$ 676,390
- Year over Year Growth	N/A	142.35%	4.14%	84.11%	8.92%	-15.32%	5.31%	37.01%	4.39%
- Operations	\$ 320,260	\$ 254,837	\$ 270,494	\$ 146,342	\$ 482,451	\$ 124,318	\$ 169,968	\$ 382,660	\$ 569,824
- Year over Year Growth	N/A	-20.43%	6.14%	-45.90%	229.67%	-74.23%	36.72%	125.14%	48.91%
- Capital Outlay	\$ 207,012	\$ 376,599	\$ 291,053	\$ 549,055	\$ 334,631	\$ 108,803	\$ 190,492	\$ 445,658	\$ 336,605
- Year over Year Growth	N/A	81.92%	-22.72%	88.64%	-39.05%	-67.49%	75.08%	133.95%	-24.47%
- Expenditures	\$ 632,050	\$ 885,365	\$ 825,988	\$ 1,182,250	\$ 1,347,359	\$ 682,162	\$ 833,363	\$ 1,476,260	\$ 1,582,819
- Year over Year Growth	N/A	40.08%	-6.71%	43.13%	13.97%	-49.37%	22.16%	77.14%	7.22%
= Change in Rev. vs. Exp.	\$ 85,142	\$ 96,783	\$ 910,006	\$ 685,914	\$ 615,047	\$ 1,317,413	\$ 1,181,389	\$ 652,999	\$ 688,203
= Ending Balance	\$ 85,142	\$ 181,925	\$ 954,988	\$ 1,640,902	\$ 2,255,949	\$ 3,573,362	\$ 4,754,751	\$ 5,407,750	\$ 6,095,953

	FY 2012	FY 2013	FY 2014	FY 2015	FY 2016	FY 2017	FY 2018**	FY 2019**
Beginning Fund Balance	\$ 6,095,953	\$ 5,858,322	\$ 5,615,101	\$ 5,511,065	\$ 4,783,235	\$ 4,873,735	\$ 4,687,695	\$ 4,171,436
+ Revenues	\$ 2,313,402	\$ 2,383,896	\$ 2,340,962	\$ 2,673,347	\$ 2,546,681	\$ 2,590,187	\$ 2,559,489	\$ 2,722,281
- Year over Year Growth	1.87%	3.05%	-1.80%	14.20%	-4.74%	1.71%	-1.19%	6.36%
- Personnel	\$ 888,171	\$ 903,101	\$ 948,571	\$ 1,047,100	\$ 1,177,449	\$ 1,345,212	\$ 1,536,864	\$ 1,668,528
- Year over Year Growth	31.31%	1.68%	5.03%	10.39%	12.45%	14.25%	14.25%	8.57%
- Operations	\$ 513,392	\$ 614,311	\$ 969,559	\$ 1,510,490	\$ 881,055	\$ 1,019,535	\$ 1,017,214	\$ 913,586
- Year over Year Growth	-9.90%	19.66%	57.83%	55.79%	-41.67%	15.72%	-0.23%	-10.19%
- Capital Outlay	\$ 1,149,470	\$ 1,109,705	\$ 526,868	\$ 843,587	\$ 397,677	\$ 411,480	\$ 521,670	\$ 3,576,000
- Year over Year Growth	241.49%	-3.46%	-52.52%	60.11%	-52.86%	3.47%	26.78%	585.49%
- Expenditures	\$ 2,551,033	\$ 2,627,117	\$ 2,444,998	\$ 3,401,177	\$ 2,456,181	\$ 2,776,227	\$ 3,075,748	\$ 6,158,114
- Year over Year Growth	61.17%	2.98%	-6.93%	39.11%	-27.78%	13.03%	10.79%	100.22%
= Change in Rev. vs. Exp.	\$ (237,631)	\$ (243,221)	\$ (104,036)	\$ (727,830)	\$ 90,500	\$ (186,040)	\$ (516,259)	\$ (3,435,833)
= Ending Balance	\$ 5,858,322	\$ 5,615,101	\$ 5,511,065	\$ 4,783,235	\$ 4,873,735	\$ 4,687,695	\$ 4,171,436	\$ 735,603

*Fund Balance Restatement, FY 2005 Audit (page 60).

**Estimates

Source: City of Franklin, Finance Department. Comprehensive Annual Financial Reports & Annual Operating Budgets.



City of Franklin, Tennessee

Stormwater Fund Review

Historic Staffing Levels – FY 2003-FY 2019

The following tables show the authorized budgeted staffing against the Stormwater Fund from its inception to today.

Staffing by Position

Position	Pay Grade	FY 2003		FY 2004		FY 2005		FY 2006		FY 2007		FY 2008		FY 2009		FY 2010		FY 2011	
		F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T
Stormwater - Engineering																			
Stormwater Man. Coordinator	Grade I	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0
Water Quality Specialist III	Grade H	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Water Quality Specialist II	Grade G	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Water Quality Specialist I	Grade F	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Stormwater - Streets																			
Stormwater Inspector	Grade F	0	0	0	0	1	0	1	0	2	0	2	0	2	0	2	0	2	0
Stormwater Supervisor	Grade F	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0
Crew Chief	Grade E	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Heavy Equipment Operator	---	3	0	3	0	3	0	3	0	3	0	3	0	3	0	3	0	3	0
Equipment Operator Sr.	---	0	0	0	0	3	0	3	0	3	0	3	0	3	0	3	0	3	0
Equipment Operator	Grade D	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Crew Worker	Grade B	0	0	0	0	0	0	0	0	1	0	1	0	1	0	1	0	1	0
Intern	---	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
Totals		5	0	5	0	9	0	9	0	11	0	11	0	11	0	11	0	11	0

Position	Pay Grade	FY 2012		FY 2013		FY 2014		FY 2015		FY 2016		FY 2017		FY 2018		FY 2019	
		F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T	F-T	P-T
Stormwater - Engineering																	
Stormwater Man. Coordinator	Grade I	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0
Water Quality Specialist III	Grade H	0	0	0	0	0	0	0	0	0	0	0	0	1	0	1	0
Water Quality Specialist II	Grade G	0	0	0	0	1	0	1	0	3	0	3	0	2	0	0	0
Water Quality Specialist I	Grade F	1	0	1	0	1	0	2	0	1	0	1	0	2	0	4	0
Stormwater - Streets																	
Stormwater Inspector	Grade F	2	0	2	0	2	0	2	0	2	0	3	0	3	0	3	0
Stormwater Supervisor	Grade F	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0
Crew Chief	Grade E	0	0	0	0	0	0	2	0	2	0	2	0	2	0	2	0
Heavy Equipment Operator	---	2	0	2	0	0	0	0	0	0	0	0	0	0	0	0	0
Equipment Operator Sr.	---	7	0	7	0	0	0	0	0	0	0	0	0	0	0	0	0
Equipment Operator	Grade D	1	0	1	0	10	0	8	0	8	0	8	0	8	0	9	0
Crew Worker	Grade B	1	0	1	0	1	0	1	0	1	0	1	0	1	0	1	0
Intern	---	0	1	0	1	0	0	0	0	0	0	0	0	0	0	0	0
Totals		16	1	16	1	17	0	18	0	19	0	20	0	21	0	22	0

Source: City of Franklin, Finance Department, Annual Operating Budgets.



City of Franklin, Tennessee

Stormwater Fund Review

Detailed information: City of Redmond, WA: Rate Adjustment Examples

The rate adjustment is calculated by adding each applicable credit to the coverage factor.

$$\text{Rate Adjustment} = \text{Impervious Coverage Factor} + \text{Flow Control Credit} + \text{Water Quality Credit}$$

Examples:

Examples using the 50,000 square foot site described above (66% Impervious with 16.5 Impervious units)

Example 1: Flow control with water quality

This parcel has a pond designed to the 1992 standard and a bioswale that provides basic treatment

The rate adjustment would be calculated with the following:

Impervious coverage factor = 1.4

Flow Control Credit = -.10

Water Quality Credit = -.10

The rate adjustment would be $1.4 - .10 - .10 = 1.2$

The monthly bill would be:

$\$16.56 \text{ (Base Rate)} \times 16.5 \text{ (Impervious Units)} \times 1.2 \text{ (Rate Adjustment)} = \327.88

Example 2: Infiltration with water quality

This site has an infiltration trench designed to manage 100% of the annual stormwater runoff and a wet pond that provides basic treatment prior to infiltration.

The rate adjustment would be calculated with the following:

Impervious coverage factor = 1

Flow Control Credit = -.40

Water Quality Credit = -.10

The rate adjustment would be $1.0 - .40 - .10 = 0.5$

The monthly bill would be:

$\$16.56 \text{ (Base Rate)} \times 16.5 \text{ (Impervious Units)} \times 0.5 \text{ (Rate Adjustment)} = \136.62



City of Franklin, Tennessee

Stormwater Fund Review

Detailed information: City of Redmond, WA: Rate Adjustment Examples

Example 3: Infiltration with water quality (80% of the site drains to the stormwater system)

This site has an infiltration trench designed to manage 100% of the annual stormwater runoff and a bioswale that provides basic treatment prior to infiltration, however only 80% of the site drains to these systems. The rest of the site does not receive any credits.

In this case each portion of the parcel is calculated separately and then prorated to arrive at a rate adjustment for the whole site.

For the area that drains to the stormwater system:

The rate adjustment would be calculated with the following:

Impervious coverage factor = 1

Flow Control Credit = -.40

Water Quality Credit = -.10

The rate adjustment would be $1.0 - .40 - .10 = 0.5$

For the area NOT managed by a stormwater system:

The rate adjustment would be calculated with the following:

Impervious coverage factor = 1.4

Since there are no flow control or water question credits, the rate adjustment would be 1.4

To arrive at a rate adjustment for the parcel, each portion is prorated and combined:

$$0.5 \times .8 + 1.4 \times .2 = .68$$

The monthly bill would be:

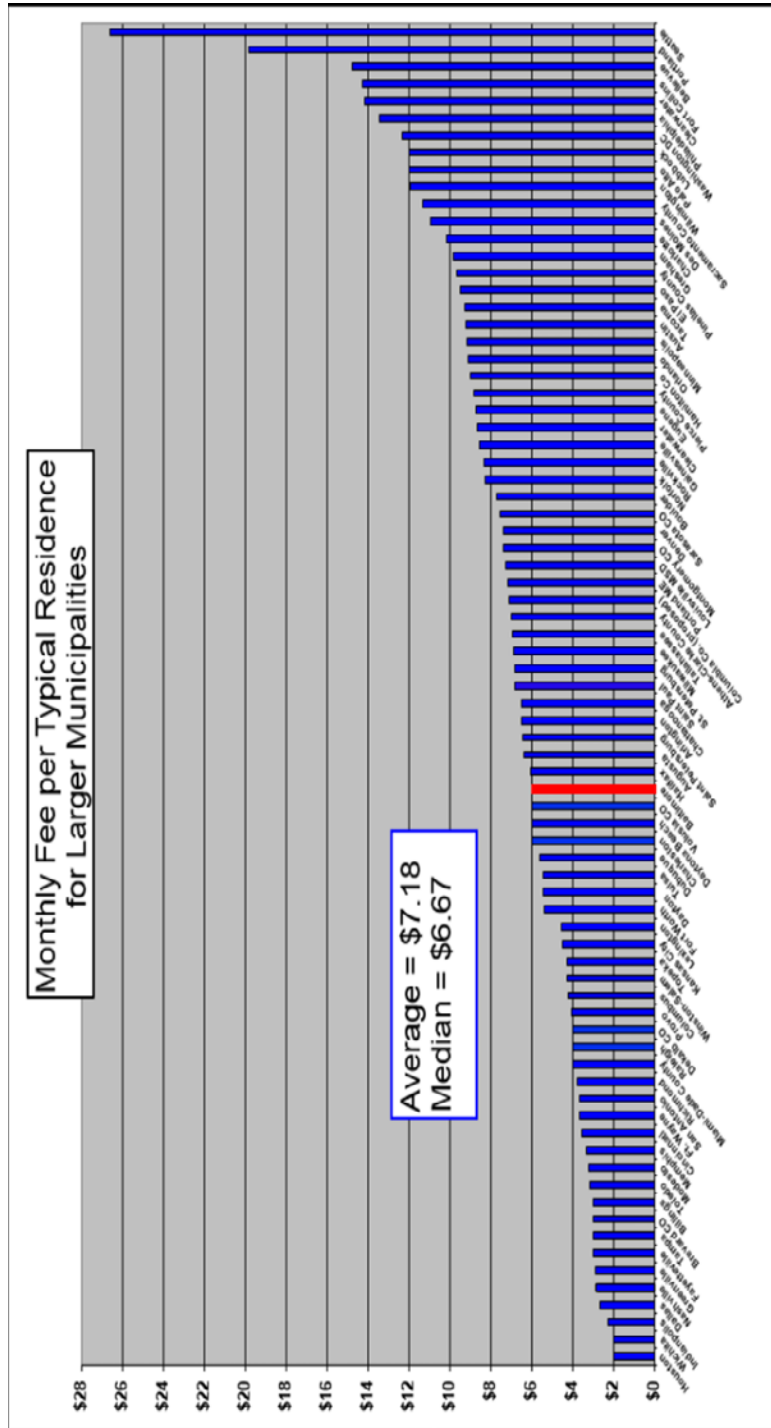
$$\$16.56 \text{ (Base Rate)} \times 16.5 \text{ (Impervious Units)} \times .68 \text{ (Rate Adjustment)} = \$185.80$$



City of Franklin, Tennessee

Stormwater Fund Review

Monthly Fee per Typical Residence for Larger Municipalities (2017)²²



²²City of Nashville, TN.

<https://www.nashville.gov/Portals/0/SiteContent/WaterServices/Stormwater/docs/FeeRestructure/rate%20comparison%20v2018.1.11.pdf>

ORDINANCE 2001-53

TO BE ENTITLED: "AN ORDINANCE AMEND TITLE SIXTEEN OF THE FRANKLIN MUNICIPAL CODE TO ENACT STORMWATER MANAGEMENT STANDARDS."

SECTION I: BE IT ORDAINED by the Board of Mayor and Aldermen of the City of Franklin, Tennessee, that the attached "Stormwater Management Ordinance" shall be and it is hereby adopted and that the said ordinance shall be codified as a new Chapter 6 of Title 16 of the Franklin Municipal Code.

SECTION II: BE IT FINALLY ORDAINED by the Board of Mayor and Aldermen of the City of Franklin that this ordinance shall take effect from and after its passage on second and final reading, the health, safety, and welfare of the citizens of Franklin requiring it.

ATTEST:


JAMES R. JOHNSON
City Administrator/Recorder

CITY OF FRANKLIN, TENNESSEE:


JERRY W. SHARBER
Mayor

PASSED FIRST READING: 3/12/2002

PASSED SECOND READING: 4/9/2002

DRAFT
8/31/01

Stormwater Management Ordinance

Section 1 – Title and Purpose

This ordinance shall be known as the "*Stormwater Management Ordinance*" for the City of Franklin, Tennessee.

Whereas, inadequate management of stormwater runoff from development in a watershed increases flood flows and velocities, erodes and/or silts stream channels, pollutes water, overloads existing drainage facilities, undermines floodplain management in downstream communities, reduces groundwater recharge, and threatens public health and safety. More specifically, surface water runoff can carry pollutants and higher velocities into receiving waters. The potential impacts of these pollutants and higher velocities include:

1. Changing natural ecosystems through sediment and pollutant deposits which affect the quantity and quality of water flowing, the destruction of habitats, and the loss of plant and animal life;
2. Posing significant health risks through increased bacteria;
3. Accelerating eutrophication of receiving waters by introducing excessive nutrient loads;
4. Increasing metal deposits creating toxicity for aquatic life;
5. Reducing oxygen levels because of oil, grease and organic matter; and
6. Affecting animal and plant life, adversely, due to changing temperatures of receiving waters,

Whereas, uncontrolled stormwater drainage can increase the incidence of flooding and the level of floods which occur, endangering roads, other public and private property and human life.

Whereas, altered land surfaces can change the rate and volume of runoff. These changes may result in the following:

1. Erosion and slumping of streambanks, resulting in widening of streams;
2. Undercut root systems;
3. Increased erosion rates; and
4. Uniform and shallow streambeds, providing less varied aquatic habitats.

Whereas, adverse water quality and quantity consequences described above may result in substantial economic losses. Potential losses include, but are not limited to, increased wastewater treatment costs, diminished property values, increased flood damages, as well as state and federal fines associated with water quality violations.

Whereas, many future problems can be avoided through proper stormwater management whereby a comprehensive and reasonable program of regulations is fundamental to the public health, safety, and welfare and to the protection of the citizenry and environment.

Whereas, every parcel of real property, both public and private, either uses or benefits from the maintenance of the City of Franklin's stormwater system.

Whereas, current and anticipated growth will contribute to and increase the need for improvement and maintenance of the stormwater system.

This Ordinance is intended to manage the manner in which stormwater is addressed in areas of new development, redevelopment and significant redevelopment through the course of construction and post-construction to maintain or benefit water quantity, water quality and the effects on the quality of life and character of the City of Franklin, Tennessee. This ordinance sets general policy and stormwater management program direction and is supported and enforced through other more detailed regulations, design criteria, and other accepted materials.

Section 2 – Jurisdiction

- 2.1 The *Stormwater Management Ordinance* shall govern all properties within the corporate limits of the City of Franklin, Tennessee.
- 2.2 Exemptions from article – The following development activities are exempt from the provisions of this article and requirements of providing stormwater management:
 - 2.2.1 Agricultural land management activities.
 - 2.2.2 Additions or modifications to existing detached single-family dwellings.
 - 2.2.3 Developments that do not disturb more than 5,000 square feet of land use. This exception may not be applied for contiguous properties that may have been subdivided and/or are attributed to multiple separate owners. This exemption does not apply to any discharge of sediment or other form of water pollution that may leave a small site.

Section 3 – Definitions

For the purpose of this ordinance, unless specifically defined below, words or phrases shall be interpreted so as to give them the meaning they have in common usage and to give this article its most effective application. Words in the singular shall include the plural, and words in the plural shall include the singular. Words used in the present tense shall include the future tense. The word “shall” connotes mandatory and not discretionary; the word “may” is permissive.

The following definitions shall apply in the interpretation of this Ordinance and in any regulations promulgated hereunder, unless specifically stated otherwise:

100-year flood event – See Base Flood

Active Construction Sites – Any site that has a permit for grading or other activities (even if actual construction is not proceeding) and any site where construction is occurring regardless of permits acquired.

Appeal – A request for a review of the Director of Engineering’s interpretation of any provision of these regulations.

Architect – An architect duly registered, licensed or otherwise authorized by the State of Tennessee to practice in the field of building architecture.

Base Flood – The flood having a one percent chance of being equaled or exceeded in any given year. While this statistical event may occur more frequently, it may also be known as the “100-year flood event”.

Blue line streams – Streams that are represented on the United States Department of the Interior Geological Survey (USGS) 1:24,000 quadrangle maps.

BMP – Best Management Practice. This may refer collectively or specifically to a structural or non-structural practice intended to address water quantity or quality as best available.

BMP Treatment Train – A technique for progressively selecting various stormwater management practices to address water quality, by which groups of practices may be used to achieve a treatment goal while optimizing effectiveness, maintenance needs and space.

Bridge – A man made conveyance of stormwater flows.

Building – Any structure built for support, shelter, or enclosure for any occupancy or storage.

Channel – A natural or artificial watercourse of perceptible extent, with definite bed and banks to confine and conduct continuously or periodically flowing water. Channel flow is that water which is flowing within the limits of the defined channel.

City – The City of Franklin, Tennessee

Culvert – A man made conveyance of stormwater flows. This may include a pipe or other constructed conveyance.

Cross-drain – A culvert used to convey flow under a road or other obstruction between channels or surface flow.

Critical area – A site subject to erosion or sedimentation as a result of cutting, filling, grading, or other disturbance of the soil; a site difficult to stabilize due to exposed subsoil, steep slope, extent of exposure, and other conditions.

Critical design-storm period – refers to the time frame in which detention volume must be controlled with the pre-development flow volume as a maximum limit. It assumes a design period for an NRCS (formerly SCS) type II design storm. This is a watershed specific parameter that may be specified by the Director of Engineering, but may be assumed as 10 to 14 hours for small and medium watersheds (order of less than 10 square miles) and 10 to 18 hours for large watersheds (order of 10 to 40 square miles).

Critical service roads – Designated city evacuation routes, or other access to police, fire, emergency medical services, hospitals, or shelters.

Cut – Portion of land surface or area from which earth has been removed or will be removed by excavation; the depth below original ground surface to the excavated surface.

Detention – The temporary delay of storm runoff prior to discharge into receiving waters.

Developer – Any individual, firm, corporation, association, partnership, or trust involved in commencing proceedings to effect development of land for himself or others. This includes any legal or engineering representative of the “developer”.

Development – Any man-made change to improved or unimproved real estate, including but not limited to, buildings or other structures, mining, dredging, filling, grading, paving, excavating, drilling operations, or permanent storage of materials (as defined as materials of like nature stored in whole or in part for more than six months).

Director of Engineering – Refers to the City of Franklin, Tennessee Engineer and designated staff.

Drainage Basin – A part of the surface of the earth that is occupied by and provides surface water runoff into a stormwater management system (MS4 of Waters of the State), which consists of a surface stream or a body of impounded surface water together with all tributary surface streams and bodies of impounded surface water.

Drainage Well – A bored, drilled, driven, dug, or naturally occurring shaft or hole with a depth greater than the largest surface dimension; used to drain surface fluid, primarily storm runoff, into a subsurface or karst formation. Also known as “dry well” or “sinkhole”.

Engineer – An engineer duly registered, licensed or otherwise authorized by the State of Tennessee to practice in the field of civil engineering.

EP&SC – Erosion prevention and sediment control; see “erosion prevention” and “sediment control”

Erosion – The disintegration or wearing away of soil by the action of water in the form of flowing water or precipitation impact.

Erosion prevention – (EP) practices implemented to prevent, through shielding, binding or other mechanism(s), the suspension of soil particles, often associated with erosion prevention and sedimentation control.

Excavation – See cut.

Existing Grade – The slope or elevation of existing ground surface prior to cutting or filling.

Existing Construction – Any structure for which the “start of construction” commenced before the effective date of these regulations.

Fill – Portion of land surface or area to which soil, rock, or other materials have been or will be added; height above original ground surface after the material has been or will be added.

Finished Grade – The final slope or elevation of the ground surface, after cutting or filling.

Flood or Flooding – Water from a river, stream, watercourse, lake, or other body of standing water that temporarily overflows and inundates adjacent lands and which may affect other lands and activities through increased surface water levels and/or increased groundwater level.

Flood Insurance Rate Map (FIRM) – An official map of the City of Franklin, on which the Federal Emergency Management Agency has delineated both the areas of special flood hazard and the risk premium zones applicable to the City of Franklin.

Flood Insurance Study – The official report provided by the Federal Emergency Management Agency. The report contains elevations of the base flood, floodway widths, flood velocities, and flood profiles.

Flood Plain – The relatively flat or lowland area adjoining a river, stream, watercourse, lake, or other body of standing water which has been or may be covered temporarily by floodwater. For purposes of this manual, the flood plain is defined as the 100-year floodplain having a one percent chance of being equaled or exceeded in any given year.

Floodproofing – A combination of structural provisions, changes, or adjustments to properties and structures subject to flooding primarily for the reduction or elimination of flood damages to properties, water and sanitary facilities, structures, and contents of buildings in a flood hazard area.

Floodway – That portion of the stream channel and adjacent flood plain required for the passage or conveyance of a 100-year flood discharge. The floodway boundaries are placed to limit encroachment in the flood plain so that a 100-year flood discharge can be conveyed through the flood plain without materially increasing (less than one foot) the water surface elevation at any point and without producing hazardous velocities or conditions. This is the area of significant depths and velocities and due consideration should be given to effects of fill, loss of cross sectional flow area, and resulting increased water surface elevations.

Floodway Fringe – That portion of the flood plain lying outside the floodway.

Floor - The top surface of an enclosed area in a building (including basement), i.e., top of slab in concrete slab construction or top of wood flooring in wood frame construction. The term does not include the floor of a garage used solely for parking vehicles.

Functionally Dependent Facility - A facility that cannot be used for its intended purpose unless it is located or carried out in proximity to water, such as a docking or port facility necessary for the loading and unloading of cargo or passengers, shipbuilding, or ship repair. The term does not include long-term storage, manufacture, sales, or service facilities.

Grading – Any operation or occurrence by which the existing site elevations are changed; or where any ground cover, natural, or man-made, is removed; or any watercourse or body of water, either natural or man-made, is relocated on any site, thereby creating an unprotected area. This includes stripping, cutting, filling, stockpiling, or any combination thereof, and shall apply to the land in its cut or filled condition. Grading activities may only be performed with a Stormwater Management Permit.

Greenway right-of-way – Property that has been designated for use by the city in support of greenway activities. This may include, but does not require, the use of trails or walkways to provide access to the general public. A greenway that is not defined with a right-of-way may have restricted access (ie. Not accessible to the general public).

Highest Adjacent Grade – The highest natural elevation of the ground surface, prior to construction, next to the proposed walls of a structure.

Historic Structure Designation – Any structure that is: listed individually in the National Register of Historic Places (a listing maintained by the Department of Interior) or preliminarily determined by the Secretary of the Interior as meeting the requirements for individual listing on the National Register; certified or preliminarily determined by the Secretary of the Interior as contributing to the historical significance of a registered historical district or a district preliminarily determined by the Secretary to qualify as a registered historic district; or listed individually on a state or local inventory of historic places which have been approved by the Secretary of the Interior.

Impervious Surface – A term applied to any ground or structural surface that water cannot penetrate or through which water penetrates with great difficulty.

Landscape Architect – A landscape architect duly registered, licensed or otherwise authorized by the State of Tennessee to practice in the field of landscape architecture.

Land Surveyor – A land surveyor duly registered, licensed or otherwise authorized by the State of Tennessee to practice in the field of land surveying.

Lowest Floor – The lowest floor of the lowest enclosed area (including basement). An unfinished or flood resistant enclosure, usable solely for parking of vehicles, building access, or storage and in an area other than the basement area, is not considered a building's lowest floor, provided that such an enclosure is not built so as to render the structure in violation of the elevation design requirements of these regulations.

Master plan – any study or plan prepared by or accepted by the City of Franklin that identifies solutions to water quantity or quality problems. Also known as Basin Study or Plan, Flood Management Study or Plan or Water Quality Management Study or Plan.

MS4 – Municipal Separate Storm Sewer System, the portion of public infrastructure that is not considered "Waters of the State". Usually MS4 refers to wet-weather conveyances while "Waters of the State" dry-weather conveyances. This determination is made by the Tennessee Department of Environment and Conservation.

Natural Ground Surface – The ground surface in its original state before any grading, excavating, or filling.

New Construction – Structures for which the "start of construction" commenced on or after the effective date of these regulations. The term also includes any subsequent improvements to such structures.

NPDES MS4 Phase II program – National Pollution Discharge Elimination System (NPDES) Municipal Separate Storm Sewer System (MS4) program focusing on small communities.

NRCS – National Resources Conservation Service.

One Hundred-Year Flood – A flood that has an average frequency of occurrence of once in one hundred (100) years, determined from an analysis of floods on a particular watercourse and other watercourses in the same general region. Statistically, it has a one percent chance of occurring in any given year. See “Base Flood” and “100-year flood event”.

Permittee – Any person, firm, or any other legal entity to whom a site disturbance, grading, building or other related permit is issued in accordance with City of Franklin regulations.

PUD – Planned unit development.

Redevelopment – development improvements that have a value less than 50% of the current assessed value and/or increases the floor area by less than 25%. Demolition and reconstruction is considered development and not redevelopment. Note: this is different than significant redevelopment.

Regional Stormwater Management Facility – A device or management practice, typically but not always a detention or retention pond, with a tributary area with more than one development site. This may be multiple homogenous landuse areas or an area of various land uses.

Retention – The prevention of storm runoff from direct discharge into receiving waters. Examples include systems which discharge through percolation, exfiltration, filtered bleed-down and evaporation processes.

SCS – Soil Conservation Service

Sediment – Solid material, both mineral and organic, that is in suspension, is being transported, or has been moved from its site of origin by air, water, or gravity as a product of erosion.

Sediment control – (SC) practices implemented to manage through filtering, settling or other mechanism(s) to remove suspended particles (soil, organic or mineral) from water, often associated with erosion prevention and sedimentation control.

Significant Redevelopment – development improvements that have a value greater than 50% of the current assessed value, increases the floor area than 25% or more, any change in the impervious surface area, redirects the flow of storm water in any way, modifies the storm sewer system, or changes the storm water characteristics. Demolition and reconstruction is considered development and not redevelopment. Note: this is different than redevelopment.

Site – All contiguous land and bodies of water in one ownership, graded or proposed for grading or development as a unit, although not necessarily at one time.

Slope – Degree of deviation of a surface from the horizontal, usually expressed in percent or ratio.

Soil – All unconsolidated mineral and organic material of any origin that overlies bedrock and that can be readily excavated.

Soil Engineer – A professional engineer who is qualified, licensed and/or registered by the appropriate authority to practice applied soil mechanics and foundation engineering.

Stormwater Director – Currently defined as the City of Franklin, Tennessee Director of Engineering

Stripping – Any activity that removes or significantly disturbs the vegetative surface cover, including clearing and grubbing operations.

Structure – Anything constructed or erected, the use of which requires a more or less permanent location on or in the ground. Such construction includes but is not limited to objects such as buildings, towers, smokestacks, overhead transmission lines, carports, and walls.

Substantial Damage – Damage of any origin sustained by a structure whereby the cost of restoring the structure to its before damage condition would equal or exceed 50 percent of the market value of the structure before the damage.

Substantial Improvement – Any combination of repairs, reconstruction, alteration, or improvements to a structure, taking place during the life of a structure, in which the cumulative cost equals or exceeds 50 percent of the market value of the structure. The market value of the structure should be (1) the appraised value of the structure prior to the start of the initial repair or improvement, or (2) in the case of damage, the value of the structure prior to the damage occurring. For the purposes of this definition, "substantial improvement" is considered to occur when the first alteration of any wall, ceiling, floor, or other structural part of the building commences, whether or not that alteration affects the external dimensions of the structure.

Tributary Area – The area upstream of a specified point including all overland flow that directly or indirectly connects down-slope to the specified point.

Waters of the State – Any water body determined to be in the jurisdiction of the Tennessee Department of Environment and Conservation (TDEC). Waters of the State are separate and distinct from an MS4 and private infrastructure.

Water Body – A channel, natural depression, slough, gulch, stream, creek, pond, reservoir, or lake in which storm runoff and floodwater flows either regularly or infrequently. This includes major drainage ways for carrying storm runoff.

Waterway buffer – An area separating a waterway from building and/or structures. Typically, buffers are maintained in a “natural” or vegetative state providing environmental and aesthetic benefits.

Wetland – Those areas that are inundated or saturated by surface or ground water at a frequency or duration sufficient to support, and under normal circumstances do support, a prevalence of vegetation typical to life in saturated soil conditions. Wetlands generally include, but are not limited to, swamps, marshes, bogs and similar areas.

Section 4 – Authority

4.1 Authority of Departments

The City of Franklin Administrator may provide authority in part or whole to various departments for the implementation of activities pursuant to the ordinance. This may include but is not limited to plan review, incentives negotiation, plan approval, stormwater facilities maintenance, administration and enforcement.

4.2 Right-of-Entry

- 4.2.1 Designated City of Franklin staff shall have right-of-entry on or upon the property of any person subject to this ordinance and any permit/document issued hereunder. The City of Franklin staff shall be provided ready access to all parts of the premises for the purposes of inspection, monitoring, sampling, inventory, records examination and copying, and the performance of any other duties necessary to determine compliance with this ordinance.
- 4.2.2 Where a property, site or facility has security measures in force which require proper identification and clearance before entry into its premises, the person shall make necessary arrangements with its security personnel so that, upon presentation of suitable identification, the Designated City of Franklin will be permitted to enter without delay for the purposes of performing specific responsibilities.
- 4.2.3 Designated City of Franklin staff shall have the right to set up on the person's property such devices as are necessary to conduct sampling and/or metering of the person's stormwater operations or discharges.
- 4.2.4 Any temporary or permanent obstruction to safe and easy access to the areas to be inspected and/or monitored shall be removed promptly by the person at the written or verbal request of the City of Franklin staff. The costs of clearing such access shall be borne by the person.
- 4.2.5 The Director of Engineering or his designee may inspect the facilities of any user in order to ensure compliance with this ordinance. Such inspection shall be made with the consent of the owner, manager, or signatory official. If such consent is refused, denied or not promptly addressed, the Designated City of Franklin staff may seek issuance of an administrative search warrant.
- 4.2.6 The City of Franklin has the right to determine and impose inspection schedules necessary to enforce the provisions of this article. Inspections may include, but are not limited to, the following:
 - 1. An initial inspection prior to stormwater management plan approval;
 - 2. A bury inspection prior to burial of any underground drainage structure;

3. Erosion control inspections as necessary to ensure effective control of erosion and sedimentation; and
4. A finish inspection when all work, including installation of storm management facilities, has been completed.

Section 5 – Appeals

- 5.1 The Transportation Committee or the Transportation Committee successor shall be charged with addressing appeals to violations of this ordinance.
- 5.2 In order to have an appeal considered, the applicant shall submit a written request as outlined in Section 10.12 of this Ordinance. The committee shall have the authority to grant appeals to violations of this ordinance provided they are consistent with the Objectives and Policies identified in Section 6. The committee does not have the authority to permit actions by the applicant that are based in lack of proper planning or implementation of site development as defined in this ordinance and other measures applied to the City of Franklin.
- 5.3 The committee will be made available to review accepted request(s) for appeals on an as-needed basis. The decisions of the committee are final and conclusive, but may be reviewed through the appropriate court actions. The committee shall make its findings within five (5) business days after the appeal hearing.
- 5.4 If the city prevails, on behalf of the committee's action, in any administrative or civil proceeding initiated under this chapter, the city shall be entitled to seek reimbursement for all costs incurred in connection with said proceeding. Such reimbursable expenses may include, but are not limited to, costs of investigation, administrative overhead, out-of-pocket expenses, costs of administrative hearings, and costs of suit.
- 5.5 The committee meetings, deliberations and records shall be open to the public. The committee may elect to provide for public comment on relevant issues. The format and duration of the public comment shall be left to the discretion of the committee as decided by majority vote.

Section 6 – Objectives and Policy

6.1 Objectives

The objectives of this ordinance are:

- 6.1.1 To protect human life and health.
- 6.1.2 To minimize the need for rescue and relief efforts associated with flooding.
- 6.1.3 To eliminate any non-allowable discharges to Franklin's Municipal Separate Storm Sewer System that impact water quality.
- 6.1.4 To help maintain a stable tax base by providing for the sound use and development of flood-prone areas in such a manner as to maximize beneficial use without increasing flood hazard potential or diminishing the quality of the natural stormwater resources.
- 6.1.5 To ensure that potential homebuyers are notified that property is in a flood area and generally increase the public awareness of flooding potential.
- 6.1.6 To minimize prolonged business interruptions.
- 6.1.7 To minimize damage to public facilities and utilities such as water and gas mains; electric, telephone, and sewer lines; and streets and bridges located in flood plains.
- 6.1.8 To ensure a functional public and private stormwater quantity and quality management system that will not result in excessive maintenance costs.
- 6.1.9 To encourage the use of natural and aesthetically pleasing design that maximize preservation of natural areas.
- 6.1.10 To guide the construction of stormwater management facilities by developing comprehensive master plans to address stormwater quantity and quality.
- 6.1.11 To encourage preservation of floodplains, floodways and open spaces to protect and benefit the community's quality of life and natural resources.
- 6.1.12 To encourage community stewardship of the Franklin's water resources and their impacts on the community character and quality of life.

6.2 Policy Statements and Minimum Standards

To implement the objectives presented above, the following general policy statements shall apply:

- 6.2.1 All new development and redevelopment under the jurisdiction of this ordinance as prescribed in Section 2 of this ordinance shall be required to obtain a Stormwater Management Permit.
- 6.2.1.1 The Director of Engineering shall issue a Stormwater Management Permit for plans that meet the guidelines of this ordinance and any other provision given authority under Section 7 of this ordinance. Application for a permit shall be accompanied by a fee of 100.00.
- 6.2.1.2 Technical, administrative, or procedural matters may be modified as needed to meet the objectives and policies defined in this ordinance, so long as such modifications as to technical, administrative, or procedural matters are not contrary or beyond the intent of the objectives and policies of this ordinance.
- 6.2.1.3 Approved permits must be displayed in a conspicuous location on all active construction sites.
- 6.2.2 A Professional Engineer licensed in the State of Tennessee shall stamp all proposed plans for construction in the City of Franklin. This shall include all proposed improvements or modifications to the existing or new stormwater infrastructure, erosion prevention and sediment control practices, and other related improvements or modifications.
- 6.2.3 If available, each individual project shall be evaluated for consistency with the master stormwater management plan for the major watershed or watersheds within which the project site is located. The individual project evaluation will determine if stormwater quantity and quality management practices can adequately serve the property and limit impacts to downstream public and private properties. The presence of a regional facility(s) will be considered in determining the extent to which quantity and/or quality controls will be necessary.
- 6.2.4 In the absence of such a stormwater quantity and/or quality master plan, a system of uniform requirements shall be applied to each individual project site. In general, these uniform requirements will be based on the criterion that post-development stormwater peak runoff, volume over the critical design-storm period and water quality must not differ significantly from pre-development conditions.
- 6.2.5 Under no circumstances shall a site be graded or drained in such a way as to increase surface runoff to sinkholes, "dry wells" or "drainage wells".
- 6.2.6 Stormwater detention facilities shall be designed to address the rate at which flow is released over the entire runoff discharge period and the volume of discharge

over the critical design-storm period. This shall be applied for 2-, 10-, 25-, 50- and 100-year design-storm events as directed by the next paragraph.

6.2.7 New development shall meet a stormwater quantity level of service defined by:

6.2.7.1 designing road catch basins and connecting culverts to convey the 10-year design-storm runoff.

6.2.7.2 designing bridges, culverts, channels and cross-drains to pass the 25- year design-storm runoff.

6.2.7.3 detaining at least the runoff from a 25-year design-storm runoff (50- or 100-year for ponds serving "critical service roads").

6.2.7.4 providing emergency bypass of 50- and 100-year design storm runoff for all ponds not required to detain the 50 or 100-year design-storm event.

6.2.8 Stormwater infrastructure shall be designed in a way that:

6.2.8.1 critical service roads are not inundated by more than three inches of water over one-half the roadway width under a 100-year design-storm event.

6.2.8.2 other existing roads (as impacted by new or existing development) shall be designed to have no more than 9-inches of runoff overtopping the road under a 25-year design-storm event.

6.2.8.3 other new roads shall be designed to have no more than 6-inches of road overtopping at the 25-year design-storm event.

6.2.9 Development will be required to minimize the impact to stormwater quality by applying structural and/or nonstructural management practices selected to address site-specific conditions. The goal for water quality treatment shall be 90% total suspended solids removal of the first flush, defined by land use characteristics or at least 0.5-inches where not defined, through a BMP Treatment Train.

6.2.10 A long-term maintenance plan shall be submitted for review and approval by the City of Franklin Director of Engineering for all devices or facilities in new development that require more than general maintenance (mowing). The plans shall address schedules and techniques for inspections and removing trash, pollutant and sediment.

6.2.11 For properties where stormwater quantity management practices are either not feasible or are not necessary in lieu of regional stormwater quantity controls, The City has the right to require on-site controls for stormwater quality.

- 6.2.12 The City encourages regional stormwater quantity and/or quality management practices, serving 40 to 300 acres of tributary area, which may be consistently and efficiently managed and maintained. These type of practices will be encouraged in order to replace or reduce the implementation of on-site stormwater quantity and/or quality management practices, as appropriate as determined by the Director of Engineering.
- 6.2.13 Redevelopment of properties containing on-site stormwater management practices may be permitted, at the discretion of the Director of Engineering, provided the property and downstream public and private properties, infrastructure or "Waters of the State" are adequately protected by a regional facility(s) from stormwater quantity or quality impacts.
- 6.2.14 No construction, whether by private or public action, shall be performed in a manner that will negatively impact stormwater quantity or quality in its vicinity or in other areas whether by flow restrictions, increased runoff, or by diminishing channel or floodplain storage capacity.
- 6.2.15 New construction may not aggravate upstream or downstream flooding. Existing downstream or upstream problems may be required to be corrected in conjunction with new development.
- 6.2.16 Unwarranted acceleration of erosion or sedimentation, or transport of other pollutants or forms of pollution, due to various land development activities must be controlled.
- 6.2.17 New construction shall only be permitted after temporary or permanent erosion prevention and sedimentation control management practices have been placed or constructed and are operational to The City's satisfaction. The City may stop construction on properties, or administer other enforcement actions as defined in Section 8, that do not have adequate erosion prevention and sedimentation control measures.
- 6.2.18 Soil bioengineering, "green" and other "soft" slope and streambank stabilization methods shall receive preference over rip rap, concrete and other hard armoring techniques. "Hard" alternatives shall only be permitted when their necessity can be demonstrated given site-specific conditions.
- 6.2.19 The City may require more stringent erosion prevention and sedimentation control practices on properties within sensitive (or impaired) watersheds proximate to "Waters of the State". This may include measures that limit or eliminate, with a greater safety factor, the potential for sediment or other form of water pollution from entering sensitive areas as designated by the Tennessee Department of Environment and Conservation.

- 6.2.20 The City may require maintenance or modification of stormwater management practices that are not operating within the guidelines established by this ordinance, as determined by the City of Franklin staff.
- 6.2.21 All active construction sites should be inspected periodically (weekly and within 24-hours after a 0.25-inch rain event) by the owner, or their qualified designate, to ensure erosion prevention and sedimentation control. It is not The City's intent to penalize proper maintenance and mitigation of failed management practices, but rather to ensure that potential and actual failures are promptly recognized and addressed expeditiously and effectively. The City may stop construction on properties, or administer other enforcement actions as defined in Section 8, that do not or are not able to provide on-site documentation that proper inspection and maintenance activities were performed on erosion prevention and sedimentation control measures.
- 6.2.22 The City of Franklin encourages the use of greenway right-of-ways for appropriate properties.
- 6.2.23 A waterway buffer shall be applied to all waterways serving more than 25.0 acres of tributary area. No new construction of any building or structure shall be permitted in the buffer.
- 6.2.23.1 Automatic exemptions are applied provided EP&SC, water quality and cut-fill policies are adequately addressed. They shall be permitted for:
- 6.2.23.1.1 roads and utilities crossing waterways.
- 6.2.23.1.2 pedestrian trails and walkways proximate to waterways.
- 6.2.23.2 The waterway buffer shall be defined as area contained within a boundary established 25-feet beyond the floodplain boundary as defined by FEMA or the City of Franklin which ever is larger.
- 6.2.23.3 For areas without a defined floodplain the waterway buffer shall be defined by a graduated scale applied by the City of Franklin according to the provisions in Section 7 of this ordinance.
- 6.2.23.4 The waterway buffer and floodplain may be used for application of water quality devices. This may only be permitted provided EP&SC, water quality, and cut-fill policies are adequately addressed as determined by the City of Franklin according to the provisions in Section 7 of this ordinance. Detention/retention volumes in the floodplain may count as fill if applied in a manner where floodplain storage is lost.

- 6.2.24 Cut and fill will be permitted in the floodplain and waterway buffer. Compensatory cut shall at least be applied in equal amounts (1:1) for all fill in the floodplain. Compensatory cut shall at least be applied to one hundred fifty-percent (1.5:1) for all fill in floodplains with waterway reaches determined to be impacted by localized flooding not dominated by waterway backwater effects, as determined by studies accepted or performed by the City of Franklin.
- 6.2.25 The City of Franklin may apply incentives for floodplain management strategies applied beyond those required by this ordinance.
- 6.2.25.1 Strategies beyond those required may include, but not limited to:
- 6.2.25.1.1 Extra (20-percent more than required) floodplain storage developed (cut)
 - 6.2.25.1.2 Greenways that are dedicated to the City of Franklin
 - 6.2.25.1.3 Eroding waterways are restored or stabilized with bioengineering or "green" approaches
 - 6.2.25.1.4 New and innovative technologies are applied to address water quantity or quality
 - 6.2.25.1.5 Other management strategies acceptable to the City of Franklin according to the provisions in Section 7 of this ordinance
- 6.2.25.2 If the above management strategies are applied in a manner acceptable to the City of Franklin, then the city may apply incentives including, but not limited to:
- 6.2.25.2.1 Modification to density, trees or other development requirements acceptable to the Director of Engineering and Planning Departments
 - 6.2.25.2.2 Other incentives according to the provisions in Section 7 of this ordinance
- 6.2.26 The construction and financing of any required off-site drainage improvement necessitated by private development within the same watershed shall be the responsibility of the developer.
- 6.2.27 Any stormwater management facility or BMP which services individual property owners or subdivisions shall be privately owned with general routine maintenance (controlling vegetative growth and removing debris) provided for by the owner(s).

The owner shall maintain a perpetual, non-exclusive easement, which allows for access for inspection and other maintenance by the City of Franklin.

6.2.28 Any stormwater management facility or BMP which services an individual subdivision in which the facility or BMP is within designated open areas or an amenity with an established home owners association shall be privately owned and maintained consistent with provisions of this ordinance. The owner shall maintain a perpetual, nonexclusive easement which allows for access for inspection and emergency maintenance by the City of Franklin.

6.2.29 Any stormwater management facility or BMP which services commercial and industrial development shall be privately owned and maintained. The city has the right, but not the duty to enter premises for emergency repairs.

he Director of Engineering and 6.2.30 All regional stormwater management control facilities proposed by the owners, if *accepted by* approved by the Board of Mayor and Aldermen and ~~accepted by the Director of Engineering~~ for dedication as a public regional facility, shall be publicly owned and/or maintained.

6.2.31 All other stormwater management control facilities and BMP's shall be publicly owned and/or maintained only if accepted for maintenance by the city.

6.2.32 The Director of Engineering may require dedication of privately owned stormwater facilities, which discharge to the city's stormwater system.

6.2.33 As new development construction is completed, an "as-built" plan, certified by a licensed professional engineer and/or surveyor as appropriate, must be submitted upon completion of the stormwater management facilities included in the stormwater management plan. The licensed professional shall certify that: the facilities have been constructed as shown on the "as-built" plan, and facilities meet the approved stormwater management plan and specifications, or achieve the function for which they were designed. Coordinate data shall be presented in the State of Tennessee Plane system with the North American Datum 1983 (NAD83) and North American Vertical Datum (NAVD) of 1988.

Section 7 – Enforcement and Rule-Making Authority

- 7.1 The Director of Engineering shall have authority to implement this Ordinance by appropriate regulations, guidance or other related materials. In this regard, technical, administrative, or procedural matters may be modified as needed to meet the objectives and policies defined above, so long as such modifications as to technical, administrative, or procedural matters are not contrary or beyond the intent of the objectives and policies defined above.
- 7.2 Documents referenced above may be updated periodically to reflect the most current and effective practices and shall be made available to the public. However, the failure to update the manual shall not relieve any applicant from the obligation to comply with the Stormwater Management Ordinance, and shall not prevent the Director of Engineering from imposing the most current and effective practices.
- 7.3 Regulations, guidance or other related materials that may be given authority by this ordinance may include, but are not limited to: Best Management Practice (BMP) manuals, design regulations and requirements, submittal checklists, review checklists, inspection checklists, certifications, stormwater management manuals and operation and maintenance manuals. The document(s) may include information deemed appropriate by the Director of Engineering including guidance and specifications for the preparation of stormwater management plans, selecting environmentally sound practices for managing stormwater, minimum specifications and requirements, more complete definitions and performance standards.
- 7.4 The above referenced documents shall not in any way require specific commercially available products. However, they may refer to performance specifications, class of devices, construction, or management practice.

Section 8 - Maintenance Requirements

- 8.1 The maintenance responsibilities for permanent stormwater runoff control facilities shall be determined based upon the type of ownership of the property which is controlled by the facilities.
- 8.2 Single entity ownership – Where the permanent stormwater runoff control facilities are designed to manage runoff from property in a single entity ownership as defined below, the maintenance responsibility for the stormwater control facilities shall be with the single entity owner.
 - 8.2.1 The stated responsibilities of the entity in terms of owning and maintaining the facilities shall be submitted with the stormwater management plan for determination of their adequacy. Approval of the stormwater management plan shall be conditioned upon the approval of these terms. These terms shall be in writing, shall be in recordable form, and shall, in addition to any other terms deemed necessary by the City of Franklin, contain a provision permitting inspection at any reasonable time by the Director of Engineering of all such facilities deemed critical in the public welfare.
 - 8.2.2 A single entity shall be defined as an association, public or private corporation, partnership firm, trust, estate or any other legal entity allowed to own real estate exclusive of an individual lot owner.
 - 8.2.3 Upon approval of the stormwater management facilities by the City of Franklin, the facility owner(s) shall demonstrate the ability to garner and apply the financial resources necessary for long-term maintenance requirements. The funding mechanism shall be in a form approved by the City of Franklin. The City of Franklin will only approve funding mechanism(s) for long-term maintenance responsibilities that can be demonstrated to be permanent or transferable to another entity with equivalent longevity.
 - 8.2.4 Unless made specifically clear in the preliminary stages of the site design and construction plan review procedure, it will be assumed that all stormwater detention, retention, treatment or storage facilities and/or devices shall be owned, operated and maintained by a single entity as defined above.
- 8.3 Municipal ownership – Where the City of Franklin has accepted an offer of dedication of the permanent stormwater management facilities, the City of Franklin shall be responsible for maintenance.
- 8.4 Construction maintenance bond – The City of Franklin may require the posting of a maintenance bond to secure the structural integrity of said facilities as well as

the functioning of said facilities in accordance with the design and specifications as depicted on the approved stormwater management plan for a term of 18 months from the date of acceptance of dedication. A cash contribution can be used as the financial in lieu of a maintenance bond although the contribution must be equivalent to the amount that would be estimated for the maintenance bond.

Section 9 - Allowable Stormwater Discharges

- 9.1 Pursuant to the National Pollutant Discharge Elimination System (NPDES) Municipal Separate Storm Sewer System (MS4) program administered by the Tennessee Department of Environment and Conservation (TDEC) illicit discharges to the MS4 are being defined as illegal. This is being done by identifying allowable non-stormwater discharges into the MS4 in the best interest of the City of Franklin, Tennessee.
- 9.2 Non-stormwater discharge means any discharge to the Municipal Separate Storm Sewer System except as permitted by 9.4
- 9.3 Except as hereinafter provided, all non-stormwater discharges into the Municipal Separate Storm Sewer System are prohibited and declared to be unlawful.
- 9.4 Unless the Director of Engineering has identified them as a source of pollutants to the "Waters of the State of Tennessee", the following non-stormwater discharges into the Municipal Separate Storm Sewer System are lawful:
 1. Discharges from emergency fire fighting activities
 2. Diverted screen flows
 3. Rising ground waters
 4. Uncontaminated groundwater infiltration to separate storm sewer systems (as defined by 40 CFR35.2005(20))
 5. Uncontaminated pumped ground water
 6. Discharges from potable water sources as required for system maintenance
 7. Drinking water line flushing
 8. Foundation drains and pumps
 9. Air conditioning condensate
 10. Landscape irrigation
 11. Irrigation water
 12. Lawn watering
 13. Uncontaminated springs
 14. Water from crawl space pumps
 15. Uncontaminated Footing drains and pumps
 16. Individual residential car washing
 17. Flows from riparian habitats and wetlands
 18. Dechlorinated swimming pool discharges
 19. Street wash waters resulting from normal street cleaning operations
 20. Controlled flushing stormwater conveyances (controlled by appropriate best management practices)
 21. Discharges within the constraints of a National Pollutant Discharges Elimination System (NPDES) permit from the Tennessee Department of Environment and Conservation (TDEC)
 22. Discharges approved at the discretion of the Director of Engineering.

Section 10 – Enforcement

The city may institute appropriate actions or proceedings at law or equity for the enforcement of this Ordinance. Any court of competent jurisdiction shall have the right to issue restraining orders, temporary or permanent injunctions, and other appropriate forms of remedy or relief. Each day of noncompliance is considered a separate offense; and nothing herein contained shall prevent the city from taking such other lawful action as is necessary to prevent or remedy any violation, including application for injunctive relief. Any of the following enforcement remedies and penalties shall be available to the City of Franklin in response to violations of this ordinance. If the person, property or facility has or is required to have a storm water discharge permit from the Tennessee Department of Environment and Conservation, the city shall alert the appropriate state authorities of the violation.

- 10.1 Notice of violation (NOV) – Whenever designated City of Franklin staff find that any person, company or facility owning or occupying a premises has violated or is violating this Ordinance or order issued hereunder, the enforcement official may serve, by personal service, or by registered or certified mail, upon said person a written NOV. Within thirty (30) days of the receipt of this notice, or shorter period as may be prescribed in the NOV, an explanation of the violation and a plan for the satisfactory correction and prevention thereof, which shall include specific required actions, shall be submitted to the Director of Engineering or his/her designee. Submission of this plan shall in no way relieve liabilities for violations occurring before or after receipt of the NOV.
- 10.2 Revocation of permit – The Director of Engineering, or his/her designee may revoke and require the return of a permit or certificate by notifying the permit holder in writing, stating the reason for the revocation. Permits or certificates shall be revoked for any substantial departure from the approved application plans, or specifications; refusal or failure to comply with the requirements of state or local law; or for false statements or misrepresentations made in securing the permit or certificate. Any permit or certificate mistakenly issued in violation of any applicable state or local law may also be revoked.
- 10.3 Compliance order – If any person, company or facility shall violate the provisions of this ordinance, the Director of Engineering, or his/her designee, may give notice to the owner or to any person in possession of the subject property, ordering that all unlawful conditions existing thereupon be abated within a schedule defined from the date of such notice.
 - 10.3.1 The enforcement official shall have the authority to establish elements of a stormwater pollution prevention plan, and to require any business to adopt and implement such a plan, as may be reasonably necessary to fulfill the purposes of this chapter. The enforcement official may establish the requirements of best management practices for any premises.

10.3.2 The notice and order may be given provided, that if, in the opinion of the Director of Engineering, or his/her designee, the unlawful condition is such that it is of imminent danger or peril to the public, then an authorized City of Franklin representative may, without notice, proceed to abate the same, and the cost there of shall be charged against the property. The City of Franklin, as described further in this subsection, may recover the cost of such actions from the property owner.

10.4 Civil Penalties – Any person, company or facility who has been found to have been in violation of any provision of this ordinance, may be assessed a civil penalty not to exceed the amount presented in this subsection.

10.4.1 The penalty shall increase by twenty-five percent (25%) of the previous penalty amount for every subsequent but separate offense made by the same person, company or facility. The penalty shall be additional to other enforcement actions of this section.

10.4.2 The penalty may be assessed for each day beyond schedules applied in compliance orders or other schedules issued to the property owner or other person responsible for unauthorized activity defined in this ordinance.

10.4.3 In determining the amount of the penalty the city court shall consider the following:

10.4.3.1 The degree and extent of the harm to the natural resources, to the public health, or to the public or private property resulting from the violation;

10.4.3.2 The duration and gravity of the violation;

10.4.3.3 The effect on ground or surface water quality;

10.4.3.4 The cost of rectifying the damage;

10.4.3.5 The amount of money saved by noncompliance;

10.4.3.6 Whether the violation was committed willfully or intentionally;

10.4.3.7 The cumulative effect of other enforcement actions applied for the same offense;

10.4.3.8 The prior record of the violator in complying or failing to comply with the stormwater quality management program; and

10.4.3.9 The costs of enforcement to the City of Franklin.

10.4.4 The maximum civil penalties will be determined by the type of offense. This indicates the maximum that may be imposed for a first offense and does not reflect the increases described above for repeat offenses.

10.4.4.1 Development without permit – \$10,000 – To engage in any development, use, construction, remodeling, or other activity of any nature upon land or improvements thereon subject to the jurisdiction of this ordinance without all required permits, certificates, or other forms of authorization as set forth in this ordinance.

10.4.4.2 Development inconsistent with permit – \$5,000 – To engage in any development, use, construction, remodeling, or other activity of any nature in any way inconsistent with any approved plan, permit, certificate, or other form of authorization granted for such activity.

10.4.4.3 Violation by act or omission – \$5,000 – To violate, by act or omission, any term, variance, modification, condition, or qualification placed by the City of Franklin or its agent departments upon any required permit, certificate, or other form of authorization of the use, development, or other activity upon land or improvements thereon.

10.4.4.4 Illicit Discharge – \$5,000 – Any person, company or facility who is found to have improperly disposed of any substance that is not defined in Section 9 or causes the city to be in noncompliance with any applicable environmental permit.

10.4.4.5 Household Products- \$500- Any person, company or facility who is found to have improperly disposed of any substance not included in Section 9 that was purchased over-the-counter for household use, in quantities considered normal for household purposes, which, upon discharge to the municipal separate storm sewer system or drainage network, would have an adverse impact on water quality or cause the city to be in noncompliance with any applicable environmental permit.

10.4.5 In the event there are penalties assessed by the state against the city caused by any person company or facility, said person, company or facility shall be assessed the equivalent amount of civil penalty. This shall include but is not limited to penalties for improper disposal or illegal dumping, or illicit connection into the municipal separate storm sewer system.

10.5 Administrative Fee – Any person, company or facility who undertakes any development activity requiring a stormwater management plan hereunder without

first submitting the plan for review and approval shall pay to the city, in addition to any permit or inspection fee, an administrative fee of up to \$5,000.

- 10.6 Order to clean and abate / restore – Any violator may be required to clean and/or restore land to its condition prior to the violation.
- 10.7 Cost Recovery - If corrective action, including maintenance delinquency, is not taken in the time specified, or within a reasonable time if no time is specified, Franklin may take the corrective action, and the cost of the corrective action shall be the responsibility of the owner and the developer. The cost of the abatement and restoration shall be borne by the owner of the property and the cost therefor shall be invoiced to the owner of the property. If the invoice is not paid within ninety (90) days, the enforcement official shall have the authority to place a lien upon and against the property. If the lien is not satisfied within ninety (90) days, the enforcement official is authorized to take all legal measures as are available to enforce the lien as a judgment, including, without limitation, enforcing the lien in an action brought for a money judgment, by delivery to the assessor or a special assessment against the property.
- 10.8 Injunctions and or proceedings at law or in equity – Any violation of this Ordinance or of any condition, order, requirement, or remedy adopted pursuant hereto may be restrained, corrected, abated, mandated, or enjoined by other appropriate proceeding pursuant to state law.
- 10.9 Fee or utility credit revocation – This enforcement tool is intended to be available or used if there are, at any time, provisions for a funding mechanism managed by the City of Franklin. This enforcement tool permits that credits or other measures to reduce fees or utility charges may be revoked, in full or in part, if any provision of the *Stormwater Management Ordinance*, or given authority per Section 7, are violated.
- 10.10 Civil Actions – In addition to any other remedies provided in this chapter, any violation of this chapter may be enforced by civil action brought by the city attorney. Monies recovered under this subsection shall be paid to the city to be used exclusively for costs associated with implementing or enforcing the provisions of this ordinance. In any such action, the city may seek, as appropriate, any or all of the following remedies:
 - 10.10.1 A temporary and/or permanent injunction;
 - 10.10.2 Assessment of the violator for the costs of any investigation, inspection, or monitoring survey which lead to the establishment of the violation, and for the reasonable costs of preparing and bringing legal action under this subsection;

- 10.10.3 Costs incurred in removing, correcting, or terminating the adverse effects resulting from the violation;
- 10.10.4 Compensatory damages for loss or destruction to water quality, wildlife, fish and aquatic life.
- 10.11 Emergency Orders and Abatements. The enforcement official may order the abatement of any discharge from any source to the stormwater conveyance system when, in the opinion of the enforcement official, the discharge causes or threatens to cause a condition which presents an imminent danger to the public health, safety, or welfare, or the environment, or a violation of a NPDES permit. In emergency situations where the property owner or other responsible party is unavailable and time constraints are such that service of a notice and order to abate cannot be effected without presenting an immediate danger to the public health, safety, or welfare, or the environment or a violation of a NPDES permit, the city may perform or cause to be performed such work as shall be necessary to abate said threat or danger. The costs of any such abatement shall be borne by the owner and shall be collectable in accordance with the provisions of this subsection.
- 10.12 Appeals - Upon issuance of a citation or notice of violation of this article it shall be conclusive and final unless the accused violator submits a written notice of appeal to the Director of Engineering within ten (10) days of the violation notice being served. If the Director of Engineering does not issue a decision within ten (10) days of the written notice of appeal then the violation is considered upheld. If the Director of Engineering does not reverse the decision, the aggrieved party may appeal to the Transportation Committee or successor, by filing a written request for hearing within ten (10) days of the Director of Engineering's decision on the appeal. The request for hearing shall state the specific reasons why the decision of the Director of Engineering is alleged to be in error, and shall be accompanied by a cost bond in the amount of five hundred dollars (\$500.00) with sufficient surety to secure the costs of the appeal, including the cost of court reporters, transcripts, plan reviews and other costs.

Section 11 – Severability

- 11.1 Should any article, section, subsection, clause or provision of this Comprehensive Stormwater Management Ordinance be declared by a court of competent jurisdiction to be unconstitutional or invalid, such decision shall not affect the validity of the ordinance as a whole or any part thereof other than the part declared to be unconstitutional or invalid, each article, section clause and provision being declared severable.
- 11.2 If any provisions of this ordinance and any other provisions of law impose overlapping or contradictory regulations, or contain any restrictions covering any of the same subject matter, that provision which is more restrictive or imposes higher standards or requirements shall govern.

ORDINANCE 2002-14

TO BE ENTITLED, "AN ORDINANCE TO ESTABLISH A STORMWATER USER FEE FOR THE CITY OF FRANKLIN ESTABLISHING EQUIVALENT RESIDENTIAL UNIT (ERU), ERU RATE AND UNDISTURBED PROPERTY RATE; AND PROVIDING AN EFFECTIVE DATE."

WHEREAS, the City of Franklin Board of Mayor and Aldermen (Board) desire to provide effective stormwater management for all citizens of the City of Franklin to protect, to the extent practicable, from the loss of life and property damage from flooding; and to minimize, to the extent practicable the impact to surface water quality from urban runoff; and

WHEREAS, the benefits of flood control and surface water quality extend to all citizens and business in the City of Franklin; and

WHEREAS, the City of Franklin has been mandated by the United States Environmental Protection Agency to obtain and maintain a permit from the State of Tennessee for discharges from its stormwater management system; and

WHEREAS, the Board has established a comprehensive Stormwater Management Ordinance as found in Chapter 16 that requires certain stormwater management practices be implemented by, and for the City of Franklin; and

WHEREAS, the Board desires to provide a fair, equitable and dependable source of funds to manage the stormwater program in Franklin consistent with federal and state law and our local ordinance;

NOW THEREFORE BE IT ORDAINED by the Board of the City of Franklin, State of Tennessee, establish a Stormwater User Fee as follows:

Section 1: Definitions. For the purpose of this Chapter, the following definitions shall apply; words used in the singular shall include the plural, and the plural, the singular; words used in the present tense shall include the future tense. The word "shall" is mandatory and not discretionary. The word "may" is permissive. Words not defined herein shall be construed to have the meaning given by common and ordinary use as defined in the latest edition of Webster's Dictionary.

"Board" means the City of Franklin Board of Mayor and Aldermen.

"Bonds" means revenue bonds, notes, loans or any other debt obligations issued or incurred to finance the Costs of Construction.

"Calendar Year" means a 12-month period commencing on the first day of January of any year.

"Costs of Construction" means costs reasonable incurred in connection with providing capital improvements to the System or any portion thereof, including, but not limited to, the costs of (1) acquisition of all property, real or personal, and all interests in connection therewith including all rights-of-way and easements therefore, (2) physical

construction, installation and testing, including the costs of labor, services, materials, supplies and construction services used in connection therewith, (3) architectural, engineering, legal and other professional services, (4) insurance premiums taken out and maintained during construction, to the extent not paid for by a contractor for construction, (5) any taxes or other charges which become due during construction, (6) expenses incurred by the City or on its behalf with its approval in seeking to enforce any remedy against any contractor or sub-contractor in respect of any default under a contract relating to construction, (7) principal of and interest of any Bonds, and (8) miscellaneous expenses incidental thereto.

"Debt Service" means, with any particular series of Bonds, an amount equal to the sum of (i) all interest payable on such Bonds during such Calendar Year, plus (ii) any principal installments of such Bonds during such Calendar Year.

"Developed Property" means real property other than Undisturbed Property and Vacant Improved Property.

"Director" means the Director of Engineering, or his designee.

"Dwelling Unit" means a singular unit or apartment providing complete, independent living facilities for one or more persons including permanent provisions for living, sleeping, eating, cooking and sanitation.

"Equivalent Residential Unit" or ERU means the average Impervious Area of Residential Developed Property per Dwelling Unit located within the City and as established by the Board.

"ERU Rate" means a Utility Fee charged on each ERU as established by Board.

"Exempt Property" means public rights of way, public streets, public alleys and public sidewalks.

"Extension and Replacement" means costs of extensions, additions and capital improvements to, or the renewal and replacement of capital assets of, or purchasing and installing new equipment for, the System, or land acquisitions for the System and any related costs thereto, or paying extraordinary maintenance and repair, including the Costs of Construction, or any other expenses which are not costs of Operation and Maintenance or Debt Service.

"Fiscal Year" means a 12-month period beginning July 1 and ending June 30.

"Impervious Area" means the number of square feet of hard surfaced areas which either prevent or retard the entry of water into soil mantle, as it entered under natural conditions as Undisturbed Property, and/or causes water to run off the surface in greater quantities or at an increased rate of flow from that present under natural conditions as Undisturbed Property, including, but not limited to, roofs, roof extensions, patios, porches, driveway, sidewalks, pavement and athletic courts.

"Nonresidential Developed Property" means developed property that is not utilized for dwelling units within the City.

"Operating Budget" means the annual operating budget adopted by the City for the succeeding Fiscal Year.

"Operations and Maintenance" means the current expenses, paid or accrued, of operation, maintenance and current repair of the System, as calculated in accordance with sound accounting practice, and includes, without limiting the generality of the foregoing, insurance premiums, administrative expenses, labor, executive compensation, and cost of materials and supplies used for current operations, and charges for the accumulation of appropriate reserves for current expenses not annually incurred, but which are such as may reasonably be expected to be incurred in accordance with sound accounting practice.

"Revenues" mean all rates, fees, assessments, rentals or other charges or other income received by the Stormwater User Fee Fund, in connection with the management and operation of the System, including amounts received from the investment or deposit of monies in any fund or account and any amounts contributed by the City, all as calculated in accordance with sound accounting practice.

"Stormwater Management System" or **"System"** means the existing storm water management of the City and all improvements thereto which by this Chapter are constituted as the property and responsibility of the City, to be operated as an enterprise fund to, among other things, conserve water, control discharges necessitated by rainfall events, incorporate methods to collect, convey, store, absorb, inhibit, treat, use or reuse water to prevent or reduce flooding, over-drainage, environmental degradation and water pollution or otherwise affect the quality and quantity of discharge from such System.

"Stormwater User Fee" means a fee authorized by Ordinance(s) established to pay Operations and Maintenance, Extension and Replacement and Debt Service.

"Stormwater User Fee Fund" means the Special Revenue Fund created by this Chapter to operate, maintain and improve the System and for such other purposes as stated in this Chapter.

"Undisturbed Property" means real property, which has not been altered from its natural state by dredging, filling, removal of trees and vegetation or other activities, which have disturbed or altered the topography or soils on the property.

"User Fee District" means the area or property within the Corporate Limits of the City of Franklin.

"Vacant Improved Property" means vacant property, which is, or could reasonably be, served by any subdivision improvements that allow egress.

Section 2: Fee Established. Subject to the provisions of this Chapter, each and every Residential Developed Property, Nonresidential Developed Property and Vacant Improved Property, other than Exempt Property, within the Corporate Limits of the City, and the owners and non-owner users thereof, have imposed upon them a Stormwater User Fee. In the event the owner and non-owner users of a particular Property are not the same, the liability for each the owner and non-owner user for the User Fee attributable to that Property shall be joint and several. The Stormwater User Fee shall be a monthly or a regular interval service charge and shall be determined by

the provisions of this Chapter and the ERU and ERU Rate which shall be established and changed from time to time by the Board of Mayor and Aldermen.

Section 3: Stormwater User Fee Collection. The Stormwater User Fee for residential property shall be billed and collected monthly with the monthly utility services bill for those properties within the Corporate Limits of the City. The Stormwater User Fees non-residential properties shall be billed and collected separately. The Stormwater User Fee for those properties utilizing City utilities is part of a consolidated statement for utility customers, which is generally paid by a single payment to the utility department. In the event that a partial payment is received, the payment shall be applied pro-rata to each account billed on the consolidated statement in the proportion that an individual account bears to the total consolidated statement of all current charges for all accounts. All bills for the Stormwater User Fees shall become due and payable in accordance with the rules and regulations of the Utilities Department pertaining to the collection of the Stormwater User Fees. The City may discontinue utility service to any Stormwater user who fails or refuses to pay the Stormwater User Fees and may refuse to accept payment of the utility bill from any user without receiving at the same time, payment of the Stormwater User Fee charges owed by such user and may refuse to reestablish service until all such fees have been paid in full. Unpaid and overdue balances shall be charged a 10% annual interest fee.

Section 4: User Fee Determination. There is hereby established the following uniform schedule of rates for the services and use of facilities of the Stormwater Management System by the owner, tenant, or occupant of the premises using the services and facilities of said system:

- (a) The Board, upon recommendation of the Director, shall establish reasonable rates for the Stormwater Management Systems for each single family residence: each single family residence shall be billed at a flat fee established by the Board for an equivalent residential unit (ERU). -
- (b) Parcels which are undisturbed shall be assessed a Stormwater User Fee. The bill shall be determined by dividing the total land area of the property, in square feet, by the area of an equivalent residential unit times a correction factor. The correction factor shall be based on the relative volume of runoff from an undeveloped property and that of a typical single-family residence, under typical hydrologic conditions.
- (c) For all nonresidential properties, that is enterprise, business establishment, building, or other occupancy not covered by subsections (a) and (b) of this section, the rate shall be computed based on the total impervious area of the property divided by the average impervious area of an equivalent residential unit times the rate established for an equivalent residential unit. The billing amount shall be updated by the Director based

on any additions to the impervious areas as approved through the building permit process.

Section 5: ERU Established. The Equivalent Residential Unit is hereby established to be 2,714 square feet of impervious area.

Section 6: ERU Rate Established. The ERU Rate to be charged for Stormwater Management Utility Fees for each ERU is hereby established to be \$4.00 per month.

Section 7: Undisturbed Property Correction Factor Established. The Undisturbed Property Correction Factor to be charged for Stormwater Management Utility Fees for each acre of Undisturbed Property is hereby established to be 0 percent.

Section 8: BE IT FINALLY ORDAINED by the Board of Mayor and Aldermen of the City of Franklin, Tennessee, that this Ordinance shall take effect and be in force as of January 1, 2003, which is from and after the date of its passage on second and final reading, the health, safety and welfare of the citizens of Franklin requiring it.

ATTEST:

CITY OF FRANKLIN, TENNESSEE

By: 
JAMES R. JOHNSON
City Administrator

By: 
JERRY W. SHARBER
Mayor

PASSED FIRST READING: June 11, 2002

PASSED SECOND AND FINAL READING: September 10, 2002

**ORDINANCE 2004-25
AS AMENDED**

**TO BE ENTITLED, "AN ORDINANCE TO ESTABLISH A
STORMWATER USER FEE FOR THE CITY OF FRANKLIN
ESTABLISHING EQUIVALENT RESIDENTIAL UNIT (ERU), ERU
RATE AND UNDISTURBED PROPERTY RATE, PROVIDING AN
EFFECTIVE DATE AND AMENDING SECTIONS 16-804, 16-805,
16-806, OF THE FRANKLIN MUNICIPAL CODE TO PROVIDE
EXCEPTIONS OR ADJUSTMENTS AND TO CREATE A
PROCEDURE FOR APPEAL OF STORMWATER USER FEE
DETERMINATIONS."**

SECTION I: BE IT ORDAINED by the Board of Mayor and Aldermen of the City of Franklin, Tennessee, that Section 16-804 of the Franklin Municipal Code is hereby amended to replace subsection (1) and to add new sub-sections (4), (5), (6), and (7) to read as follows:

16-804. User fee determination

(1) The Board, upon recommendation of the Director, shall establish reasonable rates for Stormwater Management Systems for each single family residence: each single family residence shall be billed at a flat fee based on two tiers (described in **Section 16-806 below**) established by the Board for an equivalent residential unit (ERU).

* * *

(4) Users whose stormwater runoff is not discharged into or through the stormwater and/or flood control facilities of the city shall be exempt from paying the user fee.

(5) Users who construct or have constructed facilities to retain and control the quantity and/or quality of stormwater runoff from their property may be entitled to a reduction or adjustment of the fees due, based upon reasonable criteria developed by the director.

(6) Any person who disagrees with the calculation of the stormwater user's fee determined by the stormwater management coordinator, or who seeks fee adjustments or exemption, may appeal such determination to the Director. An appeal shall be accompanied by a fee of \$100, filed in writing, and include a written statement of the grounds for the appeal, with reference to the Franklin Stormwater Management Credit and Appeal Manual or other appropriate documents available from the engineering department. The Director will review the appeal and render a decision within thirty (30) days. The Director's decision shall be in writing and mailed or hand-delivered to the address of the applicant contained in the appeal. In response to an appeal the Director may adjust the stormwater service fee applicable to a property in conformance with the general purpose and intent of this chapter.

(7) A decision of the Director adverse to an appellant may be further appealed to the Public Transportation Advisory Committee, or any successor committee charged by the Board with hearing stormwater matters, within thirty (30) days of receipt of notice of the adverse decision, by filing a written request for hearing. The committee shall convene a hearing within a reasonable time thereafter. The request for hearing by the transportation committee shall state the specific reasons why the decision of the Director is alleged to be in error, and shall be accompanied by a cost bond in the amount of five hundred dollars (\$500.00) with sufficient surety to secure the costs of the appeal, including the cost of court reporters, transcripts, plan reviews and other costs. The cost bond shall be refunded to appellant if appellant prevails. The committee shall make its findings

within five (5) business days after the appeal hearing. The decisions of the committee are final and conclusive, but may be reviewed through appropriate court actions.

SECTION II: BE IT ORDAINED by the Board of Mayor and Aldermen of the City of Franklin, Tennessee, that Section 16-805 and 16-806 of the Franklin Municipal Code is hereby amended to replace sections 16-805, 16-806, and add new sub-sections (1) and (2) to read as follows:

16-805. ERU established

ERU Established. The Equivalent Residential Unit is hereby established to be 3,350 square feet of impervious area.

16-806. ERU rate and tiers established

- (1) **Intent.** The Board of Mayor and Aldermen intend to establishing a base rate and tiers so that application of the rate and tiers leads to a fair and equitable result, collecting fees proportionally to the amount of actual use of stormwater facilities. The fee structure reflects different categories of use and tiers using commonly accepted statistical principles to achieve such equitable results.
- (2) **ERU Rate Established.** The ERU Rate to be charged for Stormwater Management User Fees for each ERU is hereby established to be \$3.65 per month, and delete the \$250,000 annual appropriation from the general fund.

*

*

*

(a) Two Tier Residential ERU Established. Residential properties will be separated into two tiers: residential units smaller than 3,350 square feet will pay .75% of the ERU Rate per month and residential units larger than 3,350 square feet will pay 1.2% of the ERU Rate per month.

(b) Non-Residential Properties Established. Non-Residential properties will pay monthly the ERU Rate times the actual square footage of impervious surface area divided by the ERU.

Section III: BE IT FINALLY ORDAINED by the Board of Mayor and Aldermen of the City of Franklin, Tennessee, that this Ordinance shall take effect and be in force as of May 1, 2004, which is from and after the date of its passage on second and final reading, the health, safety and welfare of the citizens of Franklin requiring it.

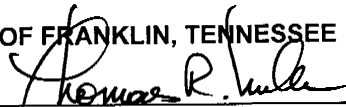
ATTEST:

By:


JAMES R. JOHNSON
City Administrator

CITY OF FRANKLIN, TENNESSEE

By:


THOMAS R. MILLER
Mayor

PASSED FIRST READING: FEBRUARY 10, 2004

PASSED SECOND READING: MARCH 9, 2004

Stormwater Management

The question tonight is not **whether** to create a Stormwater Utility, but **when**, and to what level of operation and management we choose to obtain. The City of Franklin has a federal mandate to institute a stormwater management program. This is one of those mandates that is sent to municipalities without federal funding. We have no choice but to fund this initiative at the local level. It is not optional! The program that is proposed is as fair to everyone as possible and all citizens will participate, residents and businesses alike. It will only bring the City up to a moderate level of compliance – we will still have a long way to go to reach a superior compliance status. The program includes significant opportunities for existing businesses and the development community to receive credits for appropriate mitigation of stormwater issues, and we are proposing tonight the establishment of a Board of Stormwater Appeals to hear and rule on all applications for credit.

Our internal staff will be able to handle some of the minor improvement projects and the maintenance of our stormwater infrastructure, but this will require additional personnel and equipment on an annual basis going forward. Major projects will require outside consulting and construction costs significantly over and above whatever a rate structure will raise. As an example, the City is currently engaged in the design of a major stormwater detention facility near Franklin Road at Moore's Lane. We have received a one-time federal grant of \$1.3 million toward this project, but our local match will require an additional \$1.7 million. This money will **not** come out of the stormwater rate fees, but will require a general revenue bond for funding which will have to be repaid out of general fund revenues.

The program we implement tonight will provide funds for maintenance of stormwater facilities to bring the City into a measure of compliance with federally mandated regulations for water quality. At issue is whether these funds will be raised as a utility rate or a property tax. Currently the ordinance calls for a utility rate of \$3.00 per Equivalent Residential Unit (ERU) per month. What this ordinance does **not** identify is an additional \$250,000 annual general fund appropriation for capital expenditures specifically for stormwater management. This appropriation would essentially be taken from property tax revenue. This program cannot be both a utility rate and a property tax.

I therefore offer the following amendment to Ordinance 2004-25, Section 16-806, sub paragraph (2). Raise rate to \$3.65 per ERU per month, and delete the \$250,000 annual appropriation from the general fund.

PUBLIC HEARING

Consideration of Ordinance No. 2004-25 (As Amended) - An Ordinance to establish a Stormwater User Fee for the City of Franklin Establishing Equivalent Residential Unit (ERU), ERU Rate and Undisturbed Property Rate, providing an effective date and Amending Sections 16-804, 16-805, 16-806 of the Franklin Municipal Code to provide exceptions or adjustments and to create a procedure for appeal of Stormwater User Fee Determinations.
(Second Reading)

Please print name, address, city, and zip code in the following spaces if you would like to speak before or against the above ordinance.

✓ Pam Kelly	226 Polk Place Dr	Franklin, TN 37064
✓ Clyde Stephens	2298 Henpeck Lane	Franklin, TN 37064
✓ Tom Fumari	COOLSPRINGS CHARMER	FRANKLIN, TN 37067
✓ John Markovitch	506 Harpeth + Lasko Products	FRANKLIN TN
Monica Newbauer		
✓ Ron Schuff		

A motion was made by Alderman Lewis that action be deferred for 120 days on the passage of Ordinance No. 2004-18 entitled AN ORDINANCE TO ANNEX THE DOERTER PROPERTY AREA, CONSISTING OF 60.82 ACRES, MORE OR LESS, LOCATED ON THE NORTH SIDE OF CLOVERCROFT ROAD AND WEST OF OXFORD GLEN DRIVE AND TO ESTABLISH AN EFFECTIVE DATE OF JULY 1, 2004. Her motion was seconded by Alderman Phillips and it passed unanimously.

19. PUBLIC HEARING - Consideration of Ordinance No. 2004-25 (as Amended) - An Ordinance to Establish a Stormwater User Fee for the City of Franklin Establishing Equivalent Residential Unit (ERU), ERU Rate and Undisturbed Property Rate, Providing an Effective Date and Amending Sections 16-804, 16-805, 16-806 of the Franklin Municipal Code to Provide Exceptions or Adjustments and to Create a Procedure for Appeal of Stormwater User Fee Determinations.

Mayor Miller announced that a Public Hearing had been advertised in regard to Ordinance No. 2004-25 and he would hear anyone who desired to speak. The following persons spoke:

Pam Kelley, of 226 Polk Place Drive, Franklin, said she was representing the Williamson County - Franklin Chamber of Commerce. She spoke about the fee being a burden on businesses and asked that the fee be reduced. She thanked Alderman Feuerborn for voting against the \$3.65 fee.

Clyde Stephens, of 2298 Henpeck Lane, Franklin, said he had been in business in Franklin for thirty-five years and he is the owner of Williamson Memorial Funeral Home. He said the fee will be a burden on business people in Franklin and there is something that is not fair about the amount some people pay. He wanted the County and City to work together.

Tom Funari, representing the Cool Springs Chamber of Commerce, read the following letter from the Chamber:



Resolution 2-04-01 regarding the stormwater fees in Franklin

- Whereas, the Cool Springs Chamber of Commerce represents 438 members, the majority of which operate businesses in Franklin; and
- Whereas, in response to a federal mandate, the City of Franklin has developed a fee structure as the funding mechanism for developing best practices to alleviate issues with stormwater runoff from Franklin's impervious areas; and
- Whereas, the Cool Springs Chamber Board of Directors commends the City of Franklin for its development of a credit and appeals process as it applies to businesses which included stormwater retention or detention systems in their construction; and
- Whereas, non-residential impervious area in the City of Franklin covers 54,619,812 square feet, equaling 36.7 percent of the total impervious area and the public impervious area in the City of Franklin covers an additional 42,137,996 square feet; and
- Whereas, the Franklin Transportation Committee is proposing a non-residential rate of \$3.65 per 3,350 ERU; and
- Whereas, this high commercial stormwater fee will harm landlords and tenants by imposing an additional cost of doing business in Franklin and negatively impacting revenue; and
- Whereas, this \$3.65 is much higher than the amounts discussed at the many informational meetings offered by the City of Franklin and attended by representatives of the Cool Springs Chamber of Commerce; and
- Whereas, a recent survey of the Cool Springs Chamber members indicated 69 percent of our Chamber would be affected by a raise in stormwater fees. These businesses deliver a substantial portion of the sales tax revenue income to the City of Franklin; and
- Therefore, Be it resolved by the Cool Springs Chamber of Commerce that we urge the Franklin Board of Mayor and Aldermen to adopt a commercial stormwater fee structure of no more than \$3 per ERU, as recommended by the Franklin Planning Department staff.

Unanimously approved this 24th day of February,


Tom Funari
Cool Springs Chamber Chair

5211 MARYLAND WAY, #1080 • BRENTWOOD, TENNESSEE 37027 • (615) 661-6463
FAX (615) 373-8810 • www.coolspringschamber.org • info@coolspringschamber.org

Ron Shuff, of 214 Franklin Road, spoke about the anticipated costs and about how the money can be spent more effectively.

John Markovich, on behalf of Lasko Products, spoke about the Budget for Stormwater and said miscalculations were made and they will have to pay for this. He spoke about City Streets and said they should be paid for from City Funds. He asked that the fees be lowered.

No one else spoke and Mayor Miller declared the Public Hearing closed.

A motion was made by Alderman Klatt that Ordinance No. 2004-25, As Amended, entitled AN ORDINANCE TO ESTABLISH A STORMWATER USER FEE FOR THE CITY OF FRANKLIN ESTABLISHING EQUIVALENT RESIDENTIAL UNIT (ERU), ERU RATE AND UNDISTURBED PROPERTY RATE, PROVIDING AN EFFECTIVE DATE AND AMENDING SECTIONS 16-804, 16-805, 16-806, OF THE FRANKLIN MUNICIPAL CODE TO PROVIDE EXCEPTIONS OR ADJUSTMENTS AND TO CREATE A PROCEDURE FOR APPEAL OF STORMWATER USER FEE DETERMINATIONS be passed on its second reading. His motion was seconded by Alderman McLendon.

Alderman Feuerborn spoke about (1) a lot of work being done by the Staff and others (2) the fees for large homes vs. small homes (3) the appeals process (4) credits and (5) the streets belonging to the public. He urged the Board to adopt a \$3.00 fee.

A motion was made by Alderman Feuerborn that Ordinance No. 2004-25 be amended to change 16-806 (2) to say "The ERU Rate to be charged for Stormwater Management User Fees for each ERU is hereby established to be \$3.00 per month". His motion died for lack of a second.

Alderman McLendon said he will be willing to review the Budget and Alderman Klatt said no study has been

done on the basins to the South and this should be done. Jay R. Johnson asked that the effective date be changed to May 1, 2004.

A motion was made by Alderman Klatt that the date of April 1, 2004 in Section III be changed to May 1, 2004. His motion was seconded by Alderman McLendon and it passed unanimously.

The vote was then called for on the passage of Ordinance No. 2004-25, As Amended, and the vote was as follows: Klatt - Aye; Edmondson - Aye; McLendon - Aye; Feuerborn - No; Bacon - Absent; Kriebel - Aye; Lewis - Aye; Phillips - No.

20. Consideration of Ordinance No. 2004-26 - An Ordinance to Create an Appeals Board for the Stormwater Management Program. (Deferred from February 10, 2004) (First Reading)

Alderman Klatt introduced Ordinance No. 2004-26 entitled AN ORDINANCE TO CREATE AN APPEALS BOARD FOR THE STORMWATER MANAGEMENT ORDINANCE and moved its passage on first reading. His motion was seconded by Alderman Lewis.

A motion was then made by Alderman Klatt that Ordinance No. 2004-26 be amended as follows:

To add as the last sentence of Sec. 16-902 (1) the following: "At least one member shall be a current member of the Board of Mayor and Aldermen." and

To change the words "ten working days" in Section 16-904 (c) to "25 working days" and to change "10 days" in Section 16-904 (d) to "25 days".

His motion was seconded by Alderman Lewis and it passed unanimously.

The vote was then called for on the passage of Ordinance No. 2004-26, As Amended, and it passed unanimously.

21. Consideration of Ordinance No. 2003-38 - An Ordinance to Amend the Franklin Zoning Ordinance Pertaining to Landscape Surface Ratios for Non-Residential Development,

Thomas R. Miller
Mayor



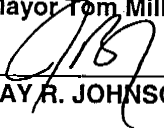
CITY OF FRANKLIN

TENNESSEE

www.franklin-gov.com

James R. Johnson
City Administrator

MEMORANDUM...

TO: Mayor Tom Miller
FROM: 
JAY R. JOHNSON, CITY ADMINISTRATOR
DATE: March 8, 2003
RE: Stormwater Fee

If I may respond to your memo and analysis on stormwater, I would agree generally on the objective of "getting more money into actual improvements benefiting water quality". Most of the focus these last two years has been on studies or equipment, not water quality or actual stormwater management. However, I would also argue it is imperative we complete the analysis of all basins as soon as possible.

By doing so, we will have a consistent data base of the entire community... all drainage basins, all neighborhoods, and all aldermanic wards.

Second, with this we can better prioritize drainage improvements throughout the City as to need, as to cost/benefit analysis, or as to in-house or contracted work.

I am concerned we may focus too much on "mega-projects", when/where we could perhaps get even more accomplished... "short term" ... with several smaller neighborhood projects. Again, these projects could focus either (or both) on flood control or on erosion control due to stormwater.

Regarding the "mega-projects", actually they will still be EPA grants, with probable local matching funds through bond issues, the example being the Jackson Lake area regional detention basin. Even with a \$3.65 ERU, debt service for this proposal bond is not included.

Finally, your letter does emphasize the point, perhaps indirectly, we must have a higher ERU fee than \$1.00/per ERU per month if we are to have a successful, beneficial program for the citizens of this city.

C: Board of Aldermen
Doug Berry, City Attorney
David Parker, City Engineer
Joe York, Director of Streets and Drainage
Randy Wetmore, Assistant City Administrator

JRJ/lyb

G:\STORMWATER MANAGEMENT\ERD-Mayor Miller Stormwater Fee-03-04.doc

109 THIRD AVENUE SOUTH

POST OFFICE BOX 305

FRANKLIN, TENNESSEE 37065-0305

(615) 791-3217 TELEPHONE

(615) 790-0469 FAX

Thomas R. Miller
Mayor

James R. Johnson
Administrator

CITY OF FRANKLIN
TENNESSEE

March 5, 2004

To: Board of Mayor and Aldermen
Cc: Jay Johnson
Dave Parker

From: Mayor Tom Miller

RE: Ordinance 2004-25

The captioned ordinance is before you on Tuesday evening for public hearing and second reading. The ordinance proposes funding the budget of \$1,074,250.00 with a Stormwater fee of \$3.65 per ERU. The budget is broken down as follows:

Personnel	\$ 236,075.00	21.9%
Operations and Maintenance	\$ 395,600.00	36.8%
Capital - Equipment	\$ 206,000.00	19.2%
Capital - Improvements	\$ 236,575.00	22.0%
Totals:	\$1,074,250.00	99.9%

To continue the study of the drainage basins, a professional consultant will need a budget of \$250,000.00 or 63.2% of the O & M budget. Since only 22% of this budget is devoted to actually improving water quality in Franklin I would suggest further basin studies be deferred until such time as we have completed, or nearly completed, the improvements in the basins already studied. Over one-half million dollars is being budgeted for basin studies over the next three years with actual improvement to water quality over that same period of time remains at about 20% of the total budget or less.

I recommend one of the two following actions:

1. Defer further drainage basin studies and reduce the Stormwater rate from \$3.65 per ERU to \$3.00 per ERU.
2. Defer further basin studies and allocate the money to capital improvements and leave the rate the same.

Thank you for allowing me to provide my input concerning this very important matter. If you have any questions, please contact me.

109 3RD AVENUE SOUTH P.O. BOX 305 FRANKLIN, TENNESSEE 37065-0305
(615) 791-3217 TELEPHONE (615) 790-0469 FAX



City Hall

P.O. Box 156

Franklin, Tennessee

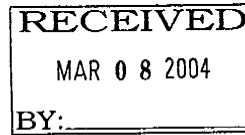
37065-0156

Office (615) 794-1225

Fax (615) 790-5337

1-800-356-3445

williamson-franklinchamber.com



March 8, 2004

TO: FRANKLIN BOARD OF MAYOR AND ALDERMEN
FROM: PAM S. KELLY *psk*
STORMWATER CHAIR

TOPIC: STORMWATER ORDINANCE 2004-25
(AS AMENDED)

Please allow us to direct your attention to Stormwater Ordinance 2004-25 (as amended) which comes up for final reading tomorrow night, Tuesday, March 9, 2004.

In previous correspondence and conversation, we have respectfully asked that a reduction in the \$3.65 ERU fee be considered. As you make a decision on this ordinance we ask that you be sensitive to the impact this excessive fee would have on businesses and vote for a lesser fee.

Enclosed you will find a copy of a letter from County Mayor Rogers Anderson indicating a willingness to work with the City of Franklin in arriving at workable solutions.

Thank you for the opportunities we have had to present the business operator's side in this matter and we thank you in advance for your consideration at the final reading.

Enclosure



WILLIAMSON COUNTY

Rogers C. Anderson, County Mayor
1320 West Main Street, Suite 125
Franklin, Tennessee 37064
(615) 790-5700, Fax (615) 790-5818

February 10, 2004

Mrs. Pam Stephens Kelly,
Storm Water Committee Chair
Williamson County/Franklin Chamber
of Commerce
P. O. Box 156
Franklin, TN 37065-0156

Dear Mrs. Kelly:

Williamson County is currently working with neighboring communities (Nolensville, Brentwood and Franklin) wherever possible to share the development and implementation costs associated with the MS4 Stormwater Permit requirements. Some of these cooperative efforts include:

- Facilitation of the Tennessee MS4 Stormwater Working Group, with the goal of providing opportunities for MS4 programs from across Tennessee to collectively share ideas and resources;
- Integrating water quality environmental education, Project WET, into Williamson County classrooms;
- Delivery of WaterWorks!, a water quality public service announcement program;
- Erosion prevention and sediment control training workshops for the development and construction communities;
- County wide hazardous waste collection events; and,
- Citizen group activities, such as stream cleanup events.

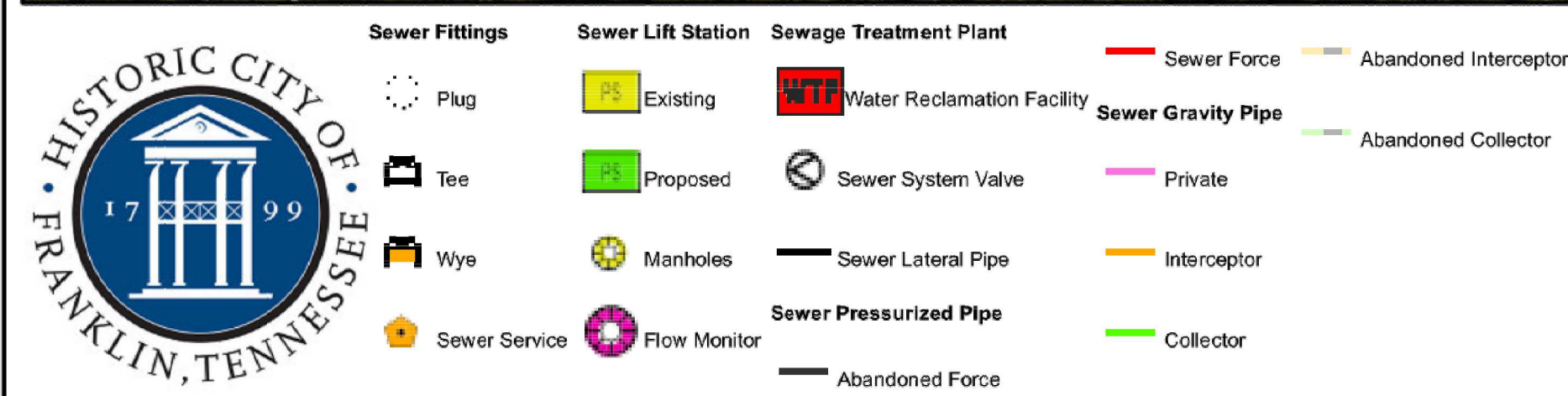
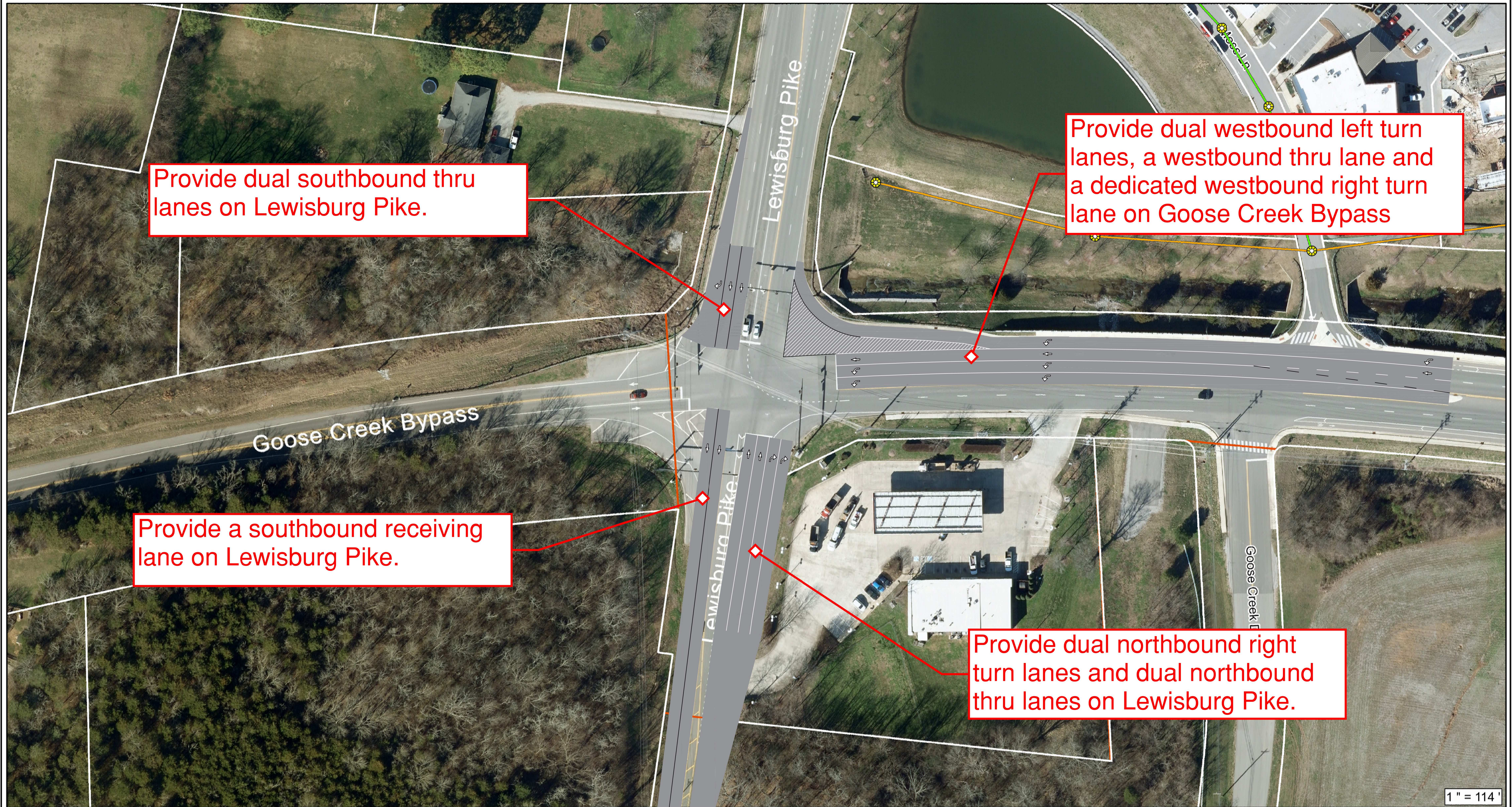
Williamson County welcomes the opportunity to work with each of the municipalities to identify additional ways which we can all comply with the mandates of this law in the most efficient, cost-effective manner.

Sincerely,

Rogers C. Anderson
Williamson County Mayor

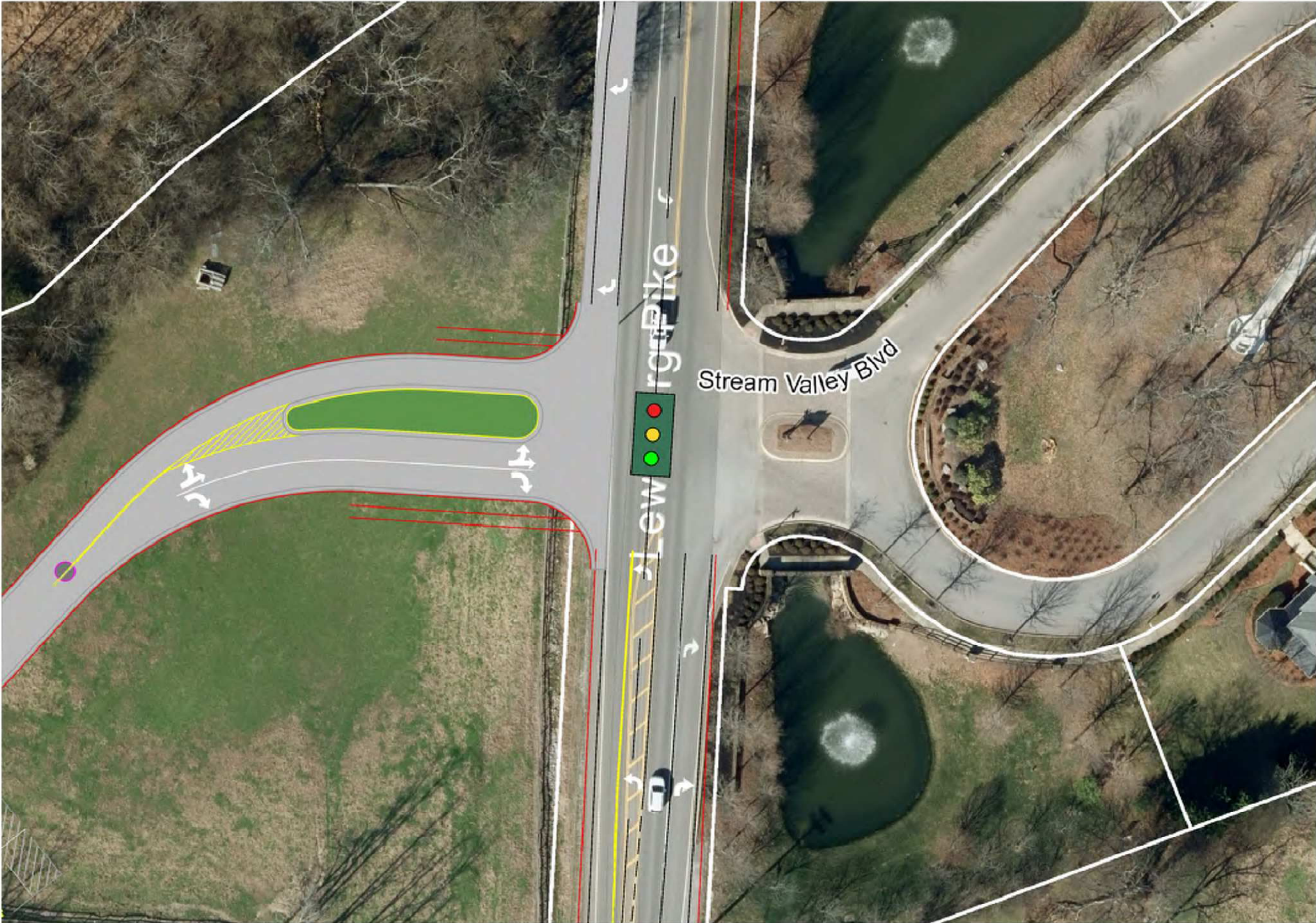
RCA/dg

June 17, 2019

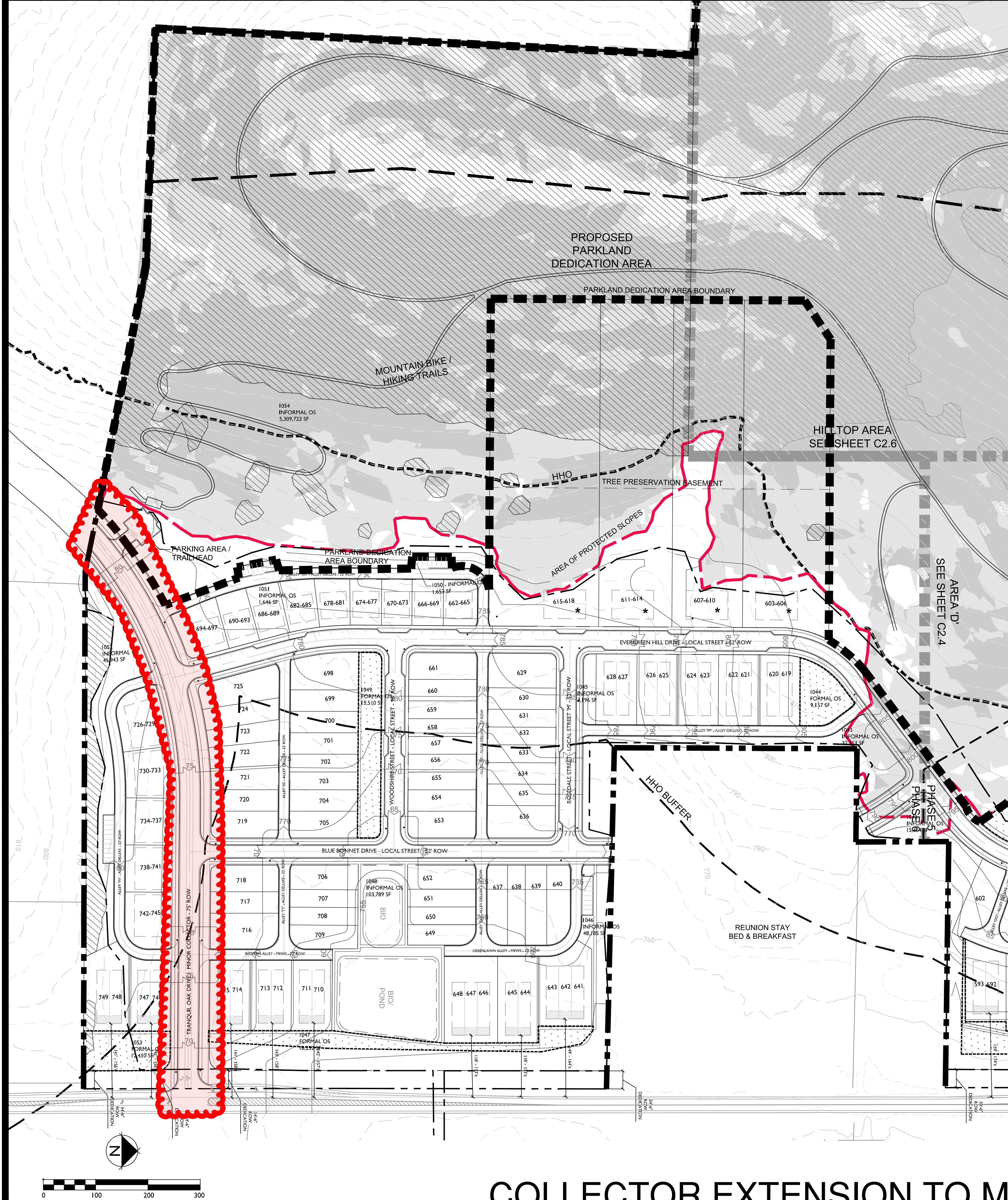


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License Agreement
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NEW TRAFFIC SIGNAL AT LEWISBURG PIKE AND STREAM VALLEY BLVD



NOTE: CRITICAL LOTS- IF, AT SITE PLAN, FIELD-RUN TOPOGRAPHY SHOWS SLOPES OVER 14% WHERE SLOPES ARE PROTECTED, THEN LOTS MAY BE NON-BUILDABLE OR RECONFIGURED.

*'AREA OF PROTECTED SLOPES' REFERS TO AREAS WITHIN THE HHO BUFFER THAT HAVE NATURALLY OCCURRING SLOPES GREATER THAN 14%. THESE AREAS WILL NOT BE DISTURBED. SLOPES GREATER THAN 14% THAT ARE LOCATED OUTSIDE OF THE 'AREA OF PROTECTED SLOPES' HAVE BEEN DETERMINED TO BE MAN-MADE OR INSIGNIFICANT, THEREFORE ALLOWING DEVELOPMENT TO OCCUR.

KEY

- PRESEVED CANOPY
- SLOPES - 14 - 20%
- SLOPES - 20% +
- FORMAL OPEN SPACE
- STREET LIGHT; TYP
- CRITICAL LOT

TYPICAL LOT

Diagram showing a typical lot layout with labels: ALLEY, BUILDING ENVELOPE (ATTACHED UNITS ONLY), UNIT / LOT NUMBER, UNIT / LOT TYPE, STREET.

- NOTES:
- 1. THERE ARE NO FLOODPLAINS EXISTING ON THE SITE BASED ON FEMA MAPS
 - 2. AERIAL PHOTO, PARCEL LINES AND TOPOGRAPHIC INFORMATION PROVIDED BY CITY OF FRANKLIN G.I.S.
 - 3. SITE BOUNDARY CALLS PROVIDED BY WILSON & ASSOCIATES.
 - 4. NO THIRD PARTY MINERAL RIGHTS ARE ASSOCIATED WITH THIS PROPERTY.

AREA 'E' SITE DATA CHART

AREA:	2,406,118 SF (55.23 AC)
EXISTING TREE CANOPY:	925,028 SF (21.23 AC)
PRESERVED TREE CANOPY:	816,201 SF (18.74 AC)
LOT BREAKDOWN:	
ATTACHED:	
24' (3BR):	28
60' (4 UNIT/LOT, 2BR):	36
90' (4 UNIT/LOT, 3BR):	36
TOTAL:	100
DETACHED:	
61'+:	4
46' - 55':	10
41' - 44':	17
34' - 40':	16
TOTAL:	47
AREA TOTAL:	147
PARKING:	
REQUIRED SPACES:	
2 / DETACHED UNIT:	94
3 / 24' UNIT & 90' UNIT (3-BR):	192
2.5 / 60' UNIT (2-BR):	90
TOTAL REQUIRED:	376
PROVIDED:	
4 / DETACHED LOT:	188
4 / 24' UNIT & 90' UNIT (2 GARAGE, 2 TANDEM):	256
2 / 60' UNIT (1 GARAGE, 1 TANDEM)	72
ON-STREET:	73
OFF-STREET:	34
TOTAL SPACES:	623



Revision Date	
△	
△	
△	
△	



Certified Public Accountants
& Consultants

City of Franklin, TN
Water and Sewer
System Development Charge Analysis
Presented February 11, 2020



System Development Fees (Impact Fees) - Definition

- A contribution of capital toward existing or planned future plant facilities necessary to meet the service needs of new customers to which such fees apply.
- Two methods used to determine the amount of these charges are the buy-in method and the incremental-cost pricing method.
- Charges are intended to provide funds to be used to finance all or part of capital improvements necessary to serve new customers.

*AWWA's, Principles of Water Rates, Fees and Charges, p328

System Development Fees – Methodologies

- Equity (Buy-In) Method – This approach attempts to assess new customers a fee to approximate the equity position of current customers. (AWWA M-1, p199)
 - This approach was used on the Water Distribution System and the Sewer Collection System
- Incremental Cost Method – Assigns to new development the incremental cost of system expansion needed to serve the new development. (AWWA M-1, p202).
 - This approach was used on the Water Treatment expansion and the Water Reclamation Facility expansion.

Process Overview

1. Develop Equivalent Residential Unit
2. Equity Buy In - Determine existing customers' "equity" position in the water distribution and sewer collection systems.
3. Equity Buy In - Calculate the average cost per ERU on the existing water distribution and sewer collection systems.
4. Incremental Cost - Determine projected capacity expansion related investments at the water and sewer treatment plants.
5. Incremental Cost – Calculate the average cost per ERU on the expanded treatment facilities for both water and sewer.
6. Both approaches are added together for water and again for sewer to arrive at the calculated Impact Fee for each system.

Develop Equivalent Residential Unit

- Develop Equivalent Residential Unit
 - Residential Class meter – City Code, 350 gallons/day/meter
 - Non-Residential Class – based on actual consumption for 12 Months Ended 9/30/2019.
 - This is reflective of the utility's operation and planning approach.
- Applies to both the Equity Buy-In Approach and the Incremental Cost Approach.

Water – Equity Buy-In Develop Equivalent Residential Unit

EQUITY (BUY-IN) METHOD	
	12 Mos Ended 9/30/2019
Annual Residential Billings	199,330
Monthly Usage/Residential Customer (350 Gals/day)	10,646
Annual Usage/Residential Customer (350 Gals/day)	127,750
Residential Class Code Capacity (Gals)	2,122,033,958
Actual Non-Residential Class Usage (Gals)	445,005,381
Total Design Based Capacity	<u>2,567,039,339</u>
Equivalent Residential Units (ERU) (Total Design Capacity/Annual Usage/Residential Customer)	20,094

Water – Determine Customers Investment in Existing Distribution Plant

EQUITY (BUY-IN) METHOD

	FY 2019
Distribution Plant Valuation	\$ 59,575,401
Less: Contributed Capital	\$ 19,918,384
Less: Distribution Bonds/Grants	\$ 2,639,704
Current Investment in Distribution Plant	<u>\$ 37,017,313</u>

Water – Calculate the Average Investment per ERU in Existing Distribution Plant

EQUITY (BUY-IN) METHOD	
Equivalent Residential Units (ERU) (Total Design Capacity/Annual Usage/Residential Customer)	20,094
	FY 2019
Distribution Plant Valuation	\$ 59,575,401
Less: Contributed Capital	\$ 19,918,384
Less: Distribution Bonds/Grants	\$ 2,639,704
Current Investment in Distribution Plant	<u>\$ 37,017,313</u>
Average Cost/ERU (Dist. Plant Investment/ERU)	\$ 1,842

Water – Incremental Cost

INCREMENTAL COST METHOD

Capacity Investment	
Projected Treatment Capacity Investment	\$ 2,545,582
Projected Additional Capacity (500,000/day)	182,500,000
Annual Usage/Customer (Gals)	127,750
Percentage of Capacity	0.070000%
Average Cost/ERU	\$ 1,782

Water – Hybrid Results

HYBRID CONSOLIDATION	
Equity (Buy-In) Method - Distribution	\$ 1,842
Incremental Cost - Treatment	\$ 1,782
Hybrid Approach - Cost per ERU	\$ 3,624

Sewer – Equity Buy-In Develop Equivalent Residential Unit

EQUITY (BUY-IN) METHOD	
	12 Mos Ended 9/30/2019
Annual Residential Billings	283,476
Monthly Usage/Customer (350 Gals/day)	10,646
Annual Usage/Customer (350 Gals/day)	127,750
Residential Class Code Capacity (Gals)	3,017,838,250
Actual Non-Residential Class Usage	870,109,582
Total Design Based Capacity	<u>3,887,947,832</u>
Equivalent Residential Units (ERU)	30,434
(Total Design Capacity/Annual Usage/Residential Customer)	

Sewer – Determine Customers Investment in Existing Collection Plant

EQUITY (BUY-IN) METHOD

	FY 2019
Collection Plant Valuation	\$ 156,078,134
Less: Contributed Capital	\$ 73,891,602
Less: Collection Bonds/Grants	\$ 9,413,088
Current Investment in Collection Plant	\$ 72,773,444

Sewer – Calculate the Average Investment per ERU in Existing Collection Plant

EQUITY (BUY-IN) METHOD	
Equivalent Residential Units (ERU) (Total Design Capacity/Annual Usage/Residential Customer)	30,434
	FY 2019
Collection Plant Valuation	\$ 156,078,134
Less: Contributed Capital	\$ 73,891,602
Less: Collection Bonds/Grants	\$ 9,413,088
Current Investment in Collection Plant	<u>\$ 72,773,444</u>
Average Cost/ERU (Coll. Plant Investment/ERU)	\$ 2,391

Sewer – Incremental Cost

INCREMENTAL COST METHOD

Capacity - North Plant

Projected Treatment Investment	\$ 40,829,262
Projected Additional Capacity (4 MGD)	1,460,000,000
Annual Usage/Customer (Gals)	127,750
Percentage of Capacity	0.008750%
Average Cost/ERU	\$ 3,573

Future Capacity

Projected Treatment Investment	\$ 258,646,368
Projected Additional Capacity (8 MGD)	2,920,000,000
Annual Usage/Customer (Gals)	127,750
Percentage of Capacity	0.004375%
Average Cost/ERU	\$ 11,316

Sewer – Hybrid Results

HYBRID CONSOLIDATION	
Equity (Buy-In) Method - Collection	\$ 2,391
Capacity - North Plant	\$ 3,573
Future Capacity	\$11,316
Hybrid Approach - Cost per ERU	\$17,280

Summary & Discussion

- Water Impact Fee (3/4")
 - Current = \$2,089
 - Proposed (hybrid) = \$3,624
 - Change (increase): +\$1,535
- Sewer Impact Fee (3/4")
 - Current = \$3,944
 - Proposed (equity + North WRF) = \$5,964
 - Change (increase) = +\$2,020
 - South WRF = \$11,316
 - Proposed (hybrid) = \$17,280
 - Change (increase): +\$13,336
- Multiplier chart for larger users

Development Activity Report & Presentation



HISTORIC
FRANKLIN
TENNESSEE

February 11, 2020

Excellence ~ Innovation ~ Teamwork ~ Integrity ~ Action-oriented

Comparisons CY2017 – CY2019

- Total Construction Valuation
 - CY 2017 - \$818,117,233
 - CY 2018 - \$744,688,495
 - CY 2019 - \$538,002,065
- Total Number of New Dwelling Units
 - CY 2017 - 1595
 - CY 2018 – 978
 - CY 2019 - 1101
- Total Number of Permits Issued
 - CY 2017 - 7526
 - CY 2018 – 6518
 - CY 2019 - 6205

Comparisons CY2017 – CY2019

- Building Permit Fees:

- CY 2017 - \$2,764,070
- CY 2018 - \$2,393,117
- CY 2019 - \$2,269,915

- Road Impact Fees:

- CY 2017 - \$11,315,656
- CY 2018 - \$8,097,295
- CY 2019 - \$6,535,980

- Water and Sewer Fees:

- CY 2017 - \$4,508,459
- CY 2018 - \$4,311,975
- CY 2019 - \$3,215,651



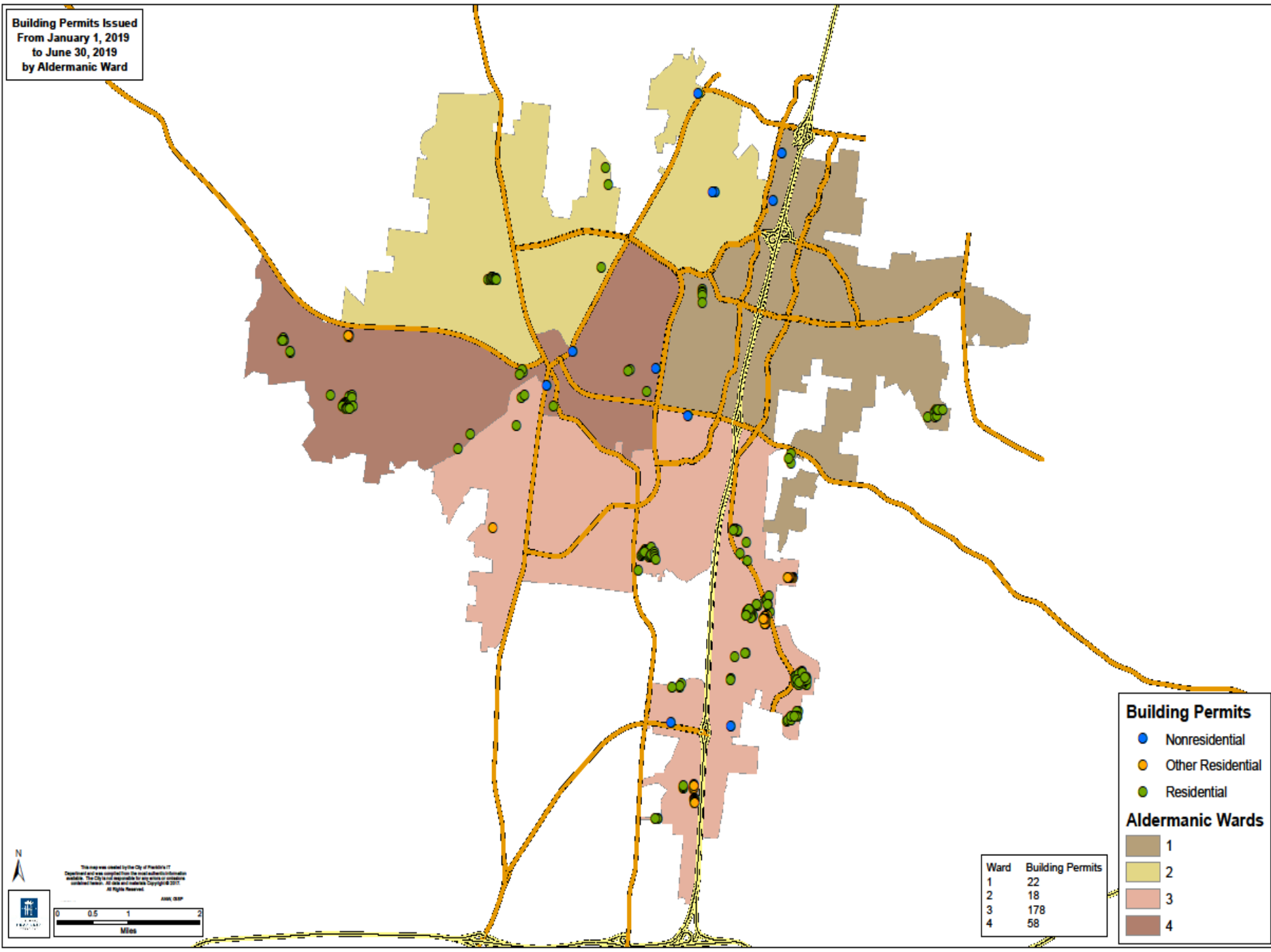
Comparisons CY2017 – CY2019

- New Dwelling Units:
 - CY 2017:
 - Single Family – 565
 - Townhomes – 110
 - Multi-Family – 920
 - CY 2018:
 - Single Family - 404
 - Townhomes - 169
 - Multi-Family - 405
 - CY 2019:
 - Single Family - 385
 - Townhomes - 120
 - Multi-Family – 596



HISTORIC
FRANKLIN
TENNESSEE

Building Permits Issued
From January 1, 2019
to June 30, 2019
by Aldermanic Ward



Building Permits

- Nonresidential
- Other Residential
- Residential

Aldermanic Wards

- 1
- 2
- 3
- 4

Ward	Building Permits
1	22
2	18
3	178
4	58

City of Franklin Website

<https://www.franklintn.gov/services/development-building-services/development-reports-maps>



HISTORIC
FRANKLIN
TENNESSEE

DEVELOPMENT ACTIVITY SUMMARY
PERMITS ISSUED & FEES RECEIVED
Including Construction Valuation

From: 12/1/2019-12/31/2019



PERMIT FEES RECEIVED -
Includes Permit Fees, & Technology Fees

of PERMITS ISSUED*
*Permits without associated fees are not included.

FEES RECEIVED

<u>Residential (inc Townhomes/ Duplexes)</u>	<u>290</u>	<u>\$93,820</u>
Building Permits	60	\$86,010
Electrical Permits	98	\$3,846
Mechanical Permits	84	\$2,740
Plumbing Permits	44	\$840
Swimming Pool Permits	1	\$204
Demolition Permits	1	\$60
Floodplain Permits	2	\$120
<u>Non-Residential (inc Multi-Family)</u>	<u>170</u>	<u>\$66,370</u>
Building Permits	26	\$26,075
Electrical Permits	102	\$25,682
Mechanical Permits	12	\$6,830
Plumbing Permits	27	\$7,663
Demolition Permits	3	\$120
<u>TOTAL PERMITS ISSUED</u>	<u>460</u>	<u>\$160,190</u>

ADDITIONAL FEES RECEIVED

<u>Residential (inc Townhomes/ Duplexes)</u>	<u>\$276,992</u>
Road Impact Fees	\$153,895
Facilities Tax	\$120,022
Plan Review Fees	\$250
Reinspection Fees	\$50
Garbage Container Fees	\$2,775
<u>Non-Residential (inc Multi-Family)</u>	<u>\$236,623</u>
Road Impact Fees	\$200,452
Facilities Tax	\$31,266
Plan Review Fees	\$4,455
Garbage Container Fees	\$450
<u>TOTAL ADDITIONAL FEES</u>	<u>\$513,615</u>

NEW DWELLING UNITS

of UNITS

Building Permits Issued - Number of Units by Type

<u>Single Family (Detached) Dwellings</u>	<u>27</u>
<u>Townhomes</u>	<u>10</u>

TOTAL DWELLING UNITS **37**

WATER & SEWER FEES RECEIVED**FEES
RECEIVED**

<u>Residential (inc Townhomes/ Duplexes)</u>	<u>\$103,105</u>
Water Impact Fees	\$8,001
Sewer Impact Fees	\$95,104
<u>Non-Residential (inc Multi-Family)</u>	<u>\$72,579</u>
Water Impact Fees	\$175
Sewer Impact Fees	\$72,404
<u>TOTAL WATER & SEWER</u>	<u>\$175,684</u>

**STORMWATER, GRADING, & UTILITY
PERMITS ISSUED****# of PERMITS
ISSUED****FEES
RECEIVED**

<u>TOTAL STORMWATER & GRADING PERMITS ISSUED:</u>	<u>1</u>	<u>\$700</u>
---	----------	--------------

**TOTAL GRADING ONLY
PERMITS ISSUED:**

<u>TOTAL UTILITY CONSTRUCTION/ INFRASTRUCTURE PERMITS ISSUED:</u>	<u>1</u>	<u>\$900</u>
---	----------	--------------

**ESTIMATED VALUATION
OF BUILDING PERMITS*****# of BUILDING
PERMITS ISSUED****VALUATION**

<u>Residential Valuation of Construction</u>	<u>60</u>	<u>\$16,104,062</u>
New	37	\$14,057,300
Accessory Building	2	\$56,500
Addition	10	\$1,244,440
Miscellaneous	3	\$20,000
Renovation	8	\$725,822
<u>Non-Residential Valuation of Construction</u>	<u>26</u>	<u>\$12,102,752</u>
New	7	\$5,367,440
Interior Finish/Build-Out	4	\$447,300
Miscellaneous	2	\$133,000
Renovation	12	\$2,355,012
Foundation	1	\$3,800,000

<u>TOTAL ESTIMATED VALUATION OF BUILDING PERMITS*</u>	<u>\$28,206,814</u>
---	---------------------

*Includes all new residential construction (single family detached dwellings and townhomes), new non-residential construction (including multi-family dwellings), accessory buildings, additions, tenant build-out, renovations, and miscellaneous construction. Estimated Valuations (Construction Costs) are provided by Applicants on Building Permit Applications only.

Permit values transacted during the month do not necessarily equal dollars collected because of the timing of the payment and actual issuance of the permits. Permit values are rounded up to the nearest dollar; therefore, totals may not match.

DEVELOPMENT ACTIVITY SUMMARY
PERMITS ISSUED & FEES RECEIVED
Including Construction Valuation

From: 10/1/2019-12/31/2019



PERMIT FEES RECEIVED -
Includes Permit Fees, & Technology Fees

of PERMITS ISSUED*
*Permits without associated fees are not included.

FEES RECEIVED

<u>Residential (inc Townhomes/ Duplexes)</u>	<u>973</u>	<u>\$331,470</u>
Building Permits	192	\$299,580
Electrical Permits	322	\$15,256
Mechanical Permits	276	\$8,394
Plumbing Permits	163	\$3,768
Swimming Pool Permits	9	\$3,812
Demolition Permits	5	\$300
Floodplain Permits	6	\$360
<u>Non-Residential (inc Multi-Family)</u>	<u>491</u>	<u>\$379,682</u>
Building Permits	126	\$285,252
Electrical Permits	195	\$53,771
Mechanical Permits	56	\$16,667
Plumbing Permits	104	\$23,512
Demolition Permits	8	\$420
Floodplain Permits	2	\$60
<u>TOTAL PERMITS ISSUED</u>	<u>1,464</u>	<u>\$711,152</u>

ADDITIONAL FEES RECEIVED

<u>Residential (inc Townhomes/ Duplexes)</u>	<u>\$933,330</u>
Road Impact Fees	\$510,855
Facilities Tax	\$412,254
Plan Review Fees	\$996
Reinspection Fees	\$750
Garbage Container Fees	\$8,475
<u>Non-Residential (inc Multi-Family)</u>	<u>\$4,335,088</u>
Road Impact Fees	\$3,374,595
Facilities Tax	\$939,152
Plan Review Fees	\$20,741
Reinspection Fees	\$150
Garbage Container Fees	\$450
<u>TOTAL ADDITIONAL FEES</u>	<u>\$5,268,418</u>

NEW DWELLING UNITS

of UNITS

Building Permits Issued - Number of Units by Type

<u>Single Family (Detached) Dwellings</u>	<u>96</u>
<u>Multi-Family (Attached) Dwellings</u>	<u>570</u>
<u>Townhomes</u>	<u>17</u>

TOTAL DWELLING UNITS

683

WATER & SEWER FEES RECEIVED**FEES
RECEIVED****Residential (inc Townhomes/ Duplexes)**

Water Impact Fees

Sewer Impact Fees

Non-Residential (inc Multi-Family)

Water Impact Fees

Sewer Impact Fees

\$384,816**\$38,357****\$346,459****\$1,092,545****\$101,601****\$990,944****TOTAL WATER & SEWER****\$1,477,361****STORMWATER, GRADING, & UTILITY
PERMITS ISSUED****# of PERMITS
ISSUED****FEES
RECEIVED****TOTAL STORMWATER &
GRADING PERMITS ISSUED:****2****\$1,400****TOTAL GRADING ONLY
PERMITS ISSUED:****TOTAL UTILITY CONSTRUCTION/
INFRASTRUCTURE PERMITS ISSUED:****1****\$900****ESTIMATED VALUATION
OF BUILDING PERMITS*****# of BUILDING
PERMITS ISSUED****VALUATION****Residential Valuation of Construction****192****\$53,413,536**

New

113

\$47,714,648

Accessory Building

10

\$559,476

Addition

35

\$3,134,360

Miscellaneous

8

\$122,480

Renovation

26

\$1,882,572**Non-Residential Valuation of Construction****126****\$175,401,400**

New

34

\$140,936,014

Accessory Building

2

\$12,232

Addition

3

\$15,362,375

Interior Finish/Build-Out

14

\$4,350,900

Miscellaneous

30

\$923,589

Renovation

42

\$10,016,290

Foundation

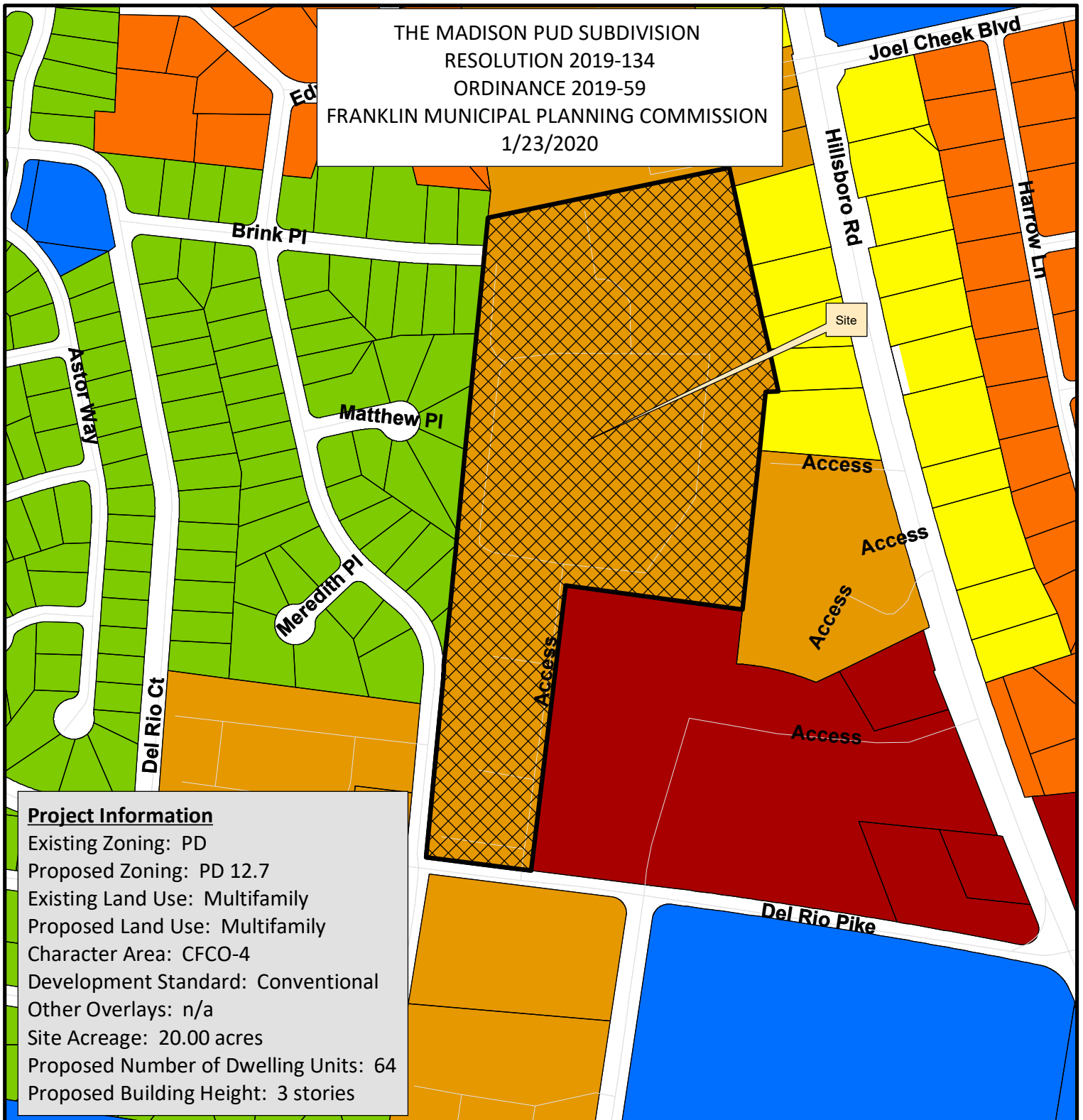
1

\$3,800,000**TOTAL ESTIMATED VALUATION OF BUILDING PERMITS*****\$228,814,936**

*Includes all new residential construction (single family detached dwellings and townhomes), new non-residential construction (including multi-family dwellings), accessory buildings, additions, tenant build-out, renovations, and miscellaneous construction. Estimated Valuations (Construction Costs) are provided by Applicants on **Building** Permit Applications only.

Permit values transacted during the month do not necessarily equal dollars collected because of the timing of the payment and actual issuance of the permits. Permit values are rounded up to the nearest dollar; therefore, totals may not match.

THE MADISON PUD SUBDIVISION
RESOLUTION 2019-134
ORDINANCE 2019-59
FRANKLIN MUNICIPAL PLANNING COMMISSION
1/23/2020



Project Information

Existing Zoning: PD
Proposed Zoning: PD 12.7
Existing Land Use: Multifamily
Proposed Land Use: Multifamily
Character Area: CFCO-4
Development Standard: Conventional
Other Overlays: n/a
Site Acreage: 20.00 acres
Proposed Number of Dwelling Units: 64
Proposed Building Height: 3 stories

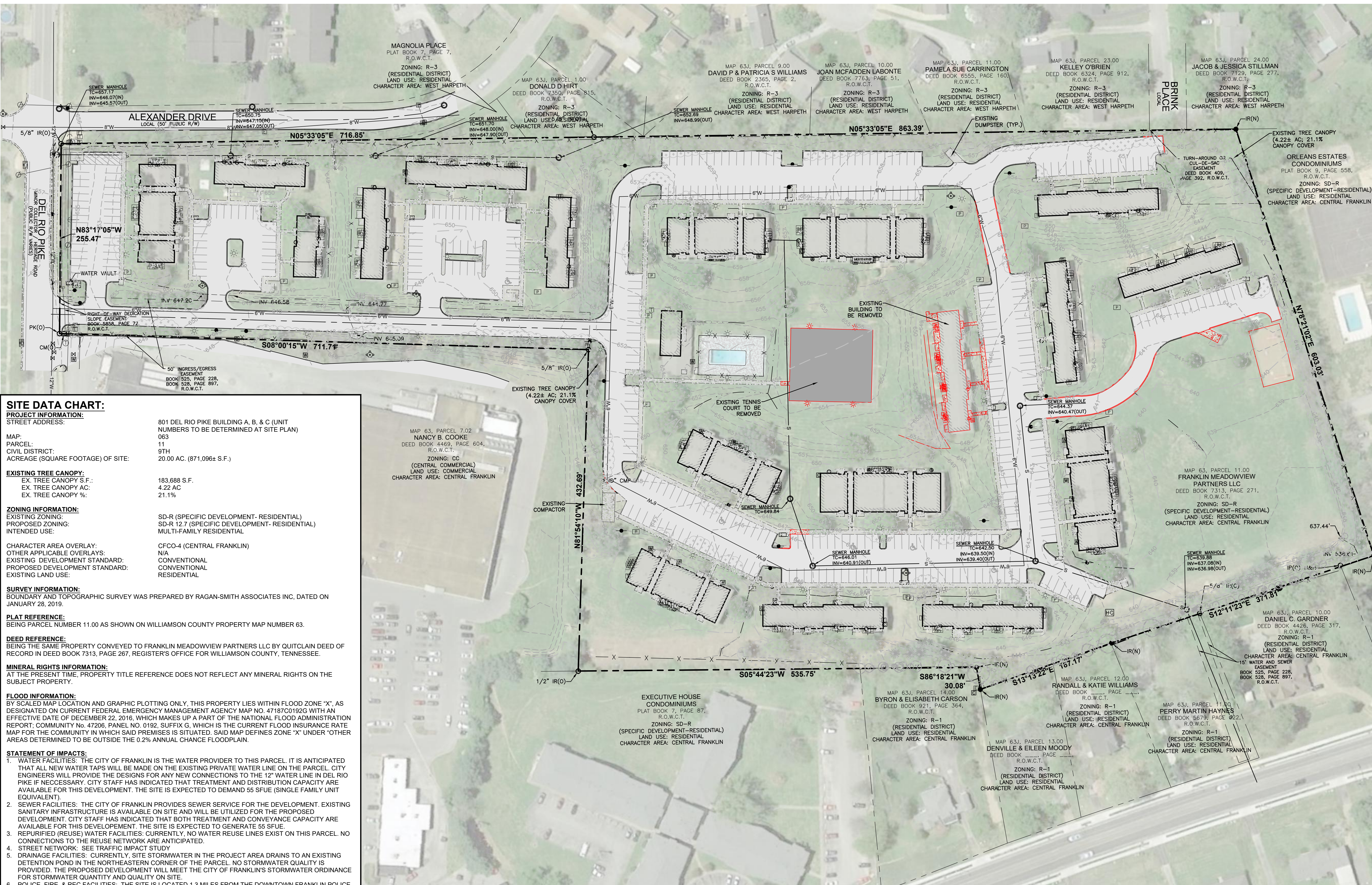
- | | |
|--|---------------------------------------|
| The Madison PUD | SD-R Specific Development-Residential |
| AG Agricultural District | SD-X Specific Development-Variety |
| ER Estate Residential | OR Office Residential District |
| R-1 Residential District | GO General Office District |
| R-2 Residential District | CC Central Commercial District |
| R-3 Residential District | NC Neighborhood Commercial District |
| R-6 Residential District | GC General Commercial District |
| RM-10 Attached 10 Residential District | LI Light Industrial District |
| RM-15 Attached 15 Residential District | HI Heavy Industrial District |
| RM-20 Attached 20 Residential District | CI Civic and Institutional District |



0 250 500 1,000
Feet

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C:\GIS\2019\018 - FRANKLIN MEADOWVIEW PARTNERS LLC\2019 REZONING\018\018.DWG
PLOTTER BY: PLOTTER ON: 10/28/2019 2:28 AM LAST UPDATED BY: RAGAN-SMITH ON: 10/28/2019 2:28 AM



SITE DATA CHART:

PROJECT INFORMATION:

STREET ADDRESS: 801 DEL RIO PIKE BUILDING A, B, & C (UNIT NUMBERS TO BE DETERMINED AT SITE PLAN)
MAP: 063
PARCEL: 11
CIVIL DISTRICT: 9TH
ACREAGE (SQUARE FOOTAGE) OF SITE: 20.00 AC. (871,096± S.F.)

EXISTING TREE CANOPY:

EX. TREE CANOPY S.F.: 183,688 S.F.
EX. TREE CANOPY AC: 4.22 AC
EX. TREE CANOPY %: 21.1%

ZONING INFORMATION:

EXISTING ZONING: SD-R (SPECIFIC DEVELOPMENT- RESIDENTIAL)
PROPOSED ZONING: SD-R 12.7 (SPECIFIC DEVELOPMENT- RESIDENTIAL)
INTENDED USE: MULTI-FAMILY RESIDENTIAL

CHARACTER AREA OVERLAY: CFCCO-4 (CENTRAL FRANKLIN)

OTHER APPLICABLE OVERLAYS: N/A

EXISTING DEVELOPMENT STANDARD: CONVENTIONAL

PROPOSED DEVELOPMENT STANDARD: CONVENTIONAL

EXISTING LAND USE: RESIDENTIAL

SURVEY INFORMATION:

BOUNDARY AND TOPOGRAPHIC SURVEY WAS PREPARED BY RAGAN-SMITH ASSOCIATES INC, DATED ON JANUARY 28, 2019.

PLAT REFERENCE:

BEING PARCEL NUMBER 11.00 AS SHOWN ON WILLIAMSON COUNTY PROPERTY MAP NUMBER 63.

DEED REFERENCE:

BEING THE SAME PROPERTY CONVEYED TO FRANKLIN MEADOWVIEW PARTNERS LLC BY QUITCLAIM DEED OF RECORD IN DEED BOOK 7313, PAGE 267, REGISTER'S OFFICE FOR WILLIAMSON COUNTY, TENNESSEE.

MINERAL RIGHTS INFORMATION:

AT THE PRESENT TIME, PROPERTY TITLE REFERENCE DOES NOT REFLECT ANY MINERAL RIGHTS ON THE SUBJECT PROPERTY.

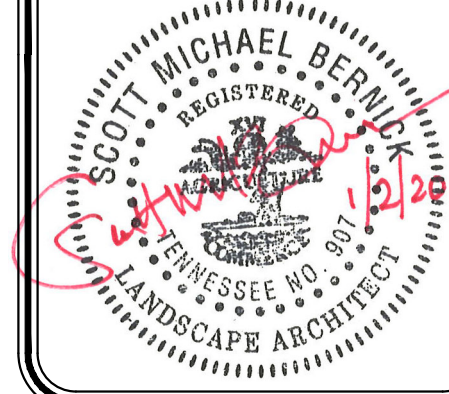
FLOOD INFORMATION:

BY SCALED MAP LOCATION AND GRAPHIC PLOTTING ONLY, THIS PROPERTY LIES WITHIN FLOOD ZONE "X", AS DESIGNATED ON CURRENT FEDERAL EMERGENCY MANAGEMENT AGENCY MAP NO. 47187C0192G WITH AN EFFECTIVE DATE OF DECEMBER 22, 2016, WHICH MAKES UP A PART OF THE NATIONAL FLOOD ADMINISTRATION REPORT; COMMUNITY No. 47206, PANEL NO. 0192, SUFFIX G, WHICH IS THE CURRENT FLOOD INSURANCE RATE MAP FOR THE COMMUNITY IN WHICH SAID PREMISES IS SITUATED. SAID MAP DEFINES ZONE "X" UNDER "OTHER AREAS DETERMINED TO BE OUTSIDE THE 0.2% ANNUAL CHANCE FLOODPLAIN.

STATEMENT OF IMPACTS:

1. WATER FACILITIES: THE CITY OF FRANKLIN IS THE WATER PROVIDER TO THIS PARCEL. IT IS ANTICIPATED THAT ALL NEW WATER TAPS WILL BE MADE ON THE EXISTING PRIVATE WATER LINE ON THE PARCEL. CITY ENGINEERS WILL PROVIDE THE DESIGNS FOR ANY NEW CONNECTIONS TO THE 12" WATER LINE IN DEL RIO PIKE IF NECESSARY. CITY STAFF HAS INDICATED THAT TREATMENT AND DISTRIBUTION CAPACITY ARE AVAILABLE FOR THIS DEVELOPMENT. THE SITE IS EXPECTED TO DEMAND 55 SFUE (SINGLE FAMILY UNIT EQUIVALENT).
2. SEWER FACILITIES: THE CITY OF FRANKLIN PROVIDES SEWER SERVICE FOR THE DEVELOPMENT. EXISTING SANITARY INFRASTRUCTURE IS AVAILABLE ON SITE AND WILL BE UTILIZED FOR THE PROPOSED DEVELOPMENT. CITY STAFF HAS INDICATED THAT BOTH TREATMENT AND CONVEYANCE CAPACITY ARE AVAILABLE FOR THIS DEVELOPMENT. THE SITE IS EXPECTED TO GENERATE 55 SFUE.
3. REPURIFIED (REUSE) WATER FACILITIES: CURRENTLY, NO WATER REUSE LINES EXIST ON THIS PARCEL. NO CONNECTIONS TO THE REUSE NETWORK ARE ANTICIPATED.
4. STREET NETWORK: SEE TRAFFIC IMPACT STUDY
5. DRAINAGE FACILITIES: CURRENTLY, SITE STORMWATER IN THE PROJECT AREA DRAINS TO AN EXISTING DETENTION POND IN THE NORTHEASTERN CORNER OF THE PARCEL. NO STORMWATER QUALITY IS PROVIDED. THE PROPOSED DEVELOPMENT WILL MEET THE CITY OF FRANKLIN'S STORMWATER ORDINANCE FOR STORMWATER QUANTITY AND QUALITY ON SITE.
6. POLICE, FIRE, & REC FACILITIES: THE SITE IS LOCATED 1.3 MILES FROM THE DOWNTOWN FRANKLIN POLICE HEADQUARTERS AND APPROXIMATELY 0.8 MILE FROM FIRE STATION #1 LOCATED AT 500 NEW HWY 96 W. THE SITE IS 0.7 MILES FROM BICENTENNIAL PARK; 1.1 MILES TO JIM WARREN PARK.
7. PROJECTED STUDENT POPULATION: A letter noting the following information was sent to Franklin Special School District (FSSD) and Williamson County Schools (WCS) and included with the submittal. Based on data provided by WCS, it's estimated the development will result in an increased student population as follows:
 - 19.2 Johnson Elementary FSSD Students (Pre-K - 4) (64 x .3 Student/Unit Factor)
 - 8 Freedom Intermediate FSSD Students (5 - 6) (64 x .125 Student/Unit Factor)
 - 8 Freedom Middle FSSD Students (7 - 8) (64 x .125 Student/Unit Factor)
 - 6.4 Centennial High WCS Students (9 - 12) (64 x .1 Student/Unit Factor)
8. REFUSE STORAGE: EXISTING TRASH COLLECTION AND RECYCLING FACILITIES ARE SHOWN ON PUD PLAN AND WILL BE UTILIZED BY THE NEW MULTI-FAMILY BUILDINGS. REFUSE COLLECTION FOR THE MULTI-FAMILY WILL BE PRIVATE.
9. RESTRICTIVE COVENANTS/EASEMENTS: THERE ARE NO RESTRICTIVE COVENANTS/EASEMENTS ASSOCIATED WITH THE EXISTING DEVELOPMENT. THE MANAGEMENT COMPANY REGULATES THE DEVELOPMENT.
10. TRIP GENERATION: SEE UPDATED TRAFFIC STUDY PREPARED BY RAGAN-SMITH ON 08/16/2019.

RAGAN-SMITH
LAND PLANNERS • CIVIL ENGINEERS
LANDSCAPE ARCHITECTS • SURVEYORS
Chattanooga, TN
Nashville, TN
Murfreesboro, TN
615-544-8591
615-546-6060
ragsmith.com



CITY OF FRANKLIN #7140

THE MADISON FRANKLIN FOR FRANKLIN MEADOWVIEW PARTNERS, LLC

CITY OF FRANKLIN, WILLIAMSON COUNTY, TENNESSEE

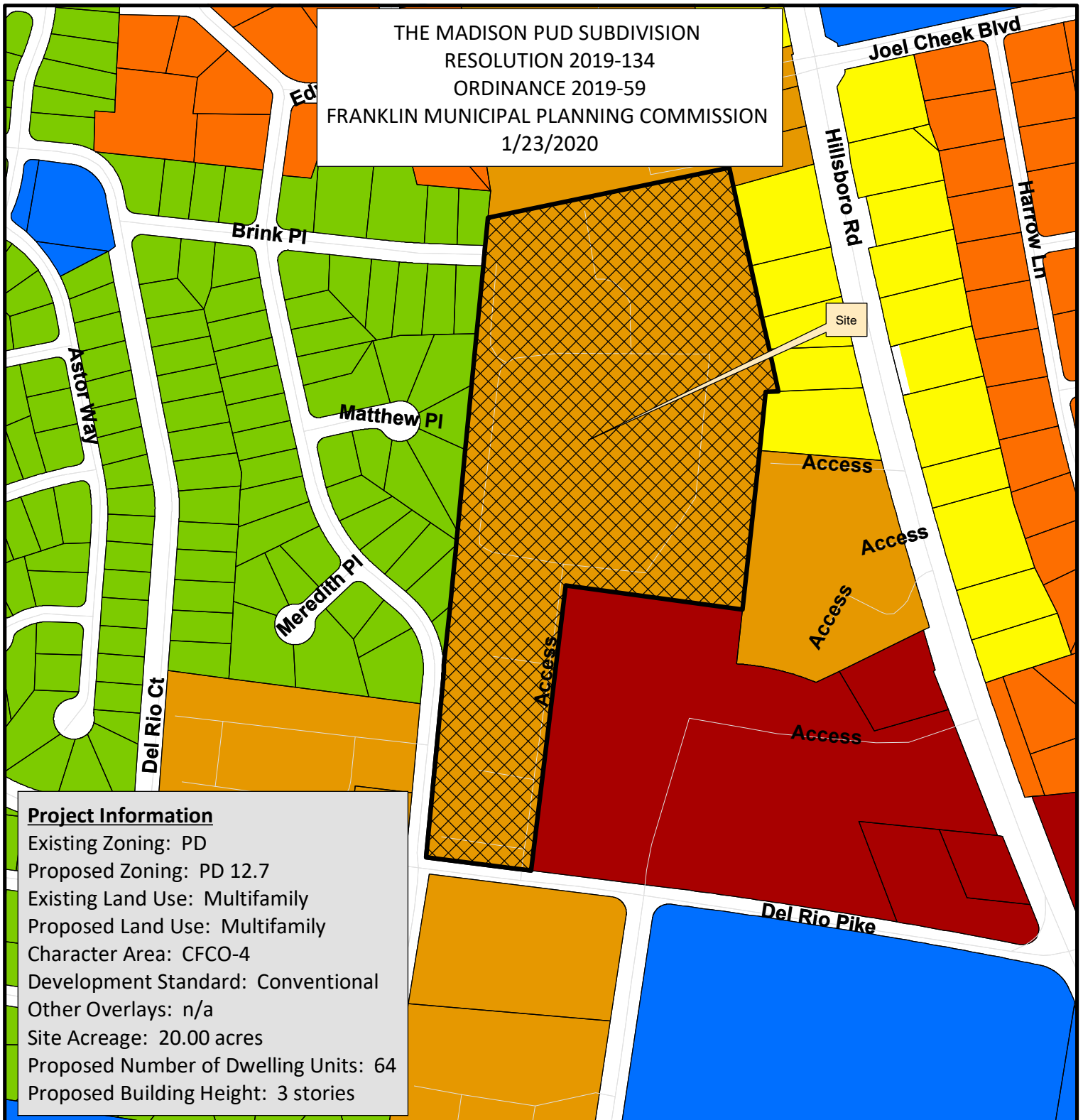
JOB NO.	WK. ORDER	DESIGNED	DRAWN	SCALE	DATE	REV.	DATE	PER. STAFF	DESCRIPTION
18-162	1299	SBERNICK	K.OHIO	1"=60'	2020.01.02	1	2020.01.02	PER. STAFF	COMMENTS
					DECEMBER 9, 2019				

REZONING PLAN

C0.1

NOTE:
BEARINGS SHOWN HEREON ARE BASED ON THE
TENNESSEE STATE PLANE COORDINATE SYSTEM,
ZONE 5301, FIPZONE 4100; NAD 83 DATUM.

THE MADISON PUD SUBDIVISION
RESOLUTION 2019-134
ORDINANCE 2019-59
FRANKLIN MUNICIPAL PLANNING COMMISSION
1/23/2020



Project Information

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Proposed Number of Dwelling Units: 64
Proposed Building Height: 3 stories

- | | |
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0 250 500 1,000
Feet

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CONDITIONS OF APPROVAL:

Open Issues: 9 These issues are currently being filtered

Engineering - Development Plan Checklist

General Issues

2. Final Plat

joe.marlo@franklintn.gov The following is an advisory comment that **does not hinder approval of the Development Plan**.

A final plat will be required in order to modify/abandon existing easements on the property and create new easements as necessary for the proposed site development. The final plat may be submitted concurrent with the Site Plan, and shall be approved and recorded prior to issuance of a Building Permit.

Easements that will be required include, but are not limited to:

- Cross Access Easements from Del Rio ROW to external connection points
- Green Infrastructure Easements at Green Infrastructure BMPs
- Public Drainage Easements at Detention

3. Existing Stormwater Issues

joe.marlo@franklintn.gov There are known stormwater problems downstream of the existing detention pond outfall.

New construction shall not aggravate upstream or downstream flooding. Where existing upstream or downstream stormwater problems exist, Applicant shall correct existing problems in conjunction with new development or redevelopment. [COF Stormwater Ordinance Sec. 23-106 (2) (i) (iii)]

At the Site Plan Stage, the Applicant shall analyze and correct existing downstream stormwater problems and acquire appropriate drainage easements.

Fire-Planning

General Issues

16. Hydrant spacing

curt.edelmann@franklintn.gov Will hold open for site plan.

17. Hydrant flows

curt.edelmann@franklintn.gov Per the International Fire Code, the minimum fire flow is 1500 gallons per minute at 20 psi. This requirement must be met at site plan. If improvements cannot be made, it may not be possible to grant all of the entitlements that were approved at the development plan stage.
[Edited By Curt Edelmann]

Parks

General Issues

19. Parkland Impact Fee

kevinl@franklintn.gov

**Parkland Applicant to pay fess in lieu of
64units x \$4,304=\$275,456 due at the final plat**

The above information shall be labeled on the site data table or sheet for further reference.

22. Parkland Impact Fee

kevinl@franklintn.gov

The draft agreement is back form Law and will be sent out on 1-10-2020 to the applicant for review and signatures.

Planning

General Issues

28. Modification of Standards

joseph.bryan@franklintn.gov

Advisory comment to remain open: Staff has reviewed the MOS #1 and #2 requests and finds the existing conditions to be substantial to where the minimum buffer standards cannot be met. Staff supports the MOS requests.

2019.12.09_ THE MADISON PUD DEVELOPMENT PLANS.pdf

31. Emergency Access Gate

joseph.bryan@franklintn.gov

City Staff opposes the proposed emergency access gate to Brink Place in place of full connectivity between the two developments. As a condition of approval, the access gate must be removed from the plans.

Applicant must request from the Planning Commission and BOMA that this specific condition of approval be removed at the respective meetings.

Stormwater

General Issues

1. Stormwater Management Plan

ellen.moore@franklintn.gov

Advisory comment:

At site plan, applicant shall reevaluate the stormwater detention pond onsite to ensure detention is provided for the additional impervious added.



C2.0

From: [Emily Hunter](#)
To: [Tom Marsh](#); [Amy Diaz-Barriga](#); [Joseph Bryan](#)
Cc: [Alex Brown](#); [Ron Yeary](#); [Shanna McCoy](#)
Subject: RE: Service Request 399538 - The Madison Franklin
Date: Wednesday, December 4, 2019 2:18:53 PM

Amy/Joey,

Please file this with citizen comments to upload in Granicus when the plan moves forward to FMPC/BOMA. Thanks!

EMILY HUNTER, AICP
DIRECTOR OF PLANNING & SUSTAINABILITY
CITY OF FRANKLIN, TN
(615) 791-3212

From: Tom Marsh
Sent: Wednesday, December 4, 2019 1:31 PM
To: Emily Hunter <emily.hunter@franklintn.gov>; Amy Diaz-Barriga <amy.diaz-barriga@franklintn.gov>; Joseph Bryan <joseph.bryan@franklintn.gov>
Cc: Alex Brown <alex.brown@franklintn.gov>; Ron Yeary <ron.yeary@franklintn.gov>; Shanna McCoy <shanna.mccoy@franklintn.gov>
Subject: FW: Service Request 399538 - The Madison Franklin

Hello Planning folks,

The below comment regarding the proposed PUD for The Madison Franklin came to Ron by email.

Thanks,
Tom

From: Ron Yeary
Sent: Wednesday, December 4, 2019 10:27 AM
To: Alex Brown <alex.brown@franklintn.gov>; Tom Marsh <tomm@franklintn.gov>
Subject: Service Request 399538

FROM: stillman.jacob@gmail.com (501)860-8876

I went to the meeting tonight for the Madison Franklin and am very concerned. I live right at the end of Brink place. They are wanting to tear down existing two story units to create new THREE story units, break through our dead end street and this saddens me. Everyone on our street is very upset. We already do not have sidewalks, this will create more traffic that is already dangerous to the kids

walking home from Franklin High School and will now tower over our neighborhood. We didn't receive anything in the mail for the meeting until 5 days before WHICH was the week of thanksgiving while most people are out of town. We feel hoodwinked and frustrated about this. Speaking with them it seemed like they really didn't care and wouldn't put forth effort to change. Will you please help us on Brink Place and Alexander to not allow this? We have all worked really hard to beautify our street, raise the value of our homes and I feel like this will greatly decrease it. I know Franklin does not stand for this. Also, the thought of watching them tear down existing apartments that they just put all new windows and roofs on, wasting it all just to rebuild and increase?

Kind Regards,

Ron Yeary

Neighborhood Resource Supervisor

City of Franklin

109 3rd Avenue South

Franklin, TN 37064

Office: 615-550-6640

Cell: 615-347-6396

This message has been prepared on resources owned by the City of Franklin, Tennessee. It is subject to the City's Policy for the Use of Computers, Internet and Email. Messages that are received or created by any City staff member may be a public record subject to Tennessee Open Records Act, T.C.A. §10-7-503, et seq., and the rules of the Open Records Commission. DO NOT COPY OR FORWARD TO UNAUTHORIZED PERSONS. This message may contain confidential information and is intended only for the use of the specific individual(s) to which it is addressed. If you are not an intended recipient of this message, you are hereby notified that any unauthorized use, dissemination or copying of this email or any information it contains is strictly prohibited. If you have received this message in error, please delete it and immediately notify the sender by reply email.

**PARKLAND IMACT FEE (PAYMENT OF FEE ONLY)
AGREEMENT FOR THE MADISON BETWEEN THE CITY OF
FRANKLIN AND FRANKLIN MEADOWVIEW PARTNERS, LLC**

CONTRACT NO. 2019-0370

PARKLAND IMPACT FEE AGREEMENT (this "Agreement"), made and entered into this 17 day of JANUARY 2020 by and between THE CITY OF FRANKLIN, TENNESSEE (hereinafter "City") and Franklin Meadowview Partners, LLC (hereinafter "Meadowview") pursuant to Title 25, Chapter 4 of the City of Franklin Municipal Code, and Meadowview as owner of that certain land known as The Madison in Williamson County, Tennessee. The parties join herein for the sole purpose of consenting to and approving this Agreement, and hereby consent to and approve this Agreement.

WITNESSETH:

WHEREAS, Meadowview is in the process of developing the property located at 801 Del Rio Pike, Franklin, TN 37064 (the "Development Project"), located in Parkland Quadrant Four (4) of the City, consisting of Sixty-Four (64) dwelling units known as The Madison; and

WHEREAS, Parkland Impact Fees and Parkland Dedication requirements are based on the mathematical formulas and allocations set forth in the City's Parkland Dedication Ordinance (Ordinance 2016-25, Franklin Municipal Code §25-405, and hereinafter, "Ordinance"); and

WHEREAS, the Parkland Impact Fee as set forth in the Ordinance is Four Thousand Three Hundred Four and 00/100 Dollars (\$4,304.00) per dwelling unit; and

WHEREAS, the total Parkland Impact Fee obligation for this project is Two Hundred Seventy-Five Thousand Four Hundred Fifty-Six Dollars (\$275,456.00) and shall be paid at the final plat or at the issuance of the first building permit, whichever comes first.

NOW, THEREFORE, in consideration of the terms, conditions and mutual agreements by and between the parties as hereinafter set forth in detail, the parties do hereby mutually agree as follows:

I. AGREEMENT FOR PAYMENT OF PARKLAND IMPACT FEES

1. The foregoing recitals are incorporated into this Agreement and made a part thereof.
2. This Agreement is non-transferable to the successors or assigns of Meadowview unless the successor assumes the same obligations of Meadowview in writing. Such assignment shall be provided to the City within fifteen (15) days of its occurrence. Upon assignment, Meadowview shall be relieved from further liability under this Agreement.
3. The City and Meadowview agree that the terms and conditions contained herein shall be binding on and shall insure to their heirs, representatives, successors, and assigns.
4. Applicable Law/Choice of Forum and Venue. This Agreement is made under and will be construed in accordance with the laws of the State of Tennessee without giving effect to

that state's choice of law rules. The parties' choice for forum and venue shall be exclusively in the courts of Williamson County, Tennessee.

5. All notices required to be given by any party shall be in writing, addressed to all other parties, and delivered by certified mail or in person to:

In the case of the City:

City of Franklin
Attn: Vernon J. Gerth, ACA
109 Third Ave. South
P.O. Box 305
Franklin, TN 37065-0305

In the case of Meadowview:

Franklin Meadowview Partners, LLC
Attn: John Berry
4515 Harding Road
Suite 210
Nashville, TN 37205

6. This Agreement constitutes the entire agreement between the parties. There are no further or other agreements or understandings, written or oral, in effect between the parties, relating to the subject matter hereof. This Agreement may be amended or modified only be an instrument of equal formality signed by the respective parties.

II. General Terms and Conditions

1. Personal Liability.

No member, Mayor, Alderman, official, or employee of the City shall be personally liable to Meadowview or any successor in interest, in the event of any default or breach by the City, or for any amount which may become due to Meadowview or successor or on any obligations hereunder.

2. Warranties /Limitation of Liability/Waiver.

The City reserves all rights afforded to local governments under law for all general and implied warranties. The City does not waive any rights it may have to all remedies provided by law and therefore any attempt by Meadowview to limit its liability shall be void and unenforceable. The City, being a Tennessee governmental entity, is governed by the provisions of the Tennessee Governmental Tort Liability Act, Tenn. Code Ann. § 29-20-101 et. seq. for causes of action sounding in tort. Further, no contract provision requiring a Tennessee political entity to indemnify or hold harmless the Contractor beyond the liability imposed by law is enforceable because it appropriates public money and nullifies governmental immunity without the authorization of the General Assembly.

3. Severability.

If any term or provision of this Agreement is held to be illegal or unenforceable, the validity or enforceability of the remainder of this Agreement will not be affected.

IN WITNESS WHEREOF the said parties have hereunto set their signatures, on this day and date first above written.

CITY OF FRANKLIN, TENNESSEE

Attest:

By: _____

Dr. Ken Moore, Mayor

Date: _____

By: _____

Eric S. Stuckey, City Administrator

Date: _____

STATE OF TENNESSEE

)

)

COUNTY OF WILLIAMSON

)

Before me, _____, a Notary Public of said State and County, personally appeared, Dr. Ken Moore and Eric S. Stuckey, with whom I am personally acquainted (or proved to me on the basis of satisfactory evidence), and where, upon oath, Dr. Ken Moore acknowledged himself to be Mayor and Eric S. Stuckey acknowledged himself to be City Administrator of the City of Franklin, Tennessee, and that as such, being authorized to do so, have executed the foregoing instrument for the purposes therein contained.

Witness my hand and seal, at office, this _____ day of _____, 20____.

NOTARY PUBLIC

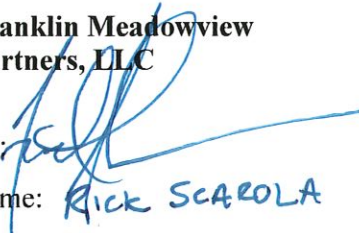
My Commission Expires: _____

Approved as to form:

By: _____

Maricruz R. Fincher, Staff Attorney

**Franklin Meadowview
Partners, LLC**

By: 

Name: RIK SCAROLA

Title: MANAGING PARTNER

A notary public or other officer completing this certificate verifies only the identity of the individual who signed the document to which this certificate is attached, and not the truthfulness, accuracy, or validity of that document.

STATE OF Tennessee)

COUNTY OF Davidson)

On January 17, 2020, before me, Danielle Wills, Notary Public, personally appeared Frederic Rick Scarola who proved to me on the basis of satisfactory evidence to be the person(s) whose name(s) is/are subscribed to the within instrument and acknowledged to me that he/she/they executed the same in his/her/their authorized capacity(ies), and that by his/her/their signature(s) on the instrument the person(s), or the entity upon behalf of which the person(s) acted, executed the instrument.

I certify under PENALTY OF PERJURY under the laws of the State of Tennessee that the foregoing paragraph is true and correct.

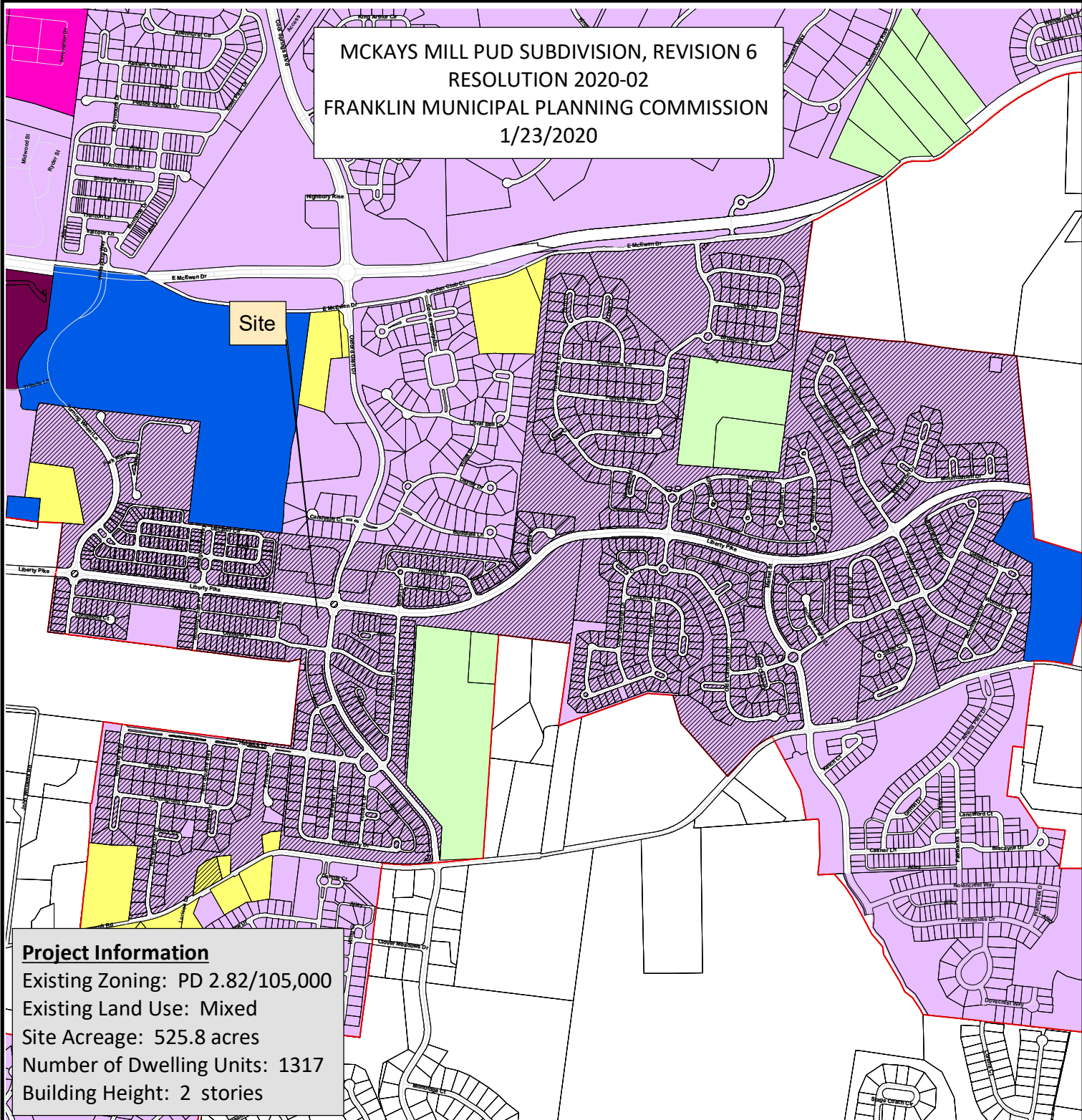
WITNESS my hand and official seal.

Danielle Wills (seal)
Signature

My Commission Expires: September 7, 2021



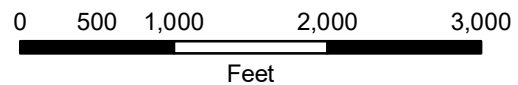
MCKAYS MILL PUD SUBDIVISION, REVISION 6
 RESOLUTION 2020-02
 FRANKLIN MUNICIPAL PLANNING COMMISSION
 1/23/2020



Project Information

Existing Zoning: PD 2.82/105,000
 Existing Land Use: Mixed
 Site Acreage: 525.8 acres
 Number of Dwelling Units: 1317
 Building Height: 2 stories

- | | |
|--------------------------------|------------------------------------|
| McKays Mill PUD Subdivision | CI Civic Institutional District |
| AG Agricultural District | NC Neighborhood Commercial |
| ER Estate Residential District | CC Central Commercial District |
| R1 Residential 1 District | DD Downtown District |
| R2 Residential 2 District | 1ST Avenue District |
| R3 Residential 3 District | 5TH Avenue District |
| R4 Residential 4 District | RC6 Regional Commerce 6 District |
| R6 Residential 6 District | RC12 Regional Commerce 12 District |
| MR Mixed Residential District | GO General Office District |
| PD Planned District | LI Light Industrial District |
| OR Office Residential District | HI Heavy Industrial District |



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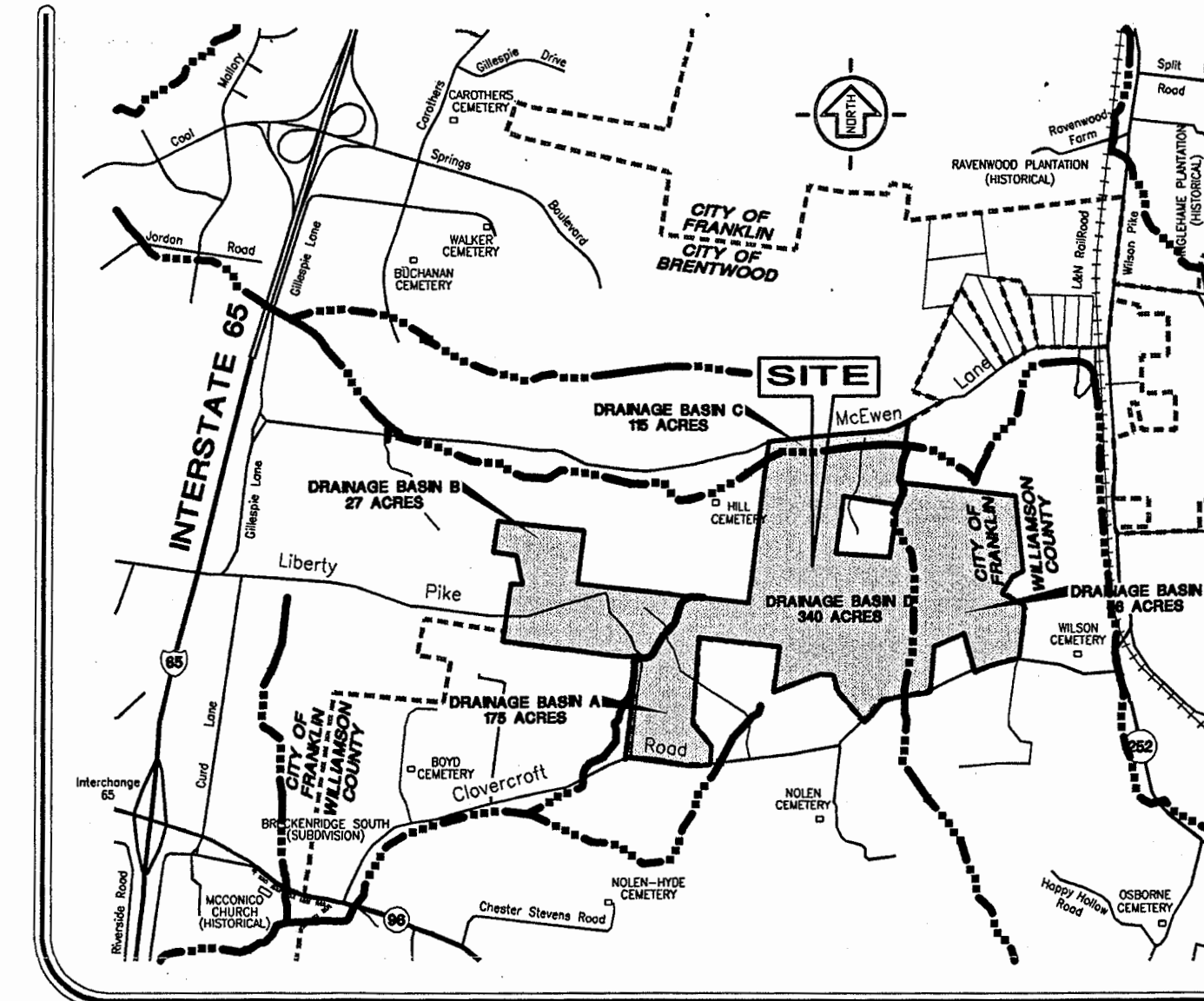
SITE DATA (PR 2.32 ZONE)								
COMMUNITY	USE	TOTAL AREA	AREA IN LOTS	AREA IN ROW	AREA IN OPEN SPACE	NO. OF LOTS/DWELLING UNITS	MIN. LOT SIZE	DENSITY
A	TOWNHOME/CODOMINIUMS	15.9 AC.	N/A	0.8 AC.	7.5 AC.	79	N/A	4.97 DU/AC
B	TOWNHOME/CODOMINIUMS	25.3 AC.	11.1 AC.	8.1 AC.	6.1 AC.	133	N/A	5.26 DU/AC
C	SINGLE FAMILY	28.6 AC.	16.7 AC.	5.5 AC.	6.4 AC.	91	7,000 S.F.	3.18 DU/AC
D	SINGLE FAMILY	34.4 AC.	20.5 AC.	6.8 AC.	7.1 AC.	81	9,000 S.F.	2.35 DU/AC
E	SINGLE FAMILY	38.4 AC.	12.2 AC.	6.8 AC.	19.4 AC.	70	7,000 S.F.	1.82 DU/AC
F	SINGLE FAMILY	14.8 AC.	7.0 AC.	3.4 AC.	4.4 AC.	38	7,000 S.F.	2.59 DU/AC
G	SINGLE FAMILY	5.4 AC.	2.3 AC.	1.3 AC.	1.8 AC.	12	7,000 S.F.	2.22 DU/AC
H	OPEN SPACE	12.5 AC.	N/A	1.5 AC.	11.0 AC.	N/A	N/A	N/A
I	SINGLE FAMILY	25.7 AC.	14.1 AC.	3.0 AC.	8.6 AC.	41	13,000 S.F.	1.59 DU/AC
J	SINGLE FAMILY	81.6 AC.	40.5 AC.	8.5 AC.	32.6 AC.	137	11,000 S.F.	1.68 DU/AC
K	SINGLE FAMILY	28.1 AC.	18.3 AC.	5.5 AC.	4.3 AC.	78	9,000 S.F.	2.78 DU/AC
L	SINGLE FAMILY	69.7 AC.	23.8 AC.	8.2 AC.	37.7 AC.	105	9,000 S.F.	1.51 DU/AC
M	SINGLE FAMILY	39.1 AC.	19.8 AC.	5.4 AC.	13.9 AC.	122	7,000 S.F.	3.12 DU/AC
N	SINGLE FAMILY	36.2 AC.	18.8 AC.	6.0 AC.	11.4 AC.	81	9,000 S.F.	2.21 DU/AC
O	SINGLE FAMILY	69.6 AC.	38.2 AC.	13.8 AC.	17.6 AC.	150	9,000 S.F.	2.16 DU/AC
Q	SINGLE FAMILY	50.6 AC.	32.1 AC.	8.6 AC.	10.0 AC.	99	11,000 S.F.	1.96 DU/AC
TOTALS		575.9 AC.	275.4 AC.	93.3 AC.	199.8 AC.	1317		2.29 DU/AC

NOTES: 1. OPEN SPACE INCLUDES ALL AMENITY, NATURAL AREAS, BUFFER AREAS, CUL-DE-SAC AND ROUNDABOUT ISLANDS.
2. OPEN SPACE COMPRISES 36.1% OF THE 525.8 ACRE PR2.25 ZONE.

SITE DATA (PC 2.82 ZONE)								
AREA	USE	TOTAL AREA	NET AREA	AREA IN ROW	FLOOR AREA	F.A.R.	NO. OF DWELLING UNITS	DENSITY
P	RETAIL/OFFICE/APARTMENTS/INDOOR ANIMAL USE	14.2 AC.	11.9 AC.	2.3 AC.	105,000 SQ. FT.	0.17	40	2.82 DU/AC

INDEX

COMMUNITY/AREA	SHEET	COMMUNITY/AREA	SHEET
A	9	J	5 & 6
B	9	K	5
C	9	L	4
D	7	M	2
E	7 & 8	N	2
F	8	O	3
G	5	P	8
H	9	Q	10
I	6		



LOCATION MAP
SCALE: 1"=3000'

Scale 1" = 300'

ZONE: ESTATE RESIDENTIAL

ZONE: MEDIUM RESIDENTIAL



TRAIL LEGEND

- EXISTING TRAIL (ASPHALT)
- NATURAL TRAIL (MULCH)
- ASPHALT TRAIL
- SIDEWALK CONNECTION
- TRAIL HEAD

GENERAL NOTES:

- Existing Zoning: PR 2.25 and PC 2.82.
- This Concept Plan amendment has no increased impact on the existing trees in Community "B".
- This Concept Plan amendment does not change any matters of the Restrictive Covenants for this development.

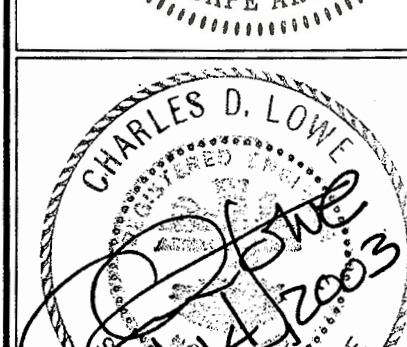
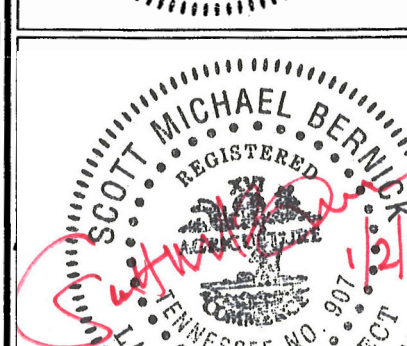
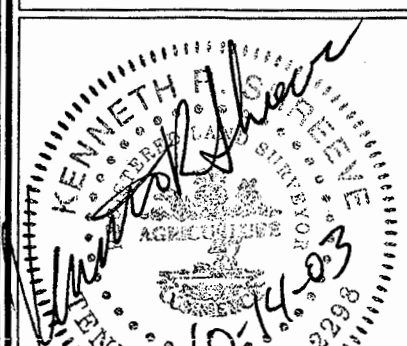
OWNER/DEVELOPER
99% Owned by The Jones Company Custom Homes of Tennessee.
133 Holiday Court, Suite 200
Franklin, Tennessee 37067
(615) 791-1134

Company ownership is as follows:
Robert E. Jones, 13100 Manchester Road
Suite G-55, St. Louis, MO 63131
Howard Chilcutt, 13100 Manchester Road
Suite G-55, St. Louis, MO 63131
Tom Jones, 13100 Manchester Road
Suite G-55, St. Louis, MO 63131

BENCH MARK:
BOAT SPIKE IN CENTERLINE OF CLOVERCROFT ROAD ±140 FEET
EAST OF THE SOUTHEAST CORNER OF PROPERTY.
ELEVATION: 520.15 NOS DATUM 1982 ADJUSTED.

FLOOD NOTE:
BY GRAPHIC PLOTTING ONLY, THIS PROPERTY IS NOT LOCATED
WITHIN A "SPECIAL FLOOD HAZARD AREA."

RAGAN SMITH ASSOCIATES
PLANNERS - CIVIL ENGINEERS
LANDSCAPE ARCHITECTS - SURVEYORS
315 WOODLAND STREET, P.O. BOX 60070
NASHVILLE, TENNESSEE 37206-0070
(615) 244-8591 FAX (615) 244-8799

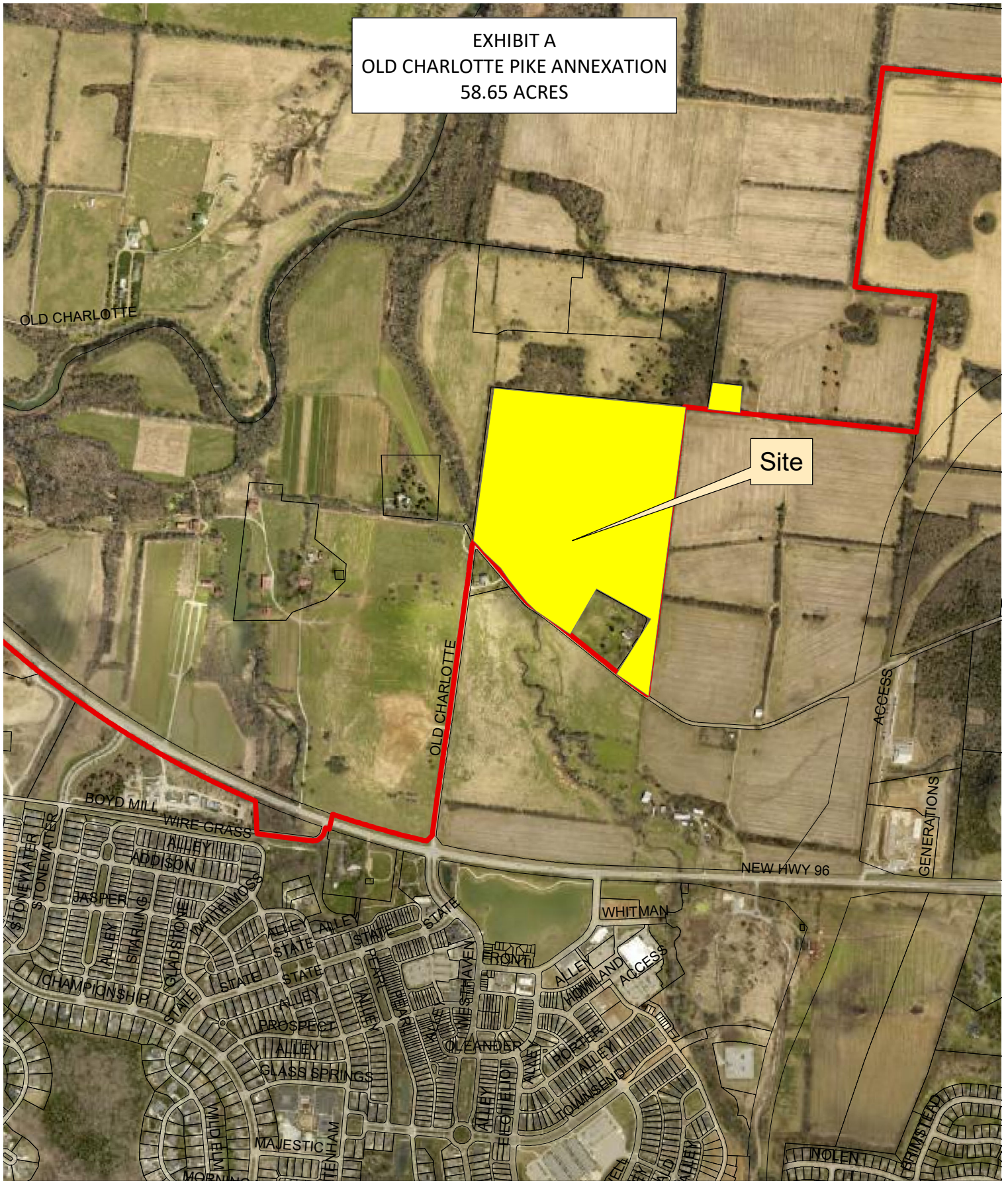


MCKAY'S MILL
P.U.D. SUBDIVISION
EIGHTH CIVIL DISTRICT
CITY OF FRANKLIN, WILLIAMSON COUNTY, TENNESSEE
CONCEPT PLAN - COVER SHEET

8	01/02/00 S.M.B. Rev. per COF #
7	09/30/19 S.M.B. Rev. per new use
6	02-05-01 K.R.S./P.C.S. Miscellaneous revisions
5	02-26-01 K.R.S./C.D.L. Rev. per City Comments.
4	02-20-01 K.R.S./C.D.L. Misc. Revisions.
3	07-15-03 K.R.S./C.D.L. Misc. Revisions.
2	08/05/03 K.R.S./C.D.L. Rev. per Planning Comments
1	09/13/03 K.R.S./C.D.L. Annex of Additional Property
REVISIONS	
DESIGNED BY:	
DRAWN BY: K. SHREEVE	
APPROVED BY: C. LOWE	
SCALE: 1"=300'	
DATE: DECEMBER 7, 1998	
JOB NO. 97-013	WK. ORDER 5425
SHEET NO. 1 OF 10	

File in 10- Ordinance 2001-03 Rezone 5425 Acres from Unimproved Res (PR 2.25) and from 50.01 Acres 1-15-04

EXHIBIT A
OLD CHARLOTTE PIKE ANNEXATION
58.65 ACRES



Legend

Properties Under Consideration

 Properties Under Consideration

 Existing City Limits



0 500 1,000 2,000 3,000 4,000

Feet

This map was created by the Franklin Planning Department.
It was compiled from the most authentic information available.
The City is not responsible for any errors or omissions contained hereon.
All data and materials (c) copyright 2016. All rights reserved.

DRAFT Plan of Services
Exhibit B

The Property is located North of Old Charlotte Pike East and West of Del Rio Pike, as described herein and as depicted on the Map attached hereto as Exhibit A:

Map-Parcel	Acres
Map 64/Parcel 700	58.65
Total	58.65

A. Water

1. The Property is located within the HB&TS service area.
2. Water availability shall be approved and provided through HB&TS prior to annexation.
3. The Owner shall be required to provide adequate fire flow and pressure to the Property.

B. Reclaimed Water

1. According to the City of Franklin's Municipal Code, reclaimed water systems shall be extended to a development if the development is located within 1,000 feet of an existing reclaimed water line.
2. In the case of this Property, a minimal extension would be required to serve the Property. Depending on the planned use of this property, a reclaimed water main extension may be required.

C. Wastewater

1. The Property lies within the West Basin as defined in the City of Franklin Sanitary Sewer Basin Study.
2. The Owner shall be required to extend the sanitary sewer mains from the property to the Westhaven Sanitary Sewer Lift Station to provide service to the Property.
3. The Owner shall be required to provide a completed study of the Westhaven Sanitary Sewer Lift Station in order to verify the lift station has the capacity to handle the additional flows generated by this development.
4. The Owner shall be required to submit engineering calculations to determine final sanitary sewer main sizing requirements.
5. The Owner shall be required to provide Engineering design, construction, easements, rights-of-way and the costs associated with the on-site sanitary sewer infrastructure required to serve the development of this Property.
6. The Owner shall be responsible for the payment of fees per the policies and procedures outlined in Franklin Municipal Code.
7. All wastewater requirements listed herein are approximate based on the information available at the time of drafting of this plan of service. Additional infrastructure requirements may be needed depending on layout of the project and additional details provided by the developer.

D. Stormwater

1. The Owner shall be responsible for the engineering, design and construction of the necessary stormwater infrastructure for the development of the Property and shall comply with the requirements as outlined in the Franklin Municipal Code.

DRAFT Plan of Services
Exhibit B

2. As the Property develops, the City will charge prevailing stormwater user fees per policies and procedures as outlined in the Franklin Municipal Code.

E. Streets

1. Emergency maintenance of streets will begin on the effective date of annexation.
2. Reconstruction and resurfacing of streets, routine maintenance, and installation of storm drainage will be accomplished under existing City policies.
3. Access to the Property shall be provided from Old Charlotte Pike. Currently Carlisle Lane between Old Charlotte Pike and Del Rio Pike is in need of improvements prior to any additional traffic being added to the corridor.
4. Unless waived by the Franklin Engineering Department, the Owner of the Property shall be required to submit a traffic impact study prior to submitting a development plan for review and approval. The exact scope associated with this traffic impact study shall be determined prior to submittal of the development plan. Required street improvements shall be determined as part of the plan. The roadways constructed as part of this development shall comply with City Street Standards.

F. Traffic Control

1. Traffic signals, traffic signs, street markings, and other traffic control devices shall be installed as the need is established by appropriate study and traffic standards. No needs have been identified for the area at this time.
2. New development after the effective date of annexation shall comply with City regulations governing traffic control devices and markings.

G. Street Lighting

1. No off-site street lighting is proposed at this time.
2. Street lighting within new developments shall be funded and installed by the Owner per City policy, which includes the installation of electric meters to allow for future ownership and maintenance by the City or homeowners association. The installation and operation of street lights shall coincide with the phasing of development and issuance of Certificates of Occupancy.

H. Street Name Signs

1. No additional street name signs in the area have been deemed necessary.
2. New development shall install street name signs per City policy.

I. Fire Protection

1. Fire protection by the present personnel and equipment of the Franklin Fire Department will be provided on and after the effective date of annexation.
2. No additional staffing or equipment will be necessary to serve the annexation area at this time.

J. Planning and Zoning

1. The planning and zoning jurisdiction of the City will extend to the annexed area on and after the effective date of annexation.
2. Envision Franklin identifies this property as Conservation Subdivision. This design concept supports primarily single-family residential development that clusters lots and infrastructure and sets aside a substantial amount of property as permanently protected open space in its

DRAFT Plan of Services Exhibit B

natural state. New development should preserve a minimum of 50 percent open space, strategically targeted towards scenic vistas, greenways, pastures, trails, woodlands, or other uses that maintain scenic character, protect habitat value, and contribute to the quality of life for residents.

3. Upon annexation, the Property will be zoned by the Board of Mayor and Aldermen, pursuant to the requirements of the Franklin Zoning Ordinance with a base zone district. The Owner shall also be required to submit a Planned Unit Development (PUD) Development Plan, pursuant to the requirements of the Zoning Ordinance if applicable to the requested Zoning District.

K. Parks and Recreation

1. The benefit and use of the recreational facilities and programs provided by the Parks Department will be available on and after the effective date of the annexation. Recreational facilities and programs will be provided with existing personnel, facilities and resources.
2. New development in the annexed area shall comply with the City of Franklin Parkland Impact Fee Ordinance. The benefit and use of the recreational facilities and programs provided by the Parks Department will be available on and after the effective date of the annexation.

L. Police Protection

1. Police patrol and response to calls by the Franklin Police Department will be provided on and after the effective date of annexation.
2. Police services will be provided with existing personnel and equipment.

M. Building and Code Inspection Services

1. Building and code inspection services will begin in the annexed area on and after the effective date of the annexation.
2. New development in the annexed area shall comply with adopted City Building Codes, pay the applicable fees, and obtain the required permits for inspection services.

N. Garbage and Recycling Pickup and Environmental

1. The Sanitation and Environmental Services Department will begin providing services in the annexed area on and after the effective date of the annexation in accordance with adopted City requirements.
2. *** ALTERNATE LANGUAGE FOR NON-RESIDENTIAL / APARTMENTS / INSTITUTIONAL USES*** The Sanitation and Environmental Services Department will begin providing services in the annexed area on and after the effective date of the annexation in accordance with adopted City requirements. The Owner does not have to use the City as a provider, but the Owner shall be responsible for providing refuse collection services as a matter of public health. The Owner shall present a plan for service for refuse collection services for approval by the Sanitation and Environmental Services Department, and shall be required to install required dumpster enclosures if dumpsters will be used for holding refuse between scheduled service days.
3. No additional staffing or equipment will be necessary to serve the annexation area at this time.

DRAFT Plan of Services
Exhibit B

RESOLUTION 2020-06

A RESOLUTION AUTHORIZING THE USE OF THE COMPETITIVE SEALED PROPOSAL PROCUREMENT METHOD FOR SELECTING THE SOLUTION AND SERVICE PROVIDER FOR WASTEWATER FLOW MONITORING SERVICES

WHEREAS, pursuant to Tenn. Code Ann. § 12-3-1207 the City may use competitive sealed proposals rather than competitive sealed bids when the City adopts a process for the use of competitive sealed proposals and determines that the use of competitive sealed bidding is either not practicable or not advantageous to the City; and

WHEREAS, the City passed Ordinance 2019-24 on August 13, 2019, authorizing the use of the competitive sealed proposal procurement method; and

WHEREAS, should the City choose to pursue conducting its own competitive process for establishing the basis of pricing pursuant to sealed submittals and published legal notice, then City staff requests authority to use the competitive sealed proposal procurement method for determining which service provider to recommend for award of wastewater flow monitoring services; and

WHEREAS, the Board of Mayor and Aldermen find that the use of the competitive sealed proposal procurement method is advantageous to the City because qualifications, experience, and competence are more important than price in selecting the recommended solution and service provider, and because there is more than one solution to the needed purchase and the competitive sealed proposal procurement method will assist in selecting the responsive solution and responsible service provider that would best meet the City's needs.

NOW, THEREFORE, BE IT RESOLVED BY THE BOARD OF MAYOR AND ALDERMEN OF THE CITY OF FRANKLIN, TENNESSEE, AS FOLLOWS:

Should the City choose to pursue conducting its own competitive process for establishing the basis of pricing pursuant to sealed submittals and published legal notice, then the City is authorized to use the competitive sealed proposal procurement method pursuant to the standards set forth in Municipal Code § 5-504 for determining which solution and service provider to recommend for award of wastewater flow monitoring services because qualifications, experience, and competence are more important than price in selecting the recommended solution and service provider, and because there is more than one solution to the needed purchase and the competitive sealed proposal procurement method will assist in selecting the responsive solution and responsible service provider that would best meet the City's needs.

IT IS SO RESOLVED AND DONE on this ____ day of _____, 2020.

ATTEST:

CITY OF FRANKLIN, TENNESSEE:

By: _____

Eric S. Stuckey
City Administrator

By: _____

Dr. Ken Moore
Mayor

Approved as to Form:

By: _____

Maricruz R. Fincher
Staff Attorney

Tabulation of Bids*

Purchasing Office Solicitation No.:		2020-017 (Holiday Court sewer system improvements)	
Notice to Bidders published in the <i>Williamson Herald</i> on:		1/2/20	
Number of vendors that were notified of / that responded to this solicitation for bids:		7 / 3	
Date and time bids due and publicly opened:		2/4/20 2:00 PM	
Present at opening of bids:		Steve Lewis of W&O Construction; Tristan Carroll of Middle Tennessee Infrastructure, Inc.; Donna Vitrao of Civil Constructors, LLC; Brian Goodwin and Michelle Hatcher of the City of Franklin Water Department; and Leslie Pewitt, Suzanne Ward and Brian Wilcox of the City of Franklin Purchasing Office	
Target meeting of BOMA at which recommendation is scheduled to be considered:		3/10/20	
Bids received from:		Bid No.:	Does the bid include all required documents? Total estimated bid price based on specified estimated annual quantities:
Civil Constructors, LLC Todd J. Ketner, Vice President 425 Downs Boulevard Franklin, TN 37064 615-236-9000 t.ketner@civilconstructors.com		1 of 1	Yes \$647,192.20
Middle Tennessee Infrastructure, Inc. Dean Carroll, Secretary 105 Homewood Drive Murfreesboro, TN 37127 615-428-7780 midtni@comcast.net		1 of 1	Yes \$554,057.40
W & O Construction, Inc. Timothy C. Huddleston, Vice President 150 Construction Drive PO Box 239 Livingston, TN 38570 931-403-1000 thuddleston@wocc.com		1 of 1	Yes \$634,434.00

*Shaded bid is apparent lowest responsive bid

AGREEMENT BETWEEN OWNER AND CONTRACTOR FOR CONSTRUCTION CONTRACT (STIPULATED PRICE)

This Agreement is by and between City of Franklin, Tennessee ("Owner") and

Middle Tennessee Infrastructure, Inc. ("Contractor").

Terms used in this Agreement have the meanings stated in the General Conditions and the Supplementary Conditions.

Owner and Contractor hereby agree as follows:

ARTICLE 1—WORK

1.01 CONTRACTOR SHALL COMPLETE ALL WORK AS SPECIFIED OR INDICATED IN THE CONTRACT DOCUMENTS. THE WORK IS GENERALLY DESCRIBED AS FOLLOWS:

The Holiday Inn Court Sewer Improvement Project consists of the demolition of a existing "can" type pump station and replaced with a duplex non-clog submersible pump station and 9'-2" deep wet well all other appurtenances as more clearly defined in the contract drawings. Some gravity piping and a additional manhole will be constructed along with 1000 LF of 6" pressure class 350 DIP restrained joint with Protecto 401 Lining. Pavement repair and Erosion and Sediment Control will also be necessary in the project.

ARTICLE 2—THE PROJECT

2.01 The Project, of which the Work under the Contract Documents is a part, is generally described as follows: Sewer improvements consisting of the replacement of an existing sanitary sewer lift station and new force main extension and all related work.

ARTICLE 3—ENGINEER

3.01 The Franklin Water Management Department ("Engineer"), a department of the Owner, is to assume all duties and responsibilities of Engineer, and have the rights and authority assigned to Engineer in the Contract Documents in connection with the completion of the Work in accordance with the Contract Documents.

3.02 The part of the Project that pertains to the Work has been designed by **Heathcoat/Davis Engineers**.

ARTICLE 4—CONTRACT TIMES

4.01 *Time is of the Essence*

A. All time limits for Milestones, if any, Substantial Completion, and completion and readiness for final payment as stated in the Contract Documents are of the essence of the Contract.

4.03 *Contract Times: Days*

A. The Work will be substantially complete within **180** days after the date when the Contract Times commence to run as provided in Paragraph 4.01 of the General Conditions, and

completed and ready for final payment in accordance with Paragraph 15.06 of the General Conditions within **210** days after the date when the Contract Times commence to run.

4.05 *Liquidated Damages*

- A. Contractor and Owner recognize that time is of the essence as stated in Paragraph 4.01 above and that Owner will suffer financial and other losses if the Work is not completed and Milestones not achieved within the Contract Times, as duly modified. The parties also recognize the delays, expense, and difficulties involved in proving, in a legal or arbitration proceeding, the actual loss suffered by Owner if the Work is not completed on time. Accordingly, instead of requiring any such proof, Owner and Contractor agree that as liquidated damages for delay (but not as a penalty):
 - 1. *Substantial Completion*: Contractor shall pay Owner \$500.00 for each day that expires after the time (as duly adjusted pursuant to the Contract) specified above for Substantial Completion, until the Work is substantially complete.
 - 2. *Completion of Remaining Work*: After Substantial Completion, if Contractor shall neglect, refuse, or fail to complete the remaining Work within the Contract Times (as duly adjusted pursuant to the Contract) for completion and readiness for final payment, Contractor shall pay Owner \$750.00 for each day that expires after such time until the Work is completed and ready for final payment.
 - 3. Liquidated damages for failing to timely attain Substantial Completion, and final completion are not additive, and will not be imposed concurrently.
- B. If Owner recovers liquidated damages for a delay in completion by Contractor, then such liquidated damages are Owner's sole and exclusive remedy for such delay, and Owner is precluded from recovering any other damages, whether actual, direct, excess, or consequential, for such delay, except for special damages (if any) specified in this Agreement.

4.06 *Special Damages*

- A. Contractor shall reimburse Owner (1) for any fines or penalties imposed on Owner as a direct result of the Contractor's failure to attain Substantial Completion according to the Contract Times, and (2) for the actual costs reasonably incurred by Owner for engineering, construction observation, inspection, and administrative services needed after the time specified in Paragraph 4.02 for Substantial Completion (as duly adjusted pursuant to the Contract), until the Work is substantially complete.
- B. After Contractor achieves Substantial Completion, if Contractor shall neglect, refuse, or fail to complete the remaining Work within the Contract Times, Contractor shall reimburse Owner for the actual costs reasonably incurred by Owner for engineering, construction observation, inspection, and administrative services needed after the time specified in Paragraph 4.02 for Work to be completed and ready for final payment (as duly adjusted pursuant to the Contract), until the Work is completed and ready for final payment.
- C. The special damages imposed in this paragraph are supplemental to any liquidated damages for delayed completion established in this Agreement.

ARTICLE 5—CONTRACT PRICE

5.01 Owner shall pay Contractor for completion of the Work in accordance with the Contract Documents, the amounts that follow, subject to adjustment under the Contract:

A. For all Work, at the prices stated in Contractor's Bid, attached hereto as an exhibit.

ARTICLE 6—PAYMENT PROCEDURES

6.01 *Submittal and Processing of Payments*

A. Contractor shall submit Applications for Payment in accordance with Article 15 of the General Conditions. Applications for Payment will be processed by Engineer as provided in the General Conditions.

6.02 *Progress Payments; Retainage*

A. Owner shall make progress payments on the basis of Contractor's Applications for Payment on or about the **[ordinal number, such as 5th]** day of each month during performance of the Work as provided in Paragraph 6.02.A.1 below, provided that such Applications for Payment have been submitted in a timely manner and otherwise meet the requirements of the Contract. All such payments will be measured by the Schedule of Values established as provided in the General Conditions (and in the case of Unit Price Work based on the number of units completed) or, in the event there is no Schedule of Values, as provided elsewhere in the Contract.

1. Prior to Substantial Completion, progress payments will be made in an amount equal to the percentage indicated below but, in each case, less the aggregate of payments previously made and less such amounts as Owner may withhold, including but not limited to liquidated damages, in accordance with the Contract.

- a. **Ninety-five** percent of the value of the Work completed (with the balance being retainage).
- b. **Ninety-Five** percent of cost of materials and equipment not incorporated in the Work (with the balance being retainage).

6.03 *Final Payment*

A. Upon final completion and acceptance of the Work, Owner shall pay the remainder of the Contract Price in accordance with Paragraph 15.06 of the General Conditions.

ARTICLE 7—CONTRACT DOCUMENTS

7.01 *Contents*

A. The Contract Documents consist of all of the following:

1. This Agreement.
2. Bonds:
 - a. Performance bond (together with power of attorney).
 - b. Payment bond (together with power of attorney).

3. General Conditions.
 4. Supplementary Conditions.
 5. Specifications as listed in the table of contents of the project manual (copy of list attached).
 6. Drawings (not attached but incorporated by reference) consisting of **[eight (8)]** sheets (including the cover sheet dated July 6, 2018) with each sheet bearing the following general title: **[SEWER SYSTEM IMPROVEMENTS: REPLACEMENT OF HOLIDAY COURT SEWER PUMP STATION]**.
 7. Addenda (numbers **[1]** to **[3]**, inclusive)
 9. Exhibits to this Agreement (enumerated as follows):
 - a. Contractor's Bid (pages C-00410-1 to C-00410-7, inclusive).
 - b. Documentation submitted by Contractor prior to Notice of Award (not applicable).
 - c. Notice of Award
 - d. Contractor Safety Information (pages C-00452-5 to C-00452-8)
 - e. Acknowledgement of Receipt of City of Franklin Contractor Safety Program (page C-00452-9).
 - f. Conflict of Interest Statement (page C-00453-1).
 - g. Drug-Free Workplace Affidavit (page C-00454-1).
 - h. Contractor's Attestation Regarding Illegal Immigrants or Aliens (page C-00455-1).
 - i. Iran Divestment Act Certification (page C-00456-1).
 10. The following which may be delivered or issued on or after the Effective Date of the Contract and are not attached hereto:
 - a. Notice to Proceed.
 - b. Work Change Directives.
 - c. Change Orders.
 - d. Field Orders.
 - e. Warranty Bond, if any.
- B. The Contract Documents listed in Paragraph 7.01.A are attached to this Agreement (except as expressly noted otherwise above).
- C. There are no Contract Documents other than those listed above in this Article 7.
- D. The Contract Documents may only be amended, modified, or supplemented as provided in the Contract.

ARTICLE 8—REPRESENTATIONS, CERTIFICATIONS, AND STIPULATIONS**8.01 Contractor's Representations**

- A. In order to induce Owner to enter into this Contract, Contractor makes the following representations:
1. Contractor has examined and carefully studied the Contract Documents, including Addenda.
 2. Contractor has visited the Site, conducted a thorough visual examination of the Site and adjacent areas, and become familiar with the general, local, and Site conditions that may affect cost, progress, and performance of the Work.
 3. Contractor is familiar with all Laws and Regulations that may affect cost, progress, and performance of the Work.
 4. Contractor has carefully studied the reports of explorations and tests of subsurface conditions at or adjacent to the Site and the drawings of physical conditions relating to existing surface or subsurface structures at the Site that have been identified in the Supplementary Conditions, with respect to the Technical Data in such reports and drawings.
 5. Contractor has carefully studied the reports and drawings relating to Hazardous Environmental Conditions, if any, at or adjacent to the Site that have been identified in the Supplementary Conditions, with respect to Technical Data in such reports and drawings.
 6. Contractor has considered the information known to Contractor itself; information commonly known to contractors doing business in the locality of the Site; information and observations obtained from visits to the Site; the Contract Documents; and the Technical Data identified in the Supplementary Conditions or by definition, with respect to the effect of such information, observations, and Technical Data on (a) the cost, progress, and performance of the Work; (b) the means, methods, techniques, sequences, and procedures of construction to be employed by Contractor; and (c) Contractor's safety precautions and programs.
 7. Based on the information and observations referred to in the preceding paragraph, Contractor agrees that no further examinations, investigations, explorations, tests, studies, or data are necessary for the performance of the Work at the Contract Price, within the Contract Times, and in accordance with the other terms and conditions of the Contract.
 8. Contractor is aware of the general nature of work to be performed by Owner and others at the Site that relates to the Work as indicated in the Contract Documents.
 9. Contractor has given Engineer written notice of all conflicts, errors, ambiguities, or discrepancies that Contractor has discovered in the Contract Documents, and of discrepancies between Site conditions and the Contract Documents, and the written resolution thereof by Engineer is acceptable to Contractor.
 10. The Contract Documents are generally sufficient to indicate and convey understanding of all terms and conditions for performance and furnishing of the Work.

11. Contractor's entry into this Contract constitutes an incontrovertible representation by Contractor that without exception all prices in the Agreement are premised upon performing and furnishing the Work required by the Contract Documents.

8.02 *Contractor's Certifications*

- A. Contractor certifies that it has not engaged in corrupt, fraudulent, collusive, or coercive practices in competing for or in executing the Contract. For the purposes of this Paragraph 8.02:
 1. "corrupt practice" means the offering, giving, receiving, or soliciting of anything of value likely to influence the action of a public official in the bidding process or in the Contract execution;
 2. "fraudulent practice" means an intentional misrepresentation of facts made (a) to influence the bidding process or the execution of the Contract to the detriment of Owner, (b) to establish Bid or Contract prices at artificial non-competitive levels, or (c) to deprive Owner of the benefits of free and open competition;
 3. "collusive practice" means a scheme or arrangement between two or more Bidders, with or without the knowledge of Owner, a purpose of which is to establish Bid prices at artificial, non-competitive levels; and
 4. "coercive practice" means harming or threatening to harm, directly or indirectly, persons or their property to influence their participation in the bidding process or affect the execution of the Contract.

8.03 *Standard General Conditions*

- A. Owner stipulates that if the General Conditions that are made a part of this Contract are EJCDC® C-700, Standard General Conditions for the Construction Contract (2018), published by the Engineers Joint Contract Documents Committee, and if Owner is the party that has furnished said General Conditions, then Owner has plainly shown all modifications to the standard wording of such published document to the Contractor, through a process such as highlighting or "track changes" (redline/strikeout), or in the Supplementary Conditions.

IN WITNESS WHEREOF, Owner and Contractor have signed this Agreement.

This Agreement will be effective on [] (which is the Effective Date of the Contract).

Owner:

CITY OF FRANKLIN, TN

(typed or printed name of organization)

By:

(individual's signature)

Date:

(date signed)

Name:

Eric S. Stuckey

(typed or printed)

Title:

City Administrator

(typed or printed)

Attest:

(individual's signature)

Title:

(typed or printed)

Address for giving notices:

Franklin Water Management Department

124 Lumber Drive

Franklin, TN 37064

Designated Representative:

Name: Brian C. Goodwin, PE

(typed or printed)

Title:

Asst. Dir., Water Management Dept.

(typed or printed)

Address:

124 Lumber Drive

Franklin, TN 37064

Phone:

615-794-4554

Email:

brian.goodwin@franklintn.gov

(If [Type of Entity] is a corporation, attach evidence of authority to sign. If [Type of Entity] is a public body, attach evidence of authority to sign and resolution or other documents authorizing execution of this Agreement.)

Contractor:

Middle Tennessee Infrastructure, Inc.

(typed or printed name of organization)

By:

(individual's signature)

Date:

(date signed)

Name:

(typed or printed)

Title:

(typed or printed)

(If [Type of Entity] is a corporation, a partnership, or a joint venture, attach evidence of authority to sign.)

Attest:

(individual's signature)

Title:

(typed or printed)

Address for giving notices:

105 Homewood Drive

Murfreesboro, TN 37127

Designated Representative:

Name:

(typed or printed)

Title:

(typed or printed)

Address:

105 Homewood Drive

Murfreesboro, TN 37127

Phone:

Email:

midtni@comcast.net

License No.:

64711

(where applicable)

State:

Tennessee

SECTION C-610**PERFORMANCE BOND**

Contractor Name: Address <i>(principal place of business)</i> :	Surety Name: Address <i>(principal place of business)</i> :
Owner Name: City of Franklin Mailing address: 103 3rd Avenue South Franklin, TN 37064	Contract Description <i>(name and location)</i> : HOLIDAY CT. SEWER IMPROVEMENTS, Franklin, Tennessee Contract Price: [Amount from Contract] Effective Date of Contract:
Bond Bond Amount: [Amount] Date of Bond: <i>(Date of Bond cannot be earlier than Effective Date of Contract)</i> Modifications to this Bond form: ☒ None ☐ See Paragraph 16	
Surety and Contractor, intending to be legally bound hereby, subject to the terms set forth in this Performance Bond, do each cause this Performance Bond to be duly executed by an authorized officer, agent, or representative.	
Contractor as Principal	Surety
<i>(Full formal name of Contractor)</i>	<i>(Full formal name of Surety) (corporate seal)</i>
By: _____ <i>(Signature)</i>	By: _____ <i>(Signature)(Attach Power of Attorney)</i>
Name: _____ <i>(Printed or typed)</i>	Name: _____ <i>(Printed or typed)</i>
Title: _____	Title: _____
Attest: _____ <i>(Signature)</i>	Attest: _____ <i>(Signature)</i>
Name: _____ <i>(Printed or typed)</i>	Name: _____ <i>(Printed or typed)</i>
Title: _____	Title: _____
<i>Notes: (1) Provide supplemental execution by any additional parties, such as joint venturers. (2) Any singular reference to Contractor, Surety, Owner, or other party is considered plural where applicable.</i>	

-
1. The Contractor and Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors, and assigns to the Owner for the performance of the Construction Contract, which is incorporated herein by reference.
 2. If the Contractor performs the Construction Contract, the Surety and the Contractor shall have no obligation under this Bond, except when applicable to participate in a conference as provided in Paragraph 3.
 3. If there is no Owner Default under the Construction Contract, the Surety's obligation under this Bond will arise after:
 - 3.1. The Owner first provides notice to the Contractor and the Surety that the Owner is considering declaring a Contractor Default. Such notice may indicate whether the Owner is requesting a conference among the Owner, Contractor, and Surety to discuss the Contractor's performance. If the Owner does not request a conference, the Surety may, within five (5) business days after receipt of the Owner's notice, request such a conference. If the Surety timely requests a conference, the Owner shall attend. Unless the Owner agrees otherwise, any conference requested under this Paragraph 3.1 will be held within ten (10) business days of the Surety's receipt of the Owner's notice. If the Owner, the Contractor, and the Surety agree, the Contractor shall be allowed a reasonable time to perform the Construction Contract, but such an agreement does not waive the Owner's right, if any, subsequently to declare a Contractor Default;
 - 3.2. The Owner declares a Contractor Default, terminates the Construction Contract and notifies the Surety; and
 - 3.3. The Owner has agreed to pay the Balance of the Contract Price in accordance with the terms of the Construction Contract to the Surety or to a contractor selected to perform the Construction Contract.
 4. Failure on the part of the Owner to comply with the notice requirement in Paragraph 3.1 does not constitute a failure to comply with a condition precedent to the Surety's obligations, or release the Surety from its obligations, except to the extent the Surety demonstrates actual prejudice.
 5. When the Owner has satisfied the conditions of Paragraph 3, the Surety shall promptly and at the Surety's expense take one of the following actions:
 - 5.1. Arrange for the Contractor, with the consent of the Owner, to perform and complete the Construction Contract;
 - 5.2. Undertake to perform and complete the Construction Contract itself, through its agents or independent contractors;
 - 5.3. Obtain bids or negotiated proposals from qualified contractors acceptable to the Owner for a contract for performance and completion of the Construction Contract, arrange for a contract to be prepared for execution by the Owner and a contractor selected with the Owners concurrence, to be secured with performance and payment bonds executed by a qualified surety equivalent to the bonds issued on the Construction Contract, and pay to the Owner the amount of damages as described in Paragraph 7 in excess of the Balance of the Contract Price incurred by the Owner as a result of the Contractor Default; or
 - 5.4. Waive its right to perform and complete, arrange for completion, or obtain a new contractor, and with reasonable promptness under the circumstances:
-

- 5.4.1 After investigation, determine the amount for which it may be liable to the Owner and, as soon as practicable after the amount is determined, make payment to the Owner; or
 - 5.4.2 Deny liability in whole or in part and notify the Owner, citing the reasons for denial.
- 6. If the Surety does not proceed as provided in Paragraph 5 with reasonable promptness, the Surety shall be deemed to be in default on this Bond seven days after receipt of an additional written notice from the Owner to the Surety demanding that the Surety perform its obligations under this Bond, and the Owner shall be entitled to enforce any remedy available to the Owner. If the Surety proceeds as provided in Paragraph 5.4, and the Owner refuses the payment, or the Surety has denied liability, in whole or in part, without further notice, the Owner shall be entitled to enforce any remedy available to the Owner.
- 7. If the Surety elects to act under Paragraph 5.1, 5.2, or 5.3, then the responsibilities of the Surety to the Owner will not be greater than those of the Contractor under the Construction Contract, and the responsibilities of the Owner to the Surety will not be greater than those of the Owner under the Construction Contract. Subject to the commitment by the Owner to pay the Balance of the Contract Price, the Surety is obligated, without duplication for:
 - 7.1. the responsibilities of the Contractor for correction of defective work and completion of the Construction Contract;
 - 7.2. additional legal, design professional, and delay costs resulting from the Contractor's Default, and resulting from the actions or failure to act of the Surety under Paragraph 5; and
 - 7.3. liquidated damages, or if no liquidated damages are specified in the Construction Contract, actual damages caused by delayed performance or non-performance of the Contractor.
- 8. If the Surety elects to act under Paragraph 5.1, 5.3, or 5.4, the Surety's liability is limited to the amount of this Bond.
- 9. The Surety shall not be liable to the Owner or others for obligations of the Contractor that are unrelated to the Construction Contract, and the Balance of the Contract Price will not be reduced or set off on account of any such unrelated obligations. No right of action will accrue on this Bond to any person or entity other than the Owner or its heirs, executors, administrators, successors, and assigns.
- 10. The Surety hereby waives notice of any change, including changes of time, to the Construction Contract or to related subcontracts, purchase orders, and other obligations.
- 11. Any proceeding, legal or equitable, under this Bond must be instituted in any court of competent jurisdiction in the location in which the work or part of the work is located and must be instituted within two years after a declaration of Contractor Default or within two years after the Contractor ceased working or within two years after the Surety refuses or fails to perform its obligations under this Bond, whichever occurs first. If the provisions of this paragraph are void or prohibited by law, the minimum periods of limitations available to sureties as a defense in the jurisdiction of the suit will be applicable.
- 12. Notice to the Surety, the Owner, or the Contractor must be mailed or delivered to the address shown on the page on which their signature appears.
- 13. When this Bond has been furnished to comply with a statutory or other legal requirement in the location where the construction was to be performed, any provision in this Bond conflicting with said statutory or legal requirement will be deemed deleted therefrom and provisions conforming to such

statutory or other legal requirement will be deemed incorporated herein. When so furnished, the intent is that this Bond will be construed as a statutory bond and not as a common law bond.

14. Definitions

14.1. *Balance of the Contract Price*—The total amount payable by the Owner to the Contractor under the Construction Contract after all proper adjustments have been made including allowance for the Contractor for any amounts received or to be received by the Owner in settlement of insurance or other claims for damages to which the Contractor is entitled, reduced by all valid and proper payments made to or on behalf of the Contractor under the Construction Contract.

14.2. *Construction Contract*—The agreement between the Owner and Contractor identified on the cover page, including all Contract Documents and changes made to the agreement and the Contract Documents.

14.3. *Contractor Default*—Failure of the Contractor, which has not been remedied or waived, to perform or otherwise to comply with a material term of the Construction Contract.

14.4. *Owner Default*—Failure of the Owner, which has not been remedied or waived, to pay the Contractor as required under the Construction Contract or to perform and complete or comply with the other material terms of the Construction Contract.

14.5. *Contract Documents*—All the documents that comprise the agreement between the Owner and Contractor.

15. If this Bond is issued for an agreement between a contractor and subcontractor, the term Contractor in this Bond will be deemed to be Subcontractor and the term Owner will be deemed to be Contractor.

16. Modifications to this Bond are as follows: None

SECTION C-615**PAYMENT BOND**

Contractor Name: Address <i>(principal place of business)</i> :	Surety Name: Address <i>(principal place of business)</i> :
Owner Name: City of Franklin Mailing address: 103 3rd Avenue South Franklin, TN 37064	Contract Description <i>(name and location)</i> : HOLIDAY CT. SEWER IMPROVEMENTS, Franklin, Tennessee Contract Price: [Amount, from Contract] Effective Date of Contract:
Bond Bond Amount: [Amount] Date of Bond: <i>(Date of Bond cannot be earlier than Effective Date of Contract)</i> Modifications to this Bond form: ☒ None ☐ See Paragraph 18	
Surety and Contractor, intending to be legally bound hereby, subject to the terms set forth in this Payment Bond, do each cause this Payment Bond to be duly executed by an authorized officer, agent, or representative.	
Contractor as Principal	Surety
<i>(Full formal name of Contractor)</i>	<i>(Full formal name of Surety) (corporate seal)</i>
By: _____	By: _____
<i>(Signature)</i>	<i>(Signature)(Attach Power of Attorney)</i>
Name: _____	Name: _____
<i>(Printed or typed)</i>	<i>(Printed or typed)</i>
Title: _____	Title: _____
Attest: _____	Attest: _____
<i>(Signature)</i>	<i>(Signature)</i>
Name: _____	Name: _____
<i>(Printed or typed)</i>	<i>(Printed or typed)</i>
Title: _____	Title: _____
<i>Notes: (1) Provide supplemental execution by any additional parties, such as joint venturers. (2) Any singular reference to Contractor, Surety, Owner, or other party is considered plural where applicable.</i>	

1. The Contractor and Surety, jointly and severally, bind themselves, their heirs, executors, administrators, successors, and assigns to the Owner to pay for labor, materials, and equipment furnished for use in the performance of the Construction Contract, which is incorporated herein by reference, subject to the following terms.
2. If the Contractor promptly makes payment of all sums due to Claimants, and defends, indemnifies, and holds harmless the Owner from claims, demands, liens, or suits by any person or entity seeking payment for labor, materials, or equipment furnished for use in the performance of the Construction Contract, then the Surety and the Contractor shall have no obligation under this Bond.
3. If there is no Owner Default under the Construction Contract, the Surety's obligation to the Owner under this Bond will arise after the Owner has promptly notified the Contractor and the Surety (at the address described in Paragraph 13) of claims, demands, liens, or suits against the Owner or the Owner's property by any person or entity seeking payment for labor, materials, or equipment furnished for use in the performance of the Construction Contract, and tendered defense of such claims, demands, liens, or suits to the Contractor and the Surety.
4. When the Owner has satisfied the conditions in Paragraph 3, the Surety shall promptly and at the Surety's expense defend, indemnify, and hold harmless the Owner against a duly tendered claim, demand, lien, or suit.
5. The Surety's obligations to a Claimant under this Bond will arise after the following:
 - 5.1. Claimants who do not have a direct contract with the Contractor
 - 5.1.1. have furnished a written notice of non-payment to the Contractor, stating with substantial accuracy the amount claimed and the name of the party to whom the materials were, or equipment was, furnished or supplied or for whom the labor was done or performed, within ninety (90) days after having last performed labor or last furnished materials or equipment included in the Claim; and
 - 5.1.2. have sent a Claim to the Surety (at the address described in Paragraph 13).
 - 5.2. Claimants who are employed by or have a direct contract with the Contractor have sent a Claim to the Surety (at the address described in Paragraph 13).
6. If a notice of non-payment required by Paragraph 5.1.1 is given by the Owner to the Contractor, that is sufficient to satisfy a Claimant's obligation to furnish a written notice of non-payment under Paragraph 5.1.1.
7. When a Claimant has satisfied the conditions of Paragraph 5.1 or 5.2, whichever is applicable, the Surety shall promptly and at the Surety's expense take the following actions:
 - 7.1. Send an answer to the Claimant, with a copy to the Owner, within sixty (60) days after receipt of the Claim, stating the amounts that are undisputed and the basis for challenging any amounts that are disputed; and
 - 7.2. Pay or arrange for payment of any undisputed amounts.
 - 7.3. The Surety's failure to discharge its obligations under Paragraph 7.1 or 7.2 will not be deemed to constitute a waiver of defenses the Surety or Contractor may have or acquire as to a Claim, except as to undisputed amounts for which the Surety and Claimant have reached agreement. If, however, the Surety fails to discharge its obligations under Paragraph 7.1 or 7.2, the Surety

shall indemnify the Claimant for the reasonable attorney's fees the Claimant incurs thereafter to recover any sums found to be due and owing to the Claimant.

8. The Surety's total obligation will not exceed the amount of this Bond, plus the amount of reasonable attorney's fees provided under Paragraph 7.3, and the amount of this Bond will be credited for any payments made in good faith by the Surety.
9. Amounts owed by the Owner to the Contractor under the Construction Contract will be used for the performance of the Construction Contract and to satisfy claims, if any, under any construction performance bond. By the Contractor furnishing and the Owner accepting this Bond, they agree that all funds earned by the Contractor in the performance of the Construction Contract are dedicated to satisfying obligations of the Contractor and Surety under this Bond, subject to the Owner's priority to use the funds for the completion of the work.
10. The Surety shall not be liable to the Owner, Claimants, or others for obligations of the Contractor that are unrelated to the Construction Contract. The Owner shall not be liable for the payment of any costs or expenses of any Claimant under this Bond, and shall have under this Bond no obligation to make payments to or give notice on behalf of Claimants, or otherwise have any obligations to Claimants under this Bond.
11. The Surety hereby waives notice of any change, including changes of time, to the Construction Contract or to related subcontracts, purchase orders, and other obligations.
12. No suit or action will be commenced by a Claimant under this Bond other than in a court of competent jurisdiction in the state in which the project that is the subject of the Construction Contract is located or after the expiration of one year from the date (1) on which the Claimant sent a Claim to the Surety pursuant to Paragraph 5.1.2 or 5.2, or (2) on which the last labor or service was performed by anyone or the last materials or equipment were furnished by anyone under the Construction Contract, whichever of (1) or (2) first occurs. If the provisions of this paragraph are void or prohibited by law, the minimum period of limitation available to sureties as a defense in the jurisdiction of the suit will be applicable.
13. Notice and Claims to the Surety, the Owner, or the Contractor must be mailed or delivered to the address shown on the page on which their signature appears. Actual receipt of notice or Claims, however accomplished, will be sufficient compliance as of the date received.
14. When this Bond has been furnished to comply with a statutory or other legal requirement in the location where the construction was to be performed, any provision in this Bond conflicting with said statutory or legal requirement will be deemed deleted here from and provisions conforming to such statutory or other legal requirement will be deemed incorporated herein. When so furnished, the intent is that this Bond will be construed as a statutory bond and not as a common law bond.
15. Upon requests by any person or entity appearing to be a potential beneficiary of this Bond, the Contractor and Owner shall promptly furnish a copy of this Bond or shall permit a copy to be made.
16. Definitions
 - 16.1. *Claim*—A written statement by the Claimant including at a minimum:
 - 16.1.1. The name of the Claimant;
 - 16.1.2. The name of the person for whom the labor was done, or materials or equipment furnished;

- 16.1.3. A copy of the agreement or purchase order pursuant to which labor, materials, or equipment was furnished for use in the performance of the Construction Contract;
 - 16.1.4. A brief description of the labor, materials, or equipment furnished;
 - 16.1.5. The date on which the Claimant last performed labor or last furnished materials or equipment for use in the performance of the Construction Contract;
 - 16.1.6. The total amount earned by the Claimant for labor, materials, or equipment furnished as of the date of the Claim;
 - 16.1.7. The total amount of previous payments received by the Claimant; and
 - 16.1.8. The total amount due and unpaid to the Claimant for labor, materials, or equipment furnished as of the date of the Claim.
- 16.2. *Claimant*—An individual or entity having a direct contract with the Contractor or with a subcontractor of the Contractor to furnish labor, materials, or equipment for use in the performance of the Construction Contract. The term Claimant also includes any individual or entity that has rightfully asserted a claim under an applicable mechanic's lien or similar statute against the real property upon which the Project is located. The intent of this Bond is to include without limitation in the terms of "labor, materials, or equipment" that part of the water, gas, power, light, heat, oil, gasoline, telephone service, or rental equipment used in the Construction Contract, architectural and engineering services required for performance of the work of the Contractor and the Contractor's subcontractors, and all other items for which a mechanic's lien may be asserted in the jurisdiction where the labor, materials, or equipment were furnished.
- 16.3. *Construction Contract*—The agreement between the Owner and Contractor identified on the cover page, including all Contract Documents and all changes made to the agreement and the Contract Documents.
- 16.4. *Owner Default*—Failure of the Owner, which has not been remedied or waived, to pay the Contractor as required under the Construction Contract or to perform and complete or comply with the other material terms of the Construction Contract.
- 16.5. *Contract Documents*—All the documents that comprise the agreement between the Owner and Contractor.
17. If this Bond is issued for an agreement between a contractor and subcontractor, the term Contractor in this Bond will be deemed to be Subcontractor and the term Owner will be deemed to be Contractor.
18. Modifications to this Bond are as follows: None

STANDARD GENERAL CONDITIONS OF THE CONSTRUCTION CONTRACT

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STANDARD GENERAL CONDITIONS OF THE CONSTRUCTION CONTRACT

ARTICLE 1—DEFINITIONS AND TERMINOLOGY

1.01 *Defined Terms*

- A. Wherever used in the Bidding Requirements or Contract Documents, a term printed with initial capital letters, including the term's singular and plural forms, will have the meaning indicated in the definitions below. In addition to terms specifically defined, terms with initial capital letters in the Contract Documents include references to identified articles and paragraphs, and the titles of other documents or forms.
1. *Addenda*—Written or graphic instruments issued prior to the opening of Bids which clarify, correct, or change the Bidding Requirements or the proposed Contract Documents.
 2. *Agreement*—The written instrument, executed by Owner and Contractor, that sets forth the Contract Price and Contract Times, identifies the parties and the Engineer, and designates the specific items that are Contract Documents.
 3. *Application for Payment*—The document prepared by Contractor, in a form acceptable to Engineer, to request progress or final payments, and which is to be accompanied by such supporting documentation as is required by the Contract Documents.
 4. *Bid*—The offer of a Bidder submitted on the prescribed form setting forth the prices for the Work to be performed.
 5. *Bidder*—An individual or entity that submits a Bid to Owner.
 6. *Bidding Documents*—The Bidding Requirements, the proposed Contract Documents, and all Addenda.
 7. *Bidding Requirements*—The Advertisement or invitation to bid, Instructions to Bidders, Bid Bond or other Bid security, if any, the Bid Form, and the Bid with any attachments.
 8. *Change Order*—A document which is signed by Contractor and Owner and authorizes an addition, deletion, or revision in the Work or an adjustment in the Contract Price or the Contract Times, or other revision to the Contract, issued on or after the Effective Date of the Contract.
 9. *Change Proposal*—A written request by Contractor, duly submitted in compliance with the procedural requirements set forth herein, seeking an adjustment in Contract Price or Contract Times; contesting an initial decision by Engineer concerning the requirements of the Contract Documents or the acceptability of Work under the Contract Documents; challenging a set-off against payments due; or seeking other relief with respect to the terms of the Contract.
 10. *Claim*
 - a. A demand or assertion by Owner directly to Contractor, duly submitted in compliance with the procedural requirements set forth herein, seeking an adjustment of Contract

- Price or Contract Times; contesting an initial decision by Engineer concerning the requirements of the Contract Documents or the acceptability of Work under the Contract Documents; contesting Engineer's decision regarding a Change Proposal; seeking resolution of a contractual issue that Engineer has declined to address; or seeking other relief with respect to the terms of the Contract.
- b. A demand or assertion by Contractor directly to Owner, duly submitted in compliance with the procedural requirements set forth herein, contesting Engineer's decision regarding a Change Proposal, or seeking resolution of a contractual issue that Engineer has declined to address.
 - c. A demand or assertion by Owner or Contractor, duly submitted in compliance with the procedural requirements set forth herein, made pursuant to Paragraph 12.01.A.4, concerning disputes arising after Engineer has issued a recommendation of final payment.
 - d. A demand for money or services by a third party is not a Claim.
11. *Constituent of Concern*—Asbestos, petroleum, radioactive materials, polychlorinated biphenyls (PCBs), lead-based paint (as defined by the HUD/EPA standard), hazardous waste, and any substance, product, waste, or other material of any nature whatsoever that is or becomes listed, regulated, or addressed pursuant to Laws and Regulations regulating, relating to, or imposing liability or standards of conduct concerning, any hazardous, toxic, or dangerous waste, substance, or material.
12. *Contract*—The entire and integrated written contract between Owner and Contractor concerning the Work.
13. *Contract Documents*—Those items so designated in the Agreement, and which together comprise the Contract.
14. *Contract Price*—The money that Owner has agreed to pay Contractor for completion of the Work in accordance with the Contract Documents.
15. *Contract Times*—The number of days or the dates by which Contractor shall: (a) achieve Milestones, if any; (b) achieve Substantial Completion; and (c) complete the Work.
16. *Contractor*—The individual or entity with which Owner has contracted for performance of the Work.
17. *Cost of the Work*—See Paragraph 13.01 for definition.
18. *Drawings*—The part of the Contract that graphically shows the scope, extent, and character of the Work to be performed by Contractor.
19. *Effective Date of the Contract*—The date, indicated in the Agreement, on which the Contract becomes effective.
20. *Electronic Document*—Any Project-related correspondence, attachments to correspondence, data, documents, drawings, information, or graphics, including but not limited to Shop Drawings and other Submittals, that are in an electronic or digital format.
21. *Electronic Means*—Electronic mail (email), upload/download from a secure Project website, or other communications methods that allow: (a) the transmission or communication of Electronic Documents; (b) the documentation of transmissions,

including sending and receipt; (c) printing of the transmitted Electronic Document by the recipient; (d) the storage and archiving of the Electronic Document by sender and recipient; and (e) the use by recipient of the Electronic Document for purposes permitted by this Contract. Electronic Means does not include the use of text messaging, or of Facebook, Twitter, Instagram, or similar social media services for transmission of Electronic Documents.

22. *Engineer*—The individual or entity named as such in the Agreement.
23. *Field Order*—A written order issued by Engineer which requires minor changes in the Work but does not change the Contract Price or the Contract Times.
24. *Hazardous Environmental Condition*—The presence at the Site of Constituents of Concern in such quantities or circumstances that may present a danger to persons or property exposed thereto.
 - a. The presence at the Site of materials that are necessary for the execution of the Work, or that are to be incorporated into the Work, and that are controlled and contained pursuant to industry practices, Laws and Regulations, and the requirements of the Contract, is not a Hazardous Environmental Condition.
 - b. The presence of Constituents of Concern that are to be removed or remediated as part of the Work is not a Hazardous Environmental Condition.
 - c. The presence of Constituents of Concern as part of the routine, anticipated, and obvious working conditions at the Site, is not a Hazardous Environmental Condition.
25. *Laws and Regulations; Laws or Regulations*—Any and all applicable laws, statutes, rules, regulations, ordinances, codes, and binding decrees, resolutions, and orders of any and all governmental bodies, agencies, authorities, and courts having jurisdiction.
26. *Liens*—Charges, security interests, or encumbrances upon Contract-related funds, real property, or personal property.
27. *Milestone*—A principal event in the performance of the Work that the Contract requires Contractor to achieve by an intermediate completion date, or by a time prior to Substantial Completion of all the Work.
28. *Notice of Award*—The written notice by Owner to a Bidder of Owner's acceptance of the Bid.
29. *Notice to Proceed*—A written notice by Owner to Contractor fixing the date on which the Contract Times will commence to run and on which Contractor shall start to perform the Work.
30. *Owner*—The individual or entity with which Contractor has contracted regarding the Work, and which has agreed to pay Contractor for the performance of the Work, pursuant to the terms of the Contract.
31. *Progress Schedule*—A schedule, prepared and maintained by Contractor, describing the sequence and duration of the activities comprising Contractor's plan to accomplish the Work within the Contract Times.

32. *Project*—The total undertaking to be accomplished for Owner by engineers, contractors, and others, including planning, study, design, construction, testing, commissioning, and start-up, and of which the Work to be performed under the Contract Documents is a part.
33. *Resident Project Representative*—The authorized representative of Engineer assigned to assist Engineer at the Site. As used herein, the term Resident Project Representative (RPR) includes any assistants or field staff of Resident Project Representative.
34. *Samples*—Physical examples of materials, equipment, or workmanship that are representative of some portion of the Work and that establish the standards by which such portion of the Work will be judged.
35. *Schedule of Submittals*—A schedule, prepared and maintained by Contractor, of required submittals and the time requirements for Engineer's review of the submittals.
36. *Schedule of Values*—A schedule, prepared and maintained by Contractor, allocating portions of the Contract Price to various portions of the Work and used as the basis for reviewing Contractor's Applications for Payment.
37. *Shop Drawings*—All drawings, diagrams, illustrations, schedules, and other data or information that are specifically prepared or assembled by or for Contractor and submitted by Contractor to illustrate some portion of the Work. Shop Drawings, whether approved or not, are not Drawings and are not Contract Documents.
38. *Site*—Lands or areas indicated in the Contract Documents as being furnished by Owner upon which the Work is to be performed, including rights-of-way and easements, and such other lands or areas furnished by Owner which are designated for the use of Contractor.
39. *Specifications*—The part of the Contract that consists of written requirements for materials, equipment, systems, standards, and workmanship as applied to the Work, and certain administrative requirements and procedural matters applicable to the Work.
40. *Subcontractor*—An individual or entity having a direct contract with Contractor or with any other Subcontractor for the performance of a part of the Work.
41. *Submittal*—A written or graphic document, prepared by or for Contractor, which the Contract Documents require Contractor to submit to Engineer, or that is indicated as a Submittal in the Schedule of Submittals accepted by Engineer. Submittals may include Shop Drawings and Samples; schedules; product data; Owner-delegated designs; sustainable design information; information on special procedures; testing plans; results of tests and evaluations, source quality-control testing and inspections, and field or Site quality-control testing and inspections; warranties and certifications; Suppliers' instructions and reports; records of delivery of spare parts and tools; operations and maintenance data; Project photographic documentation; record documents; and other such documents required by the Contract Documents. Submittals, whether or not approved or accepted by Engineer, are not Contract Documents. Change Proposals, Change Orders, Claims, notices, Applications for Payment, and requests for interpretation or clarification are not Submittals.
42. *Substantial Completion*—The time at which the Work (or a specified part thereof) has progressed to the point where, in the opinion of Engineer, the Work (or a specified part

thereof) is sufficiently complete, in accordance with the Contract Documents, so that the Work (or a specified part thereof) can be utilized for the purposes for which it is intended. The terms “substantially complete” and “substantially completed” as applied to all or part of the Work refer to Substantial Completion of such Work.

43. *Successful Bidder*—The Bidder to which the Owner makes an award of contract.
44. *Supplementary Conditions*—The part of the Contract that amends or supplements these General Conditions.
45. *Supplier*—A manufacturer, fabricator, supplier, distributor, or vendor having a direct contract with Contractor or with any Subcontractor to furnish materials or equipment to be incorporated in the Work by Contractor or a Subcontractor.
46. *Technical Data*
- a. Those items expressly identified as Technical Data in the Supplementary Conditions, with respect to either (1) existing subsurface conditions at or adjacent to the Site, or existing physical conditions at or adjacent to the Site including existing surface or subsurface structures (except Underground Facilities) or (2) Hazardous Environmental Conditions at the Site.
 - b. If no such express identifications of Technical Data have been made with respect to conditions at the Site, then Technical Data is defined, with respect to conditions at the Site under Paragraphs 5.03, 5.04, and 5.06, as the data contained in boring logs, recorded measurements of subsurface water levels, assessments of the condition of subsurface facilities, laboratory test results, and other factual, objective information regarding conditions at the Site that are set forth in any geotechnical, environmental, or other Site or facilities conditions report prepared for the Project and made available to Contractor.
 - c. Information and data regarding the presence or location of Underground Facilities are not intended to be categorized, identified, or defined as Technical Data, and instead Underground Facilities are shown or indicated on the Drawings.
47. *Underground Facilities*—All active or not-in-service underground lines, pipelines, conduits, ducts, encasements, cables, wires, manholes, vaults, tanks, tunnels, or other such facilities or systems at the Site, including but not limited to those facilities or systems that produce, transmit, distribute, or convey telephone or other communications, cable television, fiber optic transmissions, power, electricity, light, heat, gases, oil, crude oil products, liquid petroleum products, water, steam, waste, wastewater, storm water, other liquids or chemicals, or traffic or other control systems. An abandoned facility or system is not an Underground Facility.
48. *Unit Price Work*—Work to be paid for on the basis of unit prices.
49. *Work*—The entire construction or the various separately identifiable parts thereof required to be provided under the Contract Documents. Work includes and is the result of performing or providing all labor, services, and documentation necessary to produce such construction; furnishing, installing, and incorporating all materials and equipment into such construction; and may include related services such as testing, start-up, and commissioning, all as required by the Contract Documents.

50. *Work Change Directive*—A written directive to Contractor issued on or after the Effective Date of the Contract, signed by Owner and recommended by Engineer, ordering an addition, deletion, or revision in the Work.

1.02 *Terminology*

- A. The words and terms discussed in Paragraphs 1.02.B, C, D, and E are not defined terms that require initial capital letters, but, when used in the Bidding Requirements or Contract Documents, have the indicated meaning.
- B. *Intent of Certain Terms or Adjectives*: The Contract Documents include the terms “as allowed,” “as approved,” “as ordered,” “as directed” or terms of like effect or import to authorize an exercise of professional judgment by Engineer. In addition, the adjectives “reasonable,” “suitable,” “acceptable,” “proper,” “satisfactory,” or adjectives of like effect or import are used to describe an action or determination of Engineer as to the Work. It is intended that such exercise of professional judgment, action, or determination will be solely to evaluate, in general, the Work for compliance with the information in the Contract Documents and with the design concept of the Project as a functioning whole as shown or indicated in the Contract Documents (unless there is a specific statement indicating otherwise). The use of any such term or adjective is not intended to and shall not be effective to assign to Engineer any duty or authority to supervise or direct the performance of the Work, or any duty or authority to undertake responsibility contrary to the provisions of Article 10 or any other provision of the Contract Documents.
- C. *Day*: The word “day” means a calendar day of 24 hours measured from midnight to the next midnight.
- D. *Defective*: The word “defective,” when modifying the word “Work,” refers to Work that is unsatisfactory, faulty, or deficient in that it:
 - 1. does not conform to the Contract Documents;
 - 2. does not meet the requirements of any applicable inspection, reference standard, test, or approval referred to in the Contract Documents; or
 - 3. has been damaged prior to Engineer’s recommendation of final payment (unless responsibility for the protection thereof has been assumed by Owner at Substantial Completion in accordance with Paragraph 15.03 or Paragraph 15.04).
- E. *Furnish, Install, Perform, Provide*
 - 1. The word “furnish,” when used in connection with services, materials, or equipment, means to supply and deliver said services, materials, or equipment to the Site (or some other specified location) ready for use or installation and in usable or operable condition.
 - 2. The word “install,” when used in connection with services, materials, or equipment, means to put into use or place in final position said services, materials, or equipment complete and ready for intended use.
 - 3. The words “perform” or “provide,” when used in connection with services, materials, or equipment, means to furnish and install said services, materials, or equipment complete and ready for intended use.

4. If the Contract Documents establish an obligation of Contractor with respect to specific services, materials, or equipment, but do not expressly use any of the four words “furnish,” “install,” “perform,” or “provide,” then Contractor shall furnish and install said services, materials, or equipment complete and ready for intended use.
- F. *Contract Price or Contract Times*: References to a change in “Contract Price or Contract Times” or “Contract Times or Contract Price” or similar, indicate that such change applies to (1) Contract Price, (2) Contract Times, or (3) both Contract Price and Contract Times, as warranted, even if the term “or both” is not expressed.
- G. Unless stated otherwise in the Contract Documents, words or phrases that have a well-known technical or construction industry or trade meaning are used in the Contract Documents in accordance with such recognized meaning.

ARTICLE 2—PRELIMINARY MATTERS

2.01 *Delivery of Performance and Payment Bonds; Evidence of Insurance*

- A. *Performance and Payment Bonds*: When Contractor delivers the signed counterparts of the Agreement to Owner, Contractor shall also deliver to Owner the performance bond and payment bond (if the Contract requires Contractor to furnish such bonds).
- B. *Evidence of Contractor’s Insurance*: When Contractor delivers the signed counterparts of the Agreement to Owner, Contractor shall also deliver to Owner, with copies to each additional insured (as identified in the Contract), the certificates, endorsements, and other evidence of insurance required to be provided by Contractor in accordance with Article 6, except to the extent the Supplementary Conditions expressly establish other dates for delivery of specific insurance policies.
- C. *Evidence of Owner’s Insurance*: After receipt of the signed counterparts of the Agreement and all required bonds and insurance documentation, Owner shall promptly deliver to Contractor, with copies to each additional insured (as identified in the Contract), the certificates and other evidence of insurance required to be provided by Owner under Article 6.

2.02 *Copies of Documents*

- A. Owner shall furnish to Contractor four printed copies of the Contract (including one fully signed counterpart of the Agreement), and one copy in electronic portable document format (PDF). Additional printed copies will be furnished upon request at the cost of reproduction.
- B. Owner shall maintain and safeguard at least one original printed record version of the Contract, including Drawings and Specifications signed and sealed by Engineer and other design professionals. Owner shall make such original printed record version of the Contract available to Contractor for review. Owner may delegate the responsibilities under this provision to Engineer.

2.03 *Before Starting Construction*

- A. *Preliminary Schedules:* Within 10 days after the Effective Date of the Contract (or as otherwise required by the Contract Documents), Contractor shall submit to Engineer for timely review:
1. a preliminary Progress Schedule indicating the times (numbers of days or dates) for starting and completing the various stages of the Work, including any Milestones specified in the Contract;
 2. a preliminary Schedule of Submittals; and
 3. a preliminary Schedule of Values for all of the Work which includes quantities and prices of items which when added together equal the Contract Price and subdivides the Work into component parts in sufficient detail to serve as the basis for progress payments during performance of the Work. Such prices will include an appropriate amount of overhead and profit applicable to each item of Work.

2.04 *Preconstruction Conference; Designation of Authorized Representatives*

- A. Before any Work at the Site is started, a conference attended by Owner, Contractor, Engineer, and others as appropriate will be held to establish a working understanding among the parties as to the Work, and to discuss the schedules referred to in Paragraph 2.03.A, procedures for handling Shop Drawings, Samples, and other Submittals, processing Applications for Payment, electronic or digital transmittals, and maintaining required records.
- B. At this conference Owner and Contractor each shall designate, in writing, a specific individual to act as its authorized representative with respect to the services and responsibilities under the Contract. Such individuals shall have the authority to transmit and receive information, render decisions relative to the Contract, and otherwise act on behalf of each respective party.

2.05 *Acceptance of Schedules*

- A. At least 10 days before submission of the first Application for Payment a conference, attended by Contractor, Engineer, and others as appropriate, will be held to review the schedules submitted in accordance with Paragraph 2.03.A. No progress payment will be made to Contractor until acceptable schedules are submitted to Engineer.
1. The Progress Schedule will be acceptable to Engineer if it provides an orderly progression of the Work to completion within the Contract Times. Such acceptance will not impose on Engineer responsibility for the Progress Schedule, for sequencing, scheduling, or progress of the Work, nor interfere with or relieve Contractor from Contractor's full responsibility therefor.
 2. Contractor's Schedule of Submittals will be acceptable to Engineer if it provides a workable arrangement for reviewing and processing the required submittals.
 3. Contractor's Schedule of Values will be acceptable to Engineer as to form and substance if it provides a reasonable allocation of the Contract Price to the component parts of the Work.
 4. If a schedule is not acceptable, Contractor will have an additional 10 days to revise and resubmit the schedule.

2.06 *Electronic Transmittals*

- A. Except as otherwise stated elsewhere in the Contract, the Owner, Engineer, and Contractor may send, and shall accept, Electronic Documents transmitted by Electronic Means.
- B. If the Contract does not establish protocols for Electronic Means, then Owner, Engineer, and Contractor shall jointly develop such protocols.
- C. Subject to any governing protocols for Electronic Means, when transmitting Electronic Documents by Electronic Means, the transmitting party makes no representations as to long-term compatibility, usability, or readability of the Electronic Documents resulting from the recipient's use of software application packages, operating systems, or computer hardware differing from those used in the drafting or transmittal of the Electronic Documents.

ARTICLE 3—CONTRACT DOCUMENTS: INTENT, REQUIREMENTS, REUSE

3.01 *Intent*

- A. The Contract Documents are complementary; what is required by one Contract Document is as binding as if required by all.
- B. It is the intent of the Contract Documents to describe a functionally complete Project (or part thereof) to be constructed in accordance with the Contract Documents.
- C. Unless otherwise stated in the Contract Documents, if there is a discrepancy between the electronic versions of the Contract Documents (including any printed copies derived from such electronic versions) and the printed record version, the printed record version will govern.
- D. The Contract supersedes prior negotiations, representations, and agreements, whether written or oral.
- E. Engineer will issue clarifications and interpretations of the Contract Documents as provided herein.
- F. Any provision or part of the Contract Documents held to be void or unenforceable under any Law or Regulation will be deemed stricken, and all remaining provisions will continue to be valid and binding upon Owner and Contractor, which agree that the Contract Documents will be reformed to replace such stricken provision or part thereof with a valid and enforceable provision that comes as close as possible to expressing the intention of the stricken provision.
- G. Nothing in the Contract Documents creates:
 - 1. any contractual relationship between Owner or Engineer and any Subcontractor, Supplier, or other individual or entity performing or furnishing any of the Work, for the benefit of such Subcontractor, Supplier, or other individual or entity; or
 - 2. any obligation on the part of Owner or Engineer to pay or to see to the payment of any money due any such Subcontractor, Supplier, or other individual or entity, except as may otherwise be required by Laws and Regulations.

3.02 *Reference Standards*

A. *Standards Specifications, Codes, Laws and Regulations*

1. Reference in the Contract Documents to standard specifications, manuals, reference standards, or codes of any technical society, organization, or association, or to Laws or Regulations, whether such reference be specific or by implication, means the standard specification, manual, reference standard, code, or Laws or Regulations in effect at the time of opening of Bids (or on the Effective Date of the Contract if there were no Bids), except as may be otherwise specifically stated in the Contract Documents.
2. No provision of any such standard specification, manual, reference standard, or code, and no instruction of a Supplier, will be effective to change the duties or responsibilities of Owner, Contractor, or Engineer from those set forth in the part of the Contract Documents prepared by or for Engineer. No such provision or instruction shall be effective to assign to Owner or Engineer any duty or authority to supervise or direct the performance of the Work, or any duty or authority to undertake responsibility inconsistent with the provisions of the part of the Contract Documents prepared by or for Engineer.

3.03 *Reporting and Resolving Discrepancies*

A. *Reporting Discrepancies*

1. *Contractor's Verification of Figures and Field Measurements:* Before undertaking each part of the Work, Contractor shall carefully study the Contract Documents, and check and verify pertinent figures and dimensions therein, particularly with respect to applicable field measurements. Contractor shall promptly report in writing to Engineer any conflict, error, ambiguity, or discrepancy that Contractor discovers, or has actual knowledge of, and shall not proceed with any Work affected thereby until the conflict, error, ambiguity, or discrepancy is resolved by a clarification or interpretation by Engineer, or by an amendment or supplement to the Contract issued pursuant to Paragraph 11.01.
2. *Contractor's Review of Contract Documents:* If, before or during the performance of the Work, Contractor discovers any conflict, error, ambiguity, or discrepancy within the Contract Documents, or between the Contract Documents and (a) any applicable Law or Regulation, (b) actual field conditions, (c) any standard specification, manual, reference standard, or code, or (d) any instruction of any Supplier, then Contractor shall promptly report it to Engineer in writing. Contractor shall not proceed with the Work affected thereby (except in an emergency as required by Paragraph 7.15) until the conflict, error, ambiguity, or discrepancy is resolved, by a clarification or interpretation by Engineer, or by an amendment or supplement to the Contract issued pursuant to Paragraph 11.01.
3. Contractor shall not be liable to Owner or Engineer for failure to report any conflict, error, ambiguity, or discrepancy in the Contract Documents unless Contractor had actual knowledge thereof.

B. *Resolving Discrepancies*

1. Except as may be otherwise specifically stated in the Contract Documents, the provisions of the part of the Contract Documents prepared by or for Engineer take precedence in

resolving any conflict, error, ambiguity, or discrepancy between such provisions of the Contract Documents and:

- a. the provisions of any standard specification, manual, reference standard, or code, or the instruction of any Supplier (whether or not specifically incorporated by reference as a Contract Document); or
- b. the provisions of any Laws or Regulations applicable to the performance of the Work (unless such an interpretation of the provisions of the Contract Documents would result in violation of such Law or Regulation).

3.04 *Requirements of the Contract Documents*

- A. During the performance of the Work and until final payment, Contractor and Owner shall submit to the Engineer in writing all matters in question concerning the requirements of the Contract Documents (sometimes referred to as requests for information or interpretation—RFIs), or relating to the acceptability of the Work under the Contract Documents, as soon as possible after such matters arise. Engineer will be the initial interpreter of the requirements of the Contract Documents, and judge of the acceptability of the Work.
- B. Engineer will, with reasonable promptness, render a written clarification, interpretation, or decision on the issue submitted, or initiate an amendment or supplement to the Contract Documents. Engineer's written clarification, interpretation, or decision will be final and binding on Contractor, unless it appeals by submitting a Change Proposal, and on Owner, unless it appeals by filing a Claim.
- C. If a submitted matter in question concerns terms and conditions of the Contract Documents that do not involve (1) the performance or acceptability of the Work under the Contract Documents, (2) the design (as set forth in the Drawings, Specifications, or otherwise), or (3) other engineering or technical matters, then Engineer will promptly notify Owner and Contractor in writing that Engineer is unable to provide a decision or interpretation. If Owner and Contractor are unable to agree on resolution of such a matter in question, either party may pursue resolution as provided in Article 12.

3.05 *Reuse of Documents*

- A. Contractor and its Subcontractors and Suppliers shall not:
 1. have or acquire any title to or ownership rights in any of the Drawings, Specifications, or other documents (or copies of any thereof) prepared by or bearing the seal of Engineer or its consultants, including electronic media versions, or reuse any such Drawings, Specifications, other documents, or copies thereof on extensions of the Project or any other project without written consent of Owner and Engineer and specific written verification or adaptation by Engineer; or
 2. have or acquire any title or ownership rights in any other Contract Documents, reuse any such Contract Documents for any purpose without Owner's express written consent, or violate any copyrights pertaining to such Contract Documents.
- B. The prohibitions of this Paragraph 3.05 will survive final payment, or termination of the Contract. Nothing herein precludes Contractor from retaining copies of the Contract Documents for record purposes.

ARTICLE 4—COMMENCEMENT AND PROGRESS OF THE WORK

4.01 *Commencement of Contract Times; Notice to Proceed*

- A. The Contract Times will commence to run on the 30th day after the Effective Date of the Contract or, if a Notice to Proceed is given, on the day indicated in the Notice to Proceed. A Notice to Proceed may be given at any time within 30 days after the Effective Date of the Contract. In no event will the Contract Times commence to run later than the 60th day after the day of Bid opening or the 30th day after the Effective Date of the Contract, whichever date is earlier.

4.02 *Starting the Work*

- A. Contractor shall start to perform the Work on the date when the Contract Times commence to run. No Work may be done at the Site prior to such date.

4.03 *Reference Points*

- A. Owner shall provide engineering surveys to establish reference points for construction which in Engineer's judgment are necessary to enable Contractor to proceed with the Work. Contractor shall be responsible for laying out the Work, shall protect and preserve the established reference points and property monuments, and shall make no changes or relocations without the prior written approval of Owner. Contractor shall report to Engineer whenever any reference point or property monument is lost or destroyed or requires relocation because of necessary changes in grades or locations, and shall be responsible for the accurate replacement or relocation of such reference points or property monuments by professionally qualified personnel.

4.04 *Progress Schedule*

- A. Contractor shall adhere to the Progress Schedule established in accordance with Paragraph 2.05 as it may be adjusted from time to time as provided below.
 - 1. Contractor shall submit to Engineer for acceptance (to the extent indicated in Paragraph 2.05) proposed adjustments in the Progress Schedule that will not result in changing the Contract Times.
 - 2. Proposed adjustments in the Progress Schedule that will change the Contract Times must be submitted in accordance with the requirements of Article 11.
- B. Contractor shall carry on the Work and adhere to the Progress Schedule during all disputes or disagreements with Owner. No Work will be delayed or postponed pending resolution of any disputes or disagreements, or during any appeal process, except as permitted by Paragraph 16.04, or as Owner and Contractor may otherwise agree in writing.

4.05 *Delays in Contractor's Progress*

- A. If Owner, Engineer, or anyone for whom Owner is responsible, delays, disrupts, or interferes with the performance or progress of the Work, then Contractor shall be entitled to an equitable adjustment in Contract Price or Contract Times.
- B. Contractor shall not be entitled to an adjustment in Contract Price or Contract Times for delay, disruption, or interference caused by or within the control of Contractor. Delay, disruption,

and interference attributable to and within the control of a Subcontractor or Supplier shall be deemed to be within the control of Contractor.

- C. If Contractor's performance or progress is delayed, disrupted, or interfered with by unanticipated causes not the fault of and beyond the control of Owner, Contractor, and those for which they are responsible, then Contractor shall be entitled to an equitable adjustment in Contract Times. Such an adjustment will be Contractor's sole and exclusive remedy for the delays, disruption, and interference described in this paragraph. Causes of delay, disruption, or interference that may give rise to an adjustment in Contract Times under this paragraph include but are not limited to the following:
 - 1. Severe and unavoidable natural catastrophes such as fires, floods, epidemics, and earthquakes;
 - 2. Abnormal weather conditions;
 - 3. Acts or failures to act of third-party utility owners or other third-party entities (other than those third-party utility owners or other third-party entities performing other work at or adjacent to the Site as arranged by or under contract with Owner, as contemplated in Article 8); and
 - 4. Acts of war or terrorism.
- D. Contractor's entitlement to an adjustment of Contract Times or Contract Price is limited as follows:
 - 1. Contractor's entitlement to an adjustment of the Contract Times is conditioned on the delay, disruption, or interference adversely affecting an activity on the critical path to completion of the Work, as of the time of the delay, disruption, or interference.
 - 2. Contractor shall not be entitled to an adjustment in Contract Price for any delay, disruption, or interference if such delay is concurrent with a delay, disruption, or interference caused by or within the control of Contractor. Such a concurrent delay by Contractor shall not preclude an adjustment of Contract Times to which Contractor is otherwise entitled.
 - 3. Adjustments of Contract Times or Contract Price are subject to the provisions of Article 11.
- E. Each Contractor request or Change Proposal seeking an increase in Contract Times or Contract Price must be supplemented by supporting data that sets forth in detail the following:
 - 1. The circumstances that form the basis for the requested adjustment;
 - 2. The date upon which each cause of delay, disruption, or interference began to affect the progress of the Work;
 - 3. The date upon which each cause of delay, disruption, or interference ceased to affect the progress of the Work;
 - 4. The number of days' increase in Contract Times claimed as a consequence of each such cause of delay, disruption, or interference; and
 - 5. The impact on Contract Price, in accordance with the provisions of Paragraph 11.07.

Contractor shall also furnish such additional supporting documentation as Owner or Engineer may require including, where appropriate, a revised progress schedule indicating all the activities affected by the delay, disruption, or interference, and an explanation of the effect of the delay, disruption, or interference on the critical path to completion of the Work.

- F. Delays, disruption, and interference to the performance or progress of the Work resulting from the existence of a differing subsurface or physical condition, an Underground Facility that was not shown or indicated by the Contract Documents, or not shown or indicated with reasonable accuracy, and those resulting from Hazardous Environmental Conditions, are governed by Article 5, together with the provisions of Paragraphs 4.05.D and 4.05.E.
- G. Paragraph 8.03 addresses delays, disruption, and interference to the performance or progress of the Work resulting from the performance of certain other work at or adjacent to the Site.

ARTICLE 5—SITE; SUBSURFACE AND PHYSICAL CONDITIONS; HAZARDOUS ENVIRONMENTAL CONDITIONS

5.01 *Availability of Lands*

- A. Owner shall furnish the Site. Owner shall notify Contractor in writing of any encumbrances or restrictions not of general application but specifically related to use of the Site with which Contractor must comply in performing the Work.
- B. Upon reasonable written request, Owner shall furnish Contractor with a current statement of record legal title and legal description of the lands upon which permanent improvements are to be made and Owner's interest therein as necessary for giving notice of or filing a mechanic's or construction lien against such lands in accordance with applicable Laws and Regulations.
- C. Contractor shall provide for all additional lands and access thereto that may be required for temporary construction facilities or storage of materials and equipment.

5.02 *Use of Site and Other Areas*

A. *Limitation on Use of Site and Other Areas*

- 1. Contractor shall confine construction equipment, temporary construction facilities, the storage of materials and equipment, and the operations of workers to the Site, adjacent areas that Contractor has arranged to use through construction easements or otherwise, and other adjacent areas permitted by Laws and Regulations, and shall not unreasonably encumber the Site and such other adjacent areas with construction equipment or other materials or equipment. Contractor shall assume full responsibility for (a) damage to the Site; (b) damage to any such other adjacent areas used for Contractor's operations; (c) damage to any other adjacent land or areas, or to improvements, structures, utilities, or similar facilities located at such adjacent lands or areas; and (d) for injuries and losses sustained by the owners or occupants of any such land or areas; provided that such damage or injuries result from the performance of the Work or from other actions or conduct of the Contractor or those for which Contractor is responsible.
- 2. If a damage or injury claim is made by the owner or occupant of any such land or area because of the performance of the Work, or because of other actions or conduct of the Contractor or those for which Contractor is responsible, Contractor shall (a) take immediate corrective or remedial action as required by Paragraph 7.13, or otherwise; (b)

promptly attempt to settle the claim as to all parties through negotiations with such owner or occupant, or otherwise resolve the claim by arbitration or other dispute resolution proceeding, or in a court of competent jurisdiction; and (c) to the fullest extent permitted by Laws and Regulations, indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them, from and against any such claim, and against all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to any claim or action, legal or equitable, brought by any such owner or occupant against Owner, Engineer, or any other party indemnified hereunder to the extent caused directly or indirectly, in whole or in part by, or based upon, Contractor's performance of the Work, or because of other actions or conduct of the Contractor or those for which Contractor is responsible.

- B. *Removal of Debris During Performance of the Work:* During the progress of the Work the Contractor shall keep the Site and other adjacent areas free from accumulations of waste materials, rubbish, and other debris. Removal and disposal of such waste materials, rubbish, and other debris will conform to applicable Laws and Regulations.
- C. *Cleaning:* Prior to Substantial Completion of the Work Contractor shall clean the Site and the Work and make it ready for utilization by Owner. At the completion of the Work Contractor shall remove from the Site and adjacent areas all tools, appliances, construction equipment and machinery, and surplus materials and shall restore to original condition all property not designated for alteration by the Contract Documents.
- D. *Loading of Structures:* Contractor shall not load nor permit any part of any structure to be loaded in any manner that will endanger the structure, nor shall Contractor subject any part of the Work or adjacent structures or land to stresses or pressures that will endanger them.

5.03 *Subsurface and Physical Conditions*

- A. *Reports and Drawings:* The Supplementary Conditions identify:
 - 1. Those reports of explorations and tests of subsurface conditions at or adjacent to the Site that contain Technical Data;
 - 2. Those drawings of existing physical conditions at or adjacent to the Site, including those drawings depicting existing surface or subsurface structures at or adjacent to the Site (except Underground Facilities), that contain Technical Data; and
 - 3. Technical Data contained in such reports and drawings.
- B. *Underground Facilities:* Underground Facilities are shown or indicated on the Drawings, pursuant to Paragraph 5.05, and not in the drawings referred to in Paragraph 5.03.A. Information and data regarding the presence or location of Underground Facilities are not intended to be categorized, identified, or defined as Technical Data.
- C. *Reliance by Contractor on Technical Data:* Contractor may rely upon the accuracy of the Technical Data expressly identified in the Supplementary Conditions with respect to such reports and drawings, but such reports and drawings are not Contract Documents. If no such express identification has been made, then Contractor may rely upon the accuracy of the Technical Data as defined in Paragraph 1.01.A.46.b.

D. *Limitations of Other Data and Documents:* Except for such reliance on Technical Data, Contractor may not rely upon or make any claim against Owner or Engineer, or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, with respect to:

1. the completeness of such reports and drawings for Contractor's purposes, including, but not limited to, any aspects of the means, methods, techniques, sequences, and procedures of construction to be employed by Contractor, and safety precautions and programs incident thereto;
2. other data, interpretations, opinions, and information contained in such reports or shown or indicated in such drawings;
3. the contents of other Site-related documents made available to Contractor, such as record drawings from other projects at or adjacent to the Site, or Owner's archival documents concerning the Site; or
4. any Contractor interpretation of or conclusion drawn from any Technical Data or any such other data, interpretations, opinions, or information.

5.04 *Differing Subsurface or Physical Conditions*

A. *Notice by Contractor:* If Contractor believes that any subsurface or physical condition that is uncovered or revealed at the Site:

1. is of such a nature as to establish that any Technical Data on which Contractor is entitled to rely as provided in Paragraph 5.03 is materially inaccurate;
2. is of such a nature as to require a change in the Drawings or Specifications;
3. differs materially from that shown or indicated in the Contract Documents; or
4. is of an unusual nature, and differs materially from conditions ordinarily encountered and generally recognized as inherent in work of the character provided for in the Contract Documents;

then Contractor shall, promptly after becoming aware thereof and before further disturbing the subsurface or physical conditions or performing any Work in connection therewith (except in an emergency as required by Paragraph 7.15), notify Owner and Engineer in writing about such condition. Contractor shall not further disturb such condition or perform any Work in connection therewith (except with respect to an emergency) until receipt of a written statement permitting Contractor to do so.

B. *Engineer's Review:* After receipt of written notice as required by the preceding paragraph, Engineer will promptly review the subsurface or physical condition in question; determine whether it is necessary for Owner to obtain additional exploration or tests with respect to the condition; conclude whether the condition falls within any one or more of the differing site condition categories in Paragraph 5.04.A; obtain any pertinent cost or schedule information from Contractor; prepare recommendations to Owner regarding the Contractor's resumption of Work in connection with the subsurface or physical condition in question and the need for any change in the Drawings or Specifications; and advise Owner in writing of Engineer's findings, conclusions, and recommendations.

- C. *Owner's Statement to Contractor Regarding Site Condition:* After receipt of Engineer's written findings, conclusions, and recommendations, Owner shall issue a written statement to Contractor (with a copy to Engineer) regarding the subsurface or physical condition in question, addressing the resumption of Work in connection with such condition, indicating whether any change in the Drawings or Specifications will be made, and adopting or rejecting Engineer's written findings, conclusions, and recommendations, in whole or in part.
- D. *Early Resumption of Work:* If at any time Engineer determines that Work in connection with the subsurface or physical condition in question may resume prior to completion of Engineer's review or Owner's issuance of its statement to Contractor, because the condition in question has been adequately documented, and analyzed on a preliminary basis, then the Engineer may at its discretion instruct Contractor to resume such Work.
- E. *Possible Price and Times Adjustments*
 - 1. Contractor shall be entitled to an equitable adjustment in Contract Price or Contract Times, to the extent that the existence of a differing subsurface or physical condition, or any related delay, disruption, or interference, causes an increase or decrease in Contractor's cost of, or time required for, performance of the Work; subject, however, to the following:
 - a. Such condition must fall within any one or more of the categories described in Paragraph 5.04.A;
 - b. With respect to Work that is paid for on a unit price basis, any adjustment in Contract Price will be subject to the provisions of Paragraph 13.03; and,
 - c. Contractor's entitlement to an adjustment of the Contract Times is subject to the provisions of Paragraphs 4.05.D and 4.05.E.
 - 2. Contractor shall not be entitled to any adjustment in the Contract Price or Contract Times with respect to a subsurface or physical condition if:
 - a. Contractor knew of the existence of such condition at the time Contractor made a commitment to Owner with respect to Contract Price and Contract Times by the submission of a Bid or becoming bound under a negotiated contract, or otherwise;
 - b. The existence of such condition reasonably could have been discovered or revealed as a result of any examination, investigation, exploration, test, or study of the Site and contiguous areas expressly required by the Bidding Requirements or Contract Documents to be conducted by or for Contractor prior to Contractor's making such commitment; or
 - c. Contractor failed to give the written notice required by Paragraph 5.04.A.
 - 3. If Owner and Contractor agree regarding Contractor's entitlement to and the amount or extent of any adjustment in the Contract Price or Contract Times, then any such adjustment will be set forth in a Change Order.
 - 4. Contractor may submit a Change Proposal regarding its entitlement to or the amount or extent of any adjustment in the Contract Price or Contract Times, no later than 30 days after Owner's issuance of the Owner's written statement to Contractor regarding the subsurface or physical condition in question.

- F. *Underground Facilities; Hazardous Environmental Conditions*: Paragraph 5.05 governs rights and responsibilities regarding the presence or location of Underground Facilities. Paragraph 5.06 governs rights and responsibilities regarding Hazardous Environmental Conditions. The provisions of Paragraphs 5.03 and 5.04 are not applicable to the presence or location of Underground Facilities, or to Hazardous Environmental Conditions.

5.05 *Underground Facilities*

- A. *Contractor's Responsibilities*: Unless it is otherwise expressly provided in the Supplementary Conditions, the cost of all of the following are included in the Contract Price, and Contractor shall have full responsibility for:
1. reviewing and checking all information and data regarding existing Underground Facilities at the Site;
 2. complying with applicable state and local utility damage prevention Laws and Regulations;
 3. verifying the actual location of those Underground Facilities shown or indicated in the Contract Documents as being within the area affected by the Work, by exposing such Underground Facilities during the course of construction;
 4. coordination of the Work with the owners (including Owner) of such Underground Facilities, during construction; and
 5. the safety and protection of all existing Underground Facilities at the Site, and repairing any damage thereto resulting from the Work.
- B. *Notice by Contractor*: If Contractor believes that an Underground Facility that is uncovered or revealed at the Site was not shown or indicated on the Drawings, or was not shown or indicated on the Drawings with reasonable accuracy, then Contractor shall, promptly after becoming aware thereof and before further disturbing conditions affected thereby or performing any Work in connection therewith (except in an emergency as required by Paragraph 7.15), notify Owner and Engineer in writing regarding such Underground Facility.
- C. *Engineer's Review*: Engineer will:
1. promptly review the Underground Facility and conclude whether such Underground Facility was not shown or indicated on the Drawings, or was not shown or indicated with reasonable accuracy;
 2. identify and communicate with the owner of the Underground Facility; prepare recommendations to Owner (and if necessary issue any preliminary instructions to Contractor) regarding the Contractor's resumption of Work in connection with the Underground Facility in question;
 3. obtain any pertinent cost or schedule information from Contractor; determine the extent, if any, to which a change is required in the Drawings or Specifications to reflect and document the consequences of the existence or location of the Underground Facility; and
 4. advise Owner in writing of Engineer's findings, conclusions, and recommendations.

During such time, Contractor shall be responsible for the safety and protection of such Underground Facility.

- D. *Owner's Statement to Contractor Regarding Underground Facility:* After receipt of Engineer's written findings, conclusions, and recommendations, Owner shall issue a written statement to Contractor (with a copy to Engineer) regarding the Underground Facility in question addressing the resumption of Work in connection with such Underground Facility, indicating whether any change in the Drawings or Specifications will be made, and adopting or rejecting Engineer's written findings, conclusions, and recommendations in whole or in part.
- E. *Early Resumption of Work:* If at any time Engineer determines that Work in connection with the Underground Facility may resume prior to completion of Engineer's review or Owner's issuance of its statement to Contractor, because the Underground Facility in question and conditions affected by its presence have been adequately documented, and analyzed on a preliminary basis, then the Engineer may at its discretion instruct Contractor to resume such Work.
- F. *Possible Price and Times Adjustments*
1. Contractor shall be entitled to an equitable adjustment in the Contract Price or Contract Times, to the extent that any existing Underground Facility at the Site that was not shown or indicated on the Drawings, or was not shown or indicated with reasonable accuracy, or any related delay, disruption, or interference, causes an increase or decrease in Contractor's cost of, or time required for, performance of the Work; subject, however, to the following:
 - a. With respect to Work that is paid for on a unit price basis, any adjustment in Contract Price will be subject to the provisions of Paragraph 13.03;
 - b. Contractor's entitlement to an adjustment of the Contract Times is subject to the provisions of Paragraphs 4.05.D and 4.05.E; and
 - c. Contractor gave the notice required in Paragraph 5.05.B.
 2. If Owner and Contractor agree regarding Contractor's entitlement to and the amount or extent of any adjustment in the Contract Price or Contract Times, then any such adjustment will be set forth in a Change Order.
 3. Contractor may submit a Change Proposal regarding its entitlement to or the amount or extent of any adjustment in the Contract Price or Contract Times, no later than 30 days after Owner's issuance of the Owner's written statement to Contractor regarding the Underground Facility in question.
 4. The information and data shown or indicated on the Drawings with respect to existing Underground Facilities at the Site is based on information and data (a) furnished by the owners of such Underground Facilities, or by others, (b) obtained from available records, or (c) gathered in an investigation conducted in accordance with the current edition of ASCE 38, Standard Guideline for the Collection and Depiction of Existing Subsurface Utility Data, by the American Society of Civil Engineers. If such information or data is incorrect or incomplete, Contractor's remedies are limited to those set forth in this Paragraph 5.05.F.

5.06 *Hazardous Environmental Conditions at Site*

A. *Reports and Drawings:* The Supplementary Conditions identify:

1. those reports known to Owner relating to Hazardous Environmental Conditions that have been identified at or adjacent to the Site;
2. drawings known to Owner relating to Hazardous Environmental Conditions that have been identified at or adjacent to the Site; and
3. Technical Data contained in such reports and drawings.

B. *Reliance by Contractor on Technical Data Authorized:* Contractor may rely upon the accuracy of the Technical Data expressly identified in the Supplementary Conditions with respect to such reports and drawings, but such reports and drawings are not Contract Documents. If no such express identification has been made, then Contractor may rely on the accuracy of the Technical Data as defined in Paragraph 1.01.A.46.b. Except for such reliance on Technical Data, Contractor may not rely upon or make any claim against Owner or Engineer, or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, with respect to:

1. the completeness of such reports and drawings for Contractor's purposes, including, but not limited to, any aspects of the means, methods, techniques, sequences and procedures of construction to be employed by Contractor, and safety precautions and programs incident thereto;
2. other data, interpretations, opinions, and information contained in such reports or shown or indicated in such drawings; or
3. any Contractor interpretation of or conclusion drawn from any Technical Data or any such other data, interpretations, opinions or information.

C. Contractor shall not be responsible for removing or remediating any Hazardous Environmental Condition encountered, uncovered, or revealed at the Site unless such removal or remediation is expressly identified in the Contract Documents to be within the scope of the Work.

D. Contractor shall be responsible for controlling, containing, and duly removing all Constituents of Concern brought to the Site by Contractor, Subcontractors, Suppliers, or anyone else for whom Contractor is responsible, and for any associated costs; and for the costs of removing and remediating any Hazardous Environmental Condition created by the presence of any such Constituents of Concern.

E. If Contractor encounters, uncovers, or reveals a Hazardous Environmental Condition whose removal or remediation is not expressly identified in the Contract Documents as being within the scope of the Work, or if Contractor or anyone for whom Contractor is responsible creates a Hazardous Environmental Condition, then Contractor shall immediately: (1) secure or otherwise isolate such condition; (2) stop all Work in connection with such condition and in any area affected thereby (except in an emergency as required by Paragraph 7.15); and (3) notify Owner and Engineer (and promptly thereafter confirm such notice in writing). Owner shall promptly consult with Engineer concerning the necessity for Owner to retain a qualified expert to evaluate such condition or take corrective action, if any. Promptly after consulting with Engineer, Owner shall take such actions as are necessary to permit Owner to timely

- obtain required permits and provide Contractor the written notice required by Paragraph 5.06.F. If Contractor or anyone for whom Contractor is responsible created the Hazardous Environmental Condition in question, then Owner may remove and remediate the Hazardous Environmental Condition, and impose a set-off against payments to account for the associated costs.
- F. Contractor shall not resume Work in connection with such Hazardous Environmental Condition or in any affected area until after Owner has obtained any required permits related thereto, and delivered written notice to Contractor either (1) specifying that such condition and any affected area is or has been rendered safe for the resumption of Work, or (2) specifying any special conditions under which such Work may be resumed safely.
- G. If Owner and Contractor cannot agree as to entitlement to or on the amount or extent, if any, of any adjustment in Contract Price or Contract Times, as a result of such Work stoppage, such special conditions under which Work is agreed to be resumed by Contractor, or any costs or expenses incurred in response to the Hazardous Environmental Condition, then within 30 days of Owner's written notice regarding the resumption of Work, Contractor may submit a Change Proposal, or Owner may impose a set-off. Entitlement to any such adjustment is subject to the provisions of Paragraphs 4.05.D, 4.05.E, 11.07, and 11.08.
- H. If, after receipt of such written notice, Contractor does not agree to resume such Work based on a reasonable belief it is unsafe, or does not agree to resume such Work under such special conditions, then Owner may order the portion of the Work that is in the area affected by such condition to be deleted from the Work, following the contractual change procedures in Article 11. Owner may have such deleted portion of the Work performed by Owner's own forces or others in accordance with Article 8.
- I. To the fullest extent permitted by Laws and Regulations, Owner shall indemnify and hold harmless Contractor, Subcontractors, and Engineer, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals, and all court, arbitration, or other dispute resolution costs) arising out of or relating to a Hazardous Environmental Condition, provided that such Hazardous Environmental Condition (1) was not shown or indicated in the Drawings, Specifications, or other Contract Documents, identified as Technical Data entitled to limited reliance pursuant to Paragraph 5.06.B, or identified in the Contract Documents to be included within the scope of the Work, and (2) was not created by Contractor or by anyone for whom Contractor is responsible. Nothing in this Paragraph 5.06.I obligates Owner to indemnify any individual or entity from and against the consequences of that individual's or entity's own negligence.
- J. To the fullest extent permitted by Laws and Regulations, Contractor shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to the failure to control, contain, or remove a Constituent of Concern brought to the Site by Contractor or by anyone for whom Contractor is responsible, or to a Hazardous Environmental Condition created by Contractor or by anyone for whom Contractor is responsible. Nothing in this Paragraph 5.06.J obligates Contractor to

indemnify any individual or entity from and against the consequences of that individual's or entity's own negligence.

- K. The provisions of Paragraphs 5.03, 5.04, and 5.05 do not apply to the presence of Constituents of Concern or to a Hazardous Environmental Condition uncovered or revealed at the Site.

ARTICLE 6—BONDS AND INSURANCE

6.01 *Performance, Payment, and Other Bonds*

- A. Contractor shall furnish a performance bond and a payment bond, each in an amount at least equal to the Contract Price, as security for the faithful performance and payment of Contractor's obligations under the Contract. These bonds must remain in effect until one year after the date when final payment becomes due or until completion of the correction period specified in Paragraph 15.08, whichever is later, except as provided otherwise by Laws or Regulations, the terms of a prescribed bond form, the Supplementary Conditions, or other provisions of the Contract.
- B. Contractor shall also furnish such other bonds (if any) as are required by the Supplementary Conditions or other provisions of the Contract.
- C. All bonds must be in the form included in the Bidding Documents or otherwise specified by Owner prior to execution of the Contract, except as provided otherwise by Laws or Regulations, and must be issued and signed by a surety named in "Companies Holding Certificates of Authority as Acceptable Sureties on Federal Bonds and as Acceptable Reinsuring Companies" as published in Department Circular 570 (as amended and supplemented) by the Bureau of the Fiscal Service, U.S. Department of the Treasury. A bond signed by an agent or attorney-in-fact must be accompanied by a certified copy of that individual's authority to bind the surety. The evidence of authority must show that it is effective on the date the agent or attorney-in-fact signed the accompanying bond.
- D. Contractor shall obtain the required bonds from surety companies that are duly licensed or authorized, in the state or jurisdiction in which the Project is located, to issue bonds in the required amounts.
- E. If the surety on a bond furnished by Contractor is declared bankrupt or becomes insolvent, or the surety ceases to meet the requirements above, then Contractor shall promptly notify Owner and Engineer in writing and shall, within 20 days after the event giving rise to such notification, provide another bond and surety, both of which must comply with the bond and surety requirements above.
- F. If Contractor has failed to obtain a required bond, Owner may exclude the Contractor from the Site and exercise Owner's termination rights under Article 16.
- G. Upon request to Owner from any Subcontractor, Supplier, or other person or entity claiming to have furnished labor, services, materials, or equipment used in the performance of the Work, Owner shall provide a copy of the payment bond to such person or entity.
- H. Upon request to Contractor from any Subcontractor, Supplier, or other person or entity claiming to have furnished labor, services, materials, or equipment used in the performance of the Work, Contractor shall provide a copy of the payment bond to such person or entity.

6.02 *Insurance—General Provisions*

- A. Owner and Contractor shall obtain and maintain insurance as required in this article and in the Supplementary Conditions.
- B. All insurance required by the Contract to be purchased and maintained by Owner or Contractor shall be obtained from insurance companies that are duly licensed or authorized in the state or jurisdiction in which the Project is located to issue insurance policies for the required limits and coverages. Unless a different standard is indicated in the Supplementary Conditions, all companies that provide insurance policies required under this Contract shall have an A.M. Best rating of A-VII or better.
- C. Alternative forms of insurance coverage, including but not limited to self-insurance and “Occupational Accident and Excess Employer’s Indemnity Policies,” are not sufficient to meet the insurance requirements of this Contract, unless expressly allowed in the Supplementary Conditions.
- D. Contractor shall deliver to Owner, with copies to each additional insured identified in the Contract, certificates of insurance and endorsements establishing that Contractor has obtained and is maintaining the policies and coverages required by the Contract. Upon request by Owner or any other insured, Contractor shall also furnish other evidence of such required insurance, including but not limited to copies of policies, documentation of applicable self-insured retentions (if allowed) and deductibles, full disclosure of all relevant exclusions, and evidence of insurance required to be purchased and maintained by Subcontractors or Suppliers. In any documentation furnished under this provision, Contractor, Subcontractors, and Suppliers may block out (redact) (1) any confidential premium or pricing information and (2) any wording specific to a project or jurisdiction other than those applicable to this Contract.
- E. Owner shall deliver to Contractor, with copies to each additional insured identified in the Contract, certificates of insurance and endorsements establishing that Owner has obtained and is maintaining the policies and coverages required of Owner by the Contract (if any). Upon request by Contractor or any other insured, Owner shall also provide other evidence of such required insurance (if any), including but not limited to copies of policies, documentation of applicable self-insured retentions (if allowed) and deductibles, and full disclosure of all relevant exclusions. In any documentation furnished under this provision, Owner may block out (redact) (1) any confidential premium or pricing information and (2) any wording specific to a project or jurisdiction other than those relevant to this Contract.
- F. Failure of Owner or Contractor to demand such certificates or other evidence of the other party’s full compliance with these insurance requirements, or failure of Owner or Contractor to identify a deficiency in compliance from the evidence provided, will not be construed as a waiver of the other party’s obligation to obtain and maintain such insurance.
- G. In addition to the liability insurance required to be provided by Contractor, the Owner, at Owner’s option, may purchase and maintain Owner’s own liability insurance. Owner’s liability policies, if any, operate separately and independently from policies required to be provided by Contractor, and Contractor cannot rely upon Owner’s liability policies for any of Contractor’s obligations to the Owner, Engineer, or third parties.

H. Contractor shall require:

1. Subcontractors to purchase and maintain worker's compensation, commercial general liability, and other insurance that is appropriate for their participation in the Project, and to name as additional insureds Owner and Engineer (and any other individuals or entities identified in the Supplementary Conditions as additional insureds on Contractor's liability policies) on each Subcontractor's commercial general liability insurance policy; and
 2. Suppliers to purchase and maintain insurance that is appropriate for their participation in the Project.
- I. If either party does not purchase or maintain the insurance required of such party by the Contract, such party shall notify the other party in writing of such failure to purchase prior to the start of the Work, or of such failure to maintain prior to any change in the required coverage.
- J. If Contractor has failed to obtain and maintain required insurance, Contractor's entitlement to enter or remain at the Site will end immediately, and Owner may impose an appropriate set-off against payment for any associated costs (including but not limited to the cost of purchasing necessary insurance coverage), and exercise Owner's termination rights under Article 16.
- K. Without prejudice to any other right or remedy, if a party has failed to obtain required insurance, the other party may elect (but is in no way obligated) to obtain equivalent insurance to protect such other party's interests at the expense of the party who was required to provide such coverage, and the Contract Price will be adjusted accordingly.
- L. Owner does not represent that insurance coverage and limits established in this Contract necessarily will be adequate to protect Contractor or Contractor's interests. Contractor is responsible for determining whether such coverage and limits are adequate to protect its interests, and for obtaining and maintaining any additional insurance that Contractor deems necessary.
- M. The insurance and insurance limits required herein will not be deemed as a limitation on Contractor's liability, or that of its Subcontractors or Suppliers, under the indemnities granted to Owner and other individuals and entities in the Contract or otherwise.
- N. All the policies of insurance required to be purchased and maintained under this Contract will contain a provision or endorsement that the coverage afforded will not be canceled, or renewal refused, until at least 10 days prior written notice has been given to the purchasing policyholder. Within three days of receipt of any such written notice, the purchasing policyholder shall provide a copy of the notice to each other insured and Engineer.

6.03 *Contractor's Insurance*

- A. *Required Insurance:* Contractor shall purchase and maintain Worker's Compensation, Commercial General Liability, and other insurance pursuant to the specific requirements of the Supplementary Conditions.
- B. *General Provisions:* The policies of insurance required by this Paragraph 6.03 as supplemented must:
1. include at least the specific coverages required;

2. be written for not less than the limits provided, or those required by Laws or Regulations, whichever is greater;
 3. remain in effect at least until the Work is complete (as set forth in Paragraph 15.06.D), and longer if expressly required elsewhere in this Contract, and at all times thereafter when Contractor may be correcting, removing, or replacing defective Work as a warranty or correction obligation, or otherwise, or returning to the Site to conduct other tasks arising from the Contract;
 4. apply with respect to the performance of the Work, whether such performance is by Contractor, any Subcontractor or Supplier, or by anyone directly or indirectly employed by any of them to perform any of the Work, or by anyone for whose acts any of them may be liable; and
 5. include all necessary endorsements to support the stated requirements.
- C. *Additional Insureds*: The Contractor's commercial general liability, automobile liability, employer's liability, umbrella or excess, pollution liability, and unmanned aerial vehicle liability policies, if required by this Contract, must:
1. include and list as additional insureds Owner and Engineer, and any individuals or entities identified as additional insureds in the Supplementary Conditions;
 2. include coverage for the respective officers, directors, members, partners, employees, and consultants of all such additional insureds;
 3. afford primary coverage to these additional insureds for all claims covered thereby (including as applicable those arising from both ongoing and completed operations);
 4. not seek contribution from insurance maintained by the additional insured; and
 5. as to commercial general liability insurance, apply to additional insureds with respect to liability caused in whole or in part by Contractor's acts or omissions, or the acts and omissions of those working on Contractor's behalf, in the performance of Contractor's operations.

6.04 *Builder's Risk and Other Property Insurance*

- A. *Builder's Risk*: Unless otherwise provided in the Supplementary Conditions, Contractor shall purchase and maintain builder's risk insurance upon the Work on a completed value basis, in the amount of the Work's full insurable replacement cost (subject to such deductible amounts as may be provided in the Supplementary Conditions or required by Laws and Regulations). The specific requirements applicable to the builder's risk insurance are set forth in the Supplementary Conditions.
- B. *Property Insurance for Facilities of Owner Where Work Will Occur*: Owner is responsible for obtaining and maintaining property insurance covering each existing structure, building, or facility in which any part of the Work will occur, or to which any part of the Work will attach or be adjoined. Such property insurance will be written on a special perils (all-risk) form, on a replacement cost basis, providing coverage consistent with that required for the builder's risk insurance, and will be maintained until the Work is complete, as set forth in Paragraph 15.06.D.

- C. *Property Insurance for Substantially Complete Facilities:* Promptly after Substantial Completion, and before actual occupancy or use of the substantially completed Work, Owner will obtain property insurance for such substantially completed Work, and maintain such property insurance at least until the Work is complete, as set forth in Paragraph 15.06.D. Such property insurance will be written on a special perils (all-risk) form, on a replacement cost basis, and provide coverage consistent with that required for the builder's risk insurance. The builder's risk insurance may terminate upon written confirmation of Owner's procurement of such property insurance.
- D. *Partial Occupancy or Use by Owner:* If Owner will occupy or use a portion or portions of the Work prior to Substantial Completion of all the Work, as provided in Paragraph 15.04, then Owner (directly, if it is the purchaser of the builder's risk policy, or through Contractor) will provide advance notice of such occupancy or use to the builder's risk insurer, and obtain an endorsement consenting to the continuation of coverage prior to commencing such partial occupancy or use.
- E. *Insurance of Other Property; Additional Insurance:* If the express insurance provisions of the Contract do not require or address the insurance of a property item or interest, then the entity or individual owning such property item will be responsible for insuring it. If Contractor elects to obtain other special insurance to be included in or supplement the builder's risk or property insurance policies provided under this Paragraph 6.04, it may do so at Contractor's expense.

6.05 *Property Losses; Subrogation*

- A. The builder's risk insurance policy purchased and maintained in accordance with Paragraph 6.04 (or an installation floater policy if authorized by the Supplementary Conditions), will contain provisions to the effect that in the event of payment of any loss or damage the insurer will have no rights of recovery against any insureds thereunder, or against Engineer or its consultants, or their officers, directors, members, partners, employees, agents, consultants, or subcontractors.
 - 1. Owner and Contractor waive all rights against each other and the respective officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, for all losses and damages caused by, arising out of, or resulting from any of the perils, risks, or causes of loss covered by such policies and any other property insurance applicable to the Work; and, in addition, waive all such rights against Engineer, its consultants, all individuals or entities identified in the Supplementary Conditions as builder's risk or installation floater insureds, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, under such policies for losses and damages so caused.
 - 2. None of the above waivers extends to the rights that any party making such waiver may have to the proceeds of insurance held by Owner or Contractor as trustee or fiduciary, or otherwise payable under any policy so issued.
- B. Any property insurance policy maintained by Owner covering any loss, damage, or consequential loss to Owner's existing structures, buildings, or facilities in which any part of the Work will occur, or to which any part of the Work will attach or adjoin; to adjacent structures, buildings, or facilities of Owner; or to part or all of the completed or substantially completed Work, during partial occupancy or use pursuant to Paragraph 15.04, after Substantial Completion pursuant to Paragraph 15.03, or after final payment pursuant to

Paragraph 15.06, will contain provisions to the effect that in the event of payment of any loss or damage the insurer will have no rights of recovery against any insureds thereunder, or against Contractor, Subcontractors, or Engineer, or the officers, directors, members, partners, employees, agents, consultants, or subcontractors of each and any of them, and that the insured is allowed to waive the insurer's rights of subrogation in a written contract executed prior to the loss, damage, or consequential loss.

1. Owner waives all rights against Contractor, Subcontractors, and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them, for all losses and damages caused by, arising out of, or resulting from fire or any of the perils, risks, or causes of loss covered by such policies.
- C. The waivers in this Paragraph 6.05 include the waiver of rights due to business interruption, loss of use, or other consequential loss extending beyond direct physical loss or damage to Owner's property or the Work caused by, arising out of, or resulting from fire or other insured peril, risk, or cause of loss.
- D. Contractor shall be responsible for assuring that each Subcontract contains provisions whereby the Subcontractor waives all rights against Owner, Contractor, all individuals or entities identified in the Supplementary Conditions as insureds, the Engineer and its consultants, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, for all losses and damages caused by, arising out of, relating to, or resulting from fire or other peril, risk, or cause of loss covered by builder's risk insurance, installation floater, and any other property insurance applicable to the Work.

6.06 *Receipt and Application of Property Insurance Proceeds*

- A. Any insured loss under the builder's risk and other policies of property insurance required by Paragraph 6.04 will be adjusted and settled with the named insured that purchased the policy. Such named insured shall act as fiduciary for the other insureds, and give notice to such other insureds that adjustment and settlement of a claim is in progress. Any other insured may state its position regarding a claim for insured loss in writing within 15 days after notice of such claim.
- B. Proceeds for such insured losses may be made payable by the insurer either jointly to multiple insureds, or to the named insured that purchased the policy in its own right and as fiduciary for other insureds, subject to the requirements of any applicable mortgage clause. A named insured receiving insurance proceeds under the builder's risk and other policies of insurance required by Paragraph 6.04 shall maintain such proceeds in a segregated account, and distribute such proceeds in accordance with such agreement as the parties in interest may reach, or as otherwise required under the dispute resolution provisions of this Contract or applicable Laws and Regulations.
- C. If no other special agreement is reached, Contractor shall repair or replace the damaged Work, using allocated insurance proceeds.

ARTICLE 7—CONTRACTOR’S RESPONSIBILITIES

7.01 *Contractor’s Means and Methods of Construction*

- A. Contractor shall be solely responsible for the means, methods, techniques, sequences, and procedures of construction.
- B. If the Contract Documents note, or Contractor determines, that professional engineering or other design services are needed to carry out Contractor’s responsibilities for construction means, methods, techniques, sequences, and procedures, or for Site safety, then Contractor shall cause such services to be provided by a properly licensed design professional, at Contractor’s expense. Such services are not Owner-delegated professional design services under this Contract, and neither Owner nor Engineer has any responsibility with respect to (1) Contractor’s determination of the need for such services, (2) the qualifications or licensing of the design professionals retained or employed by Contractor, (3) the performance of such services, or (4) any errors, omissions, or defects in such services.

7.02 *Supervision and Superintendence*

- A. Contractor shall supervise, inspect, and direct the Work competently and efficiently, devoting such attention thereto and applying such skills and expertise as may be necessary to perform the Work in accordance with the Contract Documents.
- B. At all times during the progress of the Work, Contractor shall assign a competent resident superintendent who will not be replaced without written notice to Owner and Engineer except under extraordinary circumstances.

7.03 *Labor; Working Hours*

- A. Contractor shall provide competent, suitably qualified personnel to survey and lay out the Work and perform construction as required by the Contract Documents. Contractor shall maintain good discipline and order at the Site.
- B. Contractor shall be fully responsible to Owner and Engineer for all acts and omissions of Contractor’s employees; of Suppliers and Subcontractors, and their employees; and of any other individuals or entities performing or furnishing any of the Work, just as Contractor is responsible for Contractor’s own acts and omissions.
- C. Except as otherwise required for the safety or protection of persons or the Work or property at the Site or adjacent thereto, and except as otherwise stated in the Contract Documents, all Work at the Site will be performed during regular working hours, Monday through Friday. Contractor will not perform Work on a Saturday, Sunday, or any legal holiday. Contractor may perform Work outside regular working hours or on Saturdays, Sundays, or legal holidays only with Owner’s written consent, which will not be unreasonably withheld.

7.04 *Services, Materials, and Equipment*

- A. Unless otherwise specified in the Contract Documents, Contractor shall provide and assume full responsibility for all services, materials, equipment, labor, transportation, construction equipment and machinery, tools, appliances, fuel, power, light, heat, telephone, water, sanitary facilities, temporary facilities, and all other facilities and incidentals necessary for the performance, testing, start up, and completion of the Work, whether or not such items are specifically called for in the Contract Documents.

- B. All materials and equipment incorporated into the Work must be new and of good quality, except as otherwise provided in the Contract Documents. All special warranties and guarantees required by the Specifications will expressly run to the benefit of Owner. If required by Engineer, Contractor shall furnish satisfactory evidence (including reports of required tests) as to the source, kind, and quality of materials and equipment.
- C. All materials and equipment must be stored, applied, installed, connected, erected, protected, used, cleaned, and conditioned in accordance with instructions of the applicable Supplier, except as otherwise may be provided in the Contract Documents.

7.05 *“Or Equals”*

- A. *Contractor’s Request; Governing Criteria:* Whenever an item of equipment or material is specified or described in the Contract Documents by using the names of one or more proprietary items or specific Suppliers, the Contract Price has been based upon Contractor furnishing such item as specified. The specification or description of such an item is intended to establish the type, function, appearance, and quality required. Unless the specification or description contains or is followed by words reading that no like, equivalent, or “or equal” item is permitted, Contractor may request that Engineer authorize the use of other items of equipment or material, or items from other proposed Suppliers, under the circumstances described below.
 - 1. If Engineer in its sole discretion determines that an item of equipment or material proposed by Contractor is functionally equal to that named and sufficiently similar so that no change in related Work will be required, Engineer will deem it an “or equal” item. For the purposes of this paragraph, a proposed item of equipment or material will be considered functionally equal to an item so named if:
 - a. in the exercise of reasonable judgment Engineer determines that the proposed item:
 - 1) is at least equal in materials of construction, quality, durability, appearance, strength, and design characteristics;
 - 2) will reliably perform at least equally well the function and achieve the results imposed by the design concept of the completed Project as a functioning whole;
 - 3) has a proven record of performance and availability of responsive service; and
 - 4) is not objectionable to Owner.
 - b. Contractor certifies that, if the proposed item is approved and incorporated into the Work:
 - 1) there will be no increase in cost to the Owner or increase in Contract Times; and
 - 2) the item will conform substantially to the detailed requirements of the item named in the Contract Documents.
- B. *Contractor’s Expense:* Contractor shall provide all data in support of any proposed “or equal” item at Contractor’s expense.
- C. *Engineer’s Evaluation and Determination:* Engineer will be allowed a reasonable time to evaluate each “or-equal” request. Engineer may require Contractor to furnish additional data about the proposed “or-equal” item. Engineer will be the sole judge of acceptability. No “or-equal” item will be ordered, furnished, installed, or utilized until Engineer’s review is complete

and Engineer determines that the proposed item is an “or-equal,” which will be evidenced by an approved Shop Drawing or other written communication. Engineer will advise Contractor in writing of any negative determination.

- D. *Effect of Engineer’s Determination:* Neither approval nor denial of an “or-equal” request will result in any change in Contract Price. The Engineer’s denial of an “or-equal” request will be final and binding, and may not be reversed through an appeal under any provision of the Contract.
- E. *Treatment as a Substitution Request:* If Engineer determines that an item of equipment or material proposed by Contractor does not qualify as an “or-equal” item, Contractor may request that Engineer consider the item a proposed substitute pursuant to Paragraph 7.06.

7.06 Substitutes

- A. *Contractor’s Request; Governing Criteria:* Unless the specification or description of an item of equipment or material required to be furnished under the Contract Documents contains or is followed by words reading that no substitution is permitted, Contractor may request that Engineer authorize the use of other items of equipment or material under the circumstances described below. To the extent possible such requests must be made before commencement of related construction at the Site.
 - 1. Contractor shall submit sufficient information as provided below to allow Engineer to determine if the item of material or equipment proposed is functionally equivalent to that named and an acceptable substitute therefor. Engineer will not accept requests for review of proposed substitute items of equipment or material from anyone other than Contractor.
 - 2. The requirements for review by Engineer will be as set forth in Paragraph 7.06.B, as supplemented by the Specifications, and as Engineer may decide is appropriate under the circumstances.
 - 3. Contractor shall make written application to Engineer for review of a proposed substitute item of equipment or material that Contractor seeks to furnish or use. The application:
 - a. will certify that the proposed substitute item will:
 - 1) perform adequately the functions and achieve the results called for by the general design;
 - 2) be similar in substance to the item specified; and
 - 3) be suited to the same use as the item specified.
 - b. will state:
 - 1) the extent, if any, to which the use of the proposed substitute item will necessitate a change in Contract Times;
 - 2) whether use of the proposed substitute item in the Work will require a change in any of the Contract Documents (or in the provisions of any other direct contract with Owner for other work on the Project) to adapt the design to the proposed substitute item; and

- 3) whether incorporation or use of the proposed substitute item in connection with the Work is subject to payment of any license fee or royalty.
 - c. will identify:
 - 1) all variations of the proposed substitute item from the item specified; and
 - 2) available engineering, sales, maintenance, repair, and replacement services.
 - d. will contain an itemized estimate of all costs or credits that will result directly or indirectly from use of such substitute item, including but not limited to changes in Contract Price, shared savings, costs of redesign, and claims of other contractors affected by any resulting change.
- B. *Engineer's Evaluation and Determination*: Engineer will be allowed a reasonable time to evaluate each substitute request, and to obtain comments and direction from Owner. Engineer may require Contractor to furnish additional data about the proposed substitute item. Engineer will be the sole judge of acceptability. No substitute will be ordered, furnished, installed, or utilized until Engineer's review is complete and Engineer determines that the proposed item is an acceptable substitute. Engineer's determination will be evidenced by a Field Order or a proposed Change Order accounting for the substitution itself and all related impacts, including changes in Contract Price or Contract Times. Engineer will advise Contractor in writing of any negative determination.
- C. *Special Guarantee*: Owner may require Contractor to furnish at Contractor's expense a special performance guarantee or other surety with respect to any substitute.
- D. *Reimbursement of Engineer's Cost*: Engineer will record Engineer's costs in evaluating a substitute proposed or submitted by Contractor. Whether or not Engineer approves a substitute so proposed or submitted by Contractor, Contractor shall reimburse Owner for the reasonable charges of Engineer for evaluating each such proposed substitute. Contractor shall also reimburse Owner for the reasonable charges of Engineer for making changes in the Contract Documents (or in the provisions of any other direct contract with Owner) resulting from the acceptance of each proposed substitute.
- E. *Contractor's Expense*: Contractor shall provide all data in support of any proposed substitute at Contractor's expense.
- F. *Effect of Engineer's Determination*: If Engineer approves the substitution request, Contractor shall execute the proposed Change Order and proceed with the substitution. The Engineer's denial of a substitution request will be final and binding, and may not be reversed through an appeal under any provision of the Contract. Contractor may challenge the scope of reimbursement costs imposed under Paragraph 7.06.D, by timely submittal of a Change Proposal.

7.07 *Concerning Subcontractors and Suppliers*

- A. Contractor may retain Subcontractors and Suppliers for the performance of parts of the Work. Such Subcontractors and Suppliers must be acceptable to Owner. The Contractor's retention of a Subcontractor or Supplier for the performance of parts of the Work will not relieve Contractor's obligation to Owner to perform and complete the Work in accordance with the Contract Documents.

- B. Contractor shall retain specific Subcontractors and Suppliers for the performance of designated parts of the Work if required by the Contract to do so.
- C. Subsequent to the submittal of Contractor's Bid or final negotiation of the terms of the Contract, Owner may not require Contractor to retain any Subcontractor or Supplier to furnish or perform any of the Work against which Contractor has reasonable objection.
- D. Prior to entry into any binding subcontract or purchase order, Contractor shall submit to Owner the identity of the proposed Subcontractor or Supplier (unless Owner has already deemed such proposed Subcontractor or Supplier acceptable during the bidding process or otherwise). Such proposed Subcontractor or Supplier shall be deemed acceptable to Owner unless Owner raises a substantive, reasonable objection within 5 days.
- E. Owner may require the replacement of any Subcontractor or Supplier. Owner also may require Contractor to retain specific replacements; provided, however, that Owner may not require a replacement to which Contractor has a reasonable objection. If Contractor has submitted the identity of certain Subcontractors or Suppliers for acceptance by Owner, and Owner has accepted it (either in writing or by failing to make written objection thereto), then Owner may subsequently revoke the acceptance of any such Subcontractor or Supplier so identified solely on the basis of substantive, reasonable objection after due investigation. Contractor shall submit an acceptable replacement for the rejected Subcontractor or Supplier.
- F. If Owner requires the replacement of any Subcontractor or Supplier retained by Contractor to perform any part of the Work, then Contractor shall be entitled to an adjustment in Contract Price or Contract Times, with respect to the replacement; and Contractor shall initiate a Change Proposal for such adjustment within 30 days of Owner's requirement of replacement.
- G. No acceptance by Owner of any such Subcontractor or Supplier, whether initially or as a replacement, will constitute a waiver of the right of Owner to the completion of the Work in accordance with the Contract Documents.
- H. On a monthly basis, Contractor shall submit to Engineer a complete list of all Subcontractors and Suppliers having a direct contract with Contractor, and of all other Subcontractors and Suppliers known to Contractor at the time of submittal.
- I. Contractor shall be solely responsible for scheduling and coordinating the work of Subcontractors and Suppliers.
- J. The divisions and sections of the Specifications and the identifications of any Drawings do not control Contractor in dividing the Work among Subcontractors or Suppliers, or in delineating the Work to be performed by any specific trade.
- K. All Work performed for Contractor by a Subcontractor or Supplier must be pursuant to an appropriate contractual agreement that specifically binds the Subcontractor or Supplier to the applicable terms and conditions of the Contract for the benefit of Owner and Engineer.
- L. Owner may furnish to any Subcontractor or Supplier, to the extent practicable, information about amounts paid to Contractor for Work performed for Contractor by the Subcontractor or Supplier.

- M. Contractor shall restrict all Subcontractors and Suppliers from communicating with Engineer or Owner, except through Contractor or in case of an emergency, or as otherwise expressly allowed in this Contract.

7.08 *Patent Fees and Royalties*

- A. Contractor shall pay all license fees and royalties and assume all costs incident to the use in the performance of the Work or the incorporation in the Work of any invention, design, process, product, or device which is the subject of patent rights or copyrights held by others. If an invention, design, process, product, or device is specified in the Contract Documents for use in the performance of the Work and if, to the actual knowledge of Owner or Engineer, its use is subject to patent rights or copyrights calling for the payment of any license fee or royalty to others, the existence of such rights will be disclosed in the Contract Documents.
- B. To the fullest extent permitted by Laws and Regulations, Owner shall indemnify and hold harmless Contractor, and its officers, directors, members, partners, employees, agents, consultants, and subcontractors, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals, and all court or arbitration or other dispute resolution costs) arising out of or relating to any infringement of patent rights or copyrights incident to the use in the performance of the Work or resulting from the incorporation in the Work of any invention, design, process, product, or device specified in the Contract Documents, but not identified as being subject to payment of any license fee or royalty to others required by patent rights or copyrights.
- C. To the fullest extent permitted by Laws and Regulations, Contractor shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to any infringement of patent rights or copyrights incident to the use in the performance of the Work or resulting from the incorporation in the Work of any invention, design, process, product, or device not specified in the Contract Documents.

7.09 *Permits*

- A. Unless otherwise provided in the Contract Documents, Contractor shall obtain and pay for all construction permits, licenses, and certificates of occupancy. Owner shall assist Contractor, when necessary, in obtaining such permits and licenses. Contractor shall pay all governmental charges and inspection fees necessary for the prosecution of the Work which are applicable at the time of the submission of Contractor's Bid (or when Contractor became bound under a negotiated contract). Owner shall pay all charges of utility owners for connections for providing permanent service to the Work.

7.10 *Taxes*

- A. Contractor shall pay all sales, consumer, use, and other similar taxes required to be paid by Contractor in accordance with the Laws and Regulations of the place of the Project which are applicable during the performance of the Work.

7.11 *Laws and Regulations*

- A. Contractor shall give all notices required by and shall comply with all Laws and Regulations applicable to the performance of the Work. Neither Owner nor Engineer shall be responsible for monitoring Contractor's compliance with any Laws or Regulations.
- B. If Contractor performs any Work or takes any other action knowing or having reason to know that it is contrary to Laws or Regulations, Contractor shall bear all resulting costs and losses, and shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such Work or other action. It is not Contractor's responsibility to make certain that the Work described in the Contract Documents is in accordance with Laws and Regulations, but this does not relieve Contractor of its obligations under Paragraph 3.03.
- C. Owner or Contractor may give written notice to the other party of any changes after the submission of Contractor's Bid (or after the date when Contractor became bound under a negotiated contract) in Laws or Regulations having an effect on the cost or time of performance of the Work, including but not limited to changes in Laws or Regulations having an effect on procuring permits and on sales, use, value-added, consumption, and other similar taxes. If Owner and Contractor are unable to agree on entitlement to or on the amount or extent, if any, of any adjustment in Contract Price or Contract Times resulting from such changes, then within 30 days of such written notice Contractor may submit a Change Proposal, or Owner may initiate a Claim.

7.12 *Record Documents*

- A. Contractor shall maintain in a safe place at the Site one printed record copy of all Drawings, Specifications, Addenda, Change Orders, Work Change Directives, Field Orders, written interpretations and clarifications, and approved Shop Drawings. Contractor shall keep such record documents in good order and annotate them to show changes made during construction. These record documents, together with all approved Samples, will be available to Engineer for reference. Upon completion of the Work, Contractor shall deliver these record documents to Engineer.

7.13 *Safety and Protection*

- A. Contractor shall be solely responsible for initiating, maintaining, and supervising all safety precautions and programs in connection with the Work. Such responsibility does not relieve Subcontractors of their responsibility for the safety of persons or property in the performance of their work, nor for compliance with applicable safety Laws and Regulations.
- B. Contractor shall designate a qualified and experienced safety representative whose duties and responsibilities are the prevention of Work-related accidents and the maintenance and supervision of safety precautions and programs.
- C. Contractor shall take all necessary precautions for the safety of, and shall provide the necessary protection to prevent damage, injury, or loss to:
 - 1. all persons on the Site or who may be affected by the Work;

2. all the Work and materials and equipment to be incorporated therein, whether in storage on or off the Site; and
 3. other property at the Site or adjacent thereto, including trees, shrubs, lawns, walks, pavements, roadways, structures, other work in progress, utilities, and Underground Facilities not designated for removal, relocation, or replacement in the course of construction.
- D. All damage, injury, or loss to any property referred to in Paragraph 7.13.C.2 or 7.13.C.3 caused, directly or indirectly, in whole or in part, by Contractor, any Subcontractor, Supplier, or any other individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable, shall be remedied by Contractor at its expense (except damage or loss attributable to the fault of Drawings or Specifications or to the acts or omissions of Owner or Engineer or anyone employed by any of them, or anyone for whose acts any of them may be liable, and not attributable, directly or indirectly, in whole or in part, to the fault or negligence of Contractor or any Subcontractor, Supplier, or other individual or entity directly or indirectly employed by any of them).
- E. Contractor shall comply with all applicable Laws and Regulations relating to the safety of persons or property, or to the protection of persons or property from damage, injury, or loss; and shall erect and maintain all necessary safeguards for such safety and protection.
- F. Contractor shall notify Owner; the owners of adjacent property; the owners of Underground Facilities and other utilities (if the identity of such owners is known to Contractor); and other contractors and utility owners performing work at or adjacent to the Site, in writing, when Contractor knows that prosecution of the Work may affect them, and shall cooperate with them in the protection, removal, relocation, and replacement of their property or work in progress.
- G. Contractor shall comply with the applicable requirements of Owner's safety programs, if any. Any Owner's safety programs that are applicable to the Work are identified or included in the Supplementary Conditions or Specifications.
- H. Contractor shall inform Owner and Engineer of the specific requirements of Contractor's safety program with which Owner's and Engineer's employees and representatives must comply while at the Site.
- I. Contractor's duties and responsibilities for safety and protection will continue until all the Work is completed, Engineer has issued a written notice to Owner and Contractor in accordance with Paragraph 15.06.C that the Work is acceptable, and Contractor has left the Site (except as otherwise expressly provided in connection with Substantial Completion).
- J. Contractor's duties and responsibilities for safety and protection will resume whenever Contractor or any Subcontractor or Supplier returns to the Site to fulfill warranty or correction obligations, or to conduct other tasks arising from the Contract Documents.

7.14 Hazard Communication Programs

- A. Contractor shall be responsible for coordinating any exchange of safety data sheets (formerly known as material safety data sheets) or other hazard communication information required to be made available to or exchanged between or among employers at the Site in accordance with Laws or Regulations.

7.15 *Emergencies*

- A. In emergencies affecting the safety or protection of persons or the Work or property at the Site or adjacent thereto, Contractor is obligated to act to prevent damage, injury, or loss. Contractor shall give Engineer prompt written notice if Contractor believes that any significant changes in the Work or variations from the Contract Documents have been caused by an emergency, or are required as a result of Contractor's response to an emergency. If Engineer determines that a change in the Contract Documents is required because of an emergency or Contractor's response, a Work Change Directive or Change Order will be issued.

7.16 *Submittals*

A. *Shop Drawing and Sample Requirements*

- 1. Before submitting a Shop Drawing or Sample, Contractor shall:
 - a. review and coordinate the Shop Drawing or Sample with other Shop Drawings and Samples and with the requirements of the Work and the Contract Documents;
 - b. determine and verify:
 - 1) all field measurements, quantities, dimensions, specified performance and design criteria, installation requirements, materials, catalog numbers, and similar information with respect to the Submittal;
 - 2) the suitability of all materials and equipment offered with respect to the indicated application, fabrication, shipping, handling, storage, assembly, and installation pertaining to the performance of the Work; and
 - 3) all information relative to Contractor's responsibilities for means, methods, techniques, sequences, and procedures of construction, and safety precautions and programs incident thereto;
 - c. confirm that the Submittal is complete with respect to all related data included in the Submittal.
- 2. Each Shop Drawing or Sample must bear a stamp or specific written certification that Contractor has satisfied Contractor's obligations under the Contract Documents with respect to Contractor's review of that Submittal, and that Contractor approves the Submittal.
- 3. With each Shop Drawing or Sample, Contractor shall give Engineer specific written notice of any variations that the Submittal may have from the requirements of the Contract Documents. This notice must be set forth in a written communication separate from the Submittal; and, in addition, in the case of a Shop Drawing by a specific notation made on the Shop Drawing itself.

- B. *Submittal Procedures for Shop Drawings and Samples:* Contractor shall label and submit Shop Drawings and Samples to Engineer for review and approval in accordance with the accepted Schedule of Submittals.

1. *Shop Drawings*

- a. Contractor shall submit the number of copies required in the Specifications.

- b. Data shown on the Shop Drawings must be complete with respect to quantities, dimensions, specified performance and design criteria, materials, and similar data to show Engineer the services, materials, and equipment Contractor proposes to provide, and to enable Engineer to review the information for the limited purposes required by Paragraph 7.16.C.

2. *Samples*

- a. Contractor shall submit the number of Samples required in the Specifications.
 - b. Contractor shall clearly identify each Sample as to material, Supplier, pertinent data such as catalog numbers, the use for which intended and other data as Engineer may require to enable Engineer to review the Submittal for the limited purposes required by Paragraph 7.16.C.
3. Where a Shop Drawing or Sample is required by the Contract Documents or the Schedule of Submittals, any related Work performed prior to Engineer's review and approval of the pertinent submittal will be at the sole expense and responsibility of Contractor.

C. *Engineer's Review of Shop Drawings and Samples*

- 1. Engineer will provide timely review of Shop Drawings and Samples in accordance with the accepted Schedule of Submittals. Engineer's review and approval will be only to determine if the items covered by the Submittals will, after installation or incorporation in the Work, comply with the requirements of the Contract Documents, and be compatible with the design concept of the completed Project as a functioning whole as indicated by the Contract Documents.
- 2. Engineer's review and approval will not extend to means, methods, techniques, sequences, or procedures of construction, or to safety precautions or programs incident thereto.
- 3. Engineer's review and approval of a separate item as such will not indicate approval of the assembly in which the item functions.
- 4. Engineer's review and approval of a Shop Drawing or Sample will not relieve Contractor from responsibility for any variation from the requirements of the Contract Documents unless Contractor has complied with the requirements of Paragraph 7.16.A.3 and Engineer has given written approval of each such variation by specific written notation thereof incorporated in or accompanying the Shop Drawing or Sample. Engineer will document any such approved variation from the requirements of the Contract Documents in a Field Order or other appropriate Contract modification.
- 5. Engineer's review and approval of a Shop Drawing or Sample will not relieve Contractor from responsibility for complying with the requirements of Paragraphs 7.16.A and B.
- 6. Engineer's review and approval of a Shop Drawing or Sample, or of a variation from the requirements of the Contract Documents, will not, under any circumstances, change the Contract Times or Contract Price, unless such changes are included in a Change Order.
- 7. Neither Engineer's receipt, review, acceptance, or approval of a Shop Drawing or Sample will result in such item becoming a Contract Document.

8. Contractor shall perform the Work in compliance with the requirements and commitments set forth in approved Shop Drawings and Samples, subject to the provisions of Paragraph 7.16.C.4.

D. Resubmittal Procedures for Shop Drawings and Samples

1. Contractor shall make corrections required by Engineer and shall return the required number of corrected copies of Shop Drawings and submit, as required, new Samples for review and approval. Contractor shall direct specific attention in writing to revisions other than the corrections called for by Engineer on previous Submittals.
2. Contractor shall furnish required Shop Drawing and Sample submittals with sufficient information and accuracy to obtain required approval of an item with no more than two resubmittals. Engineer will record Engineer's time for reviewing a third or subsequent resubmittal of a Shop Drawing or Sample, and Contractor shall be responsible for Engineer's charges to Owner for such time. Owner may impose a set-off against payments due Contractor to secure reimbursement for such charges.
3. If Contractor requests a change of a previously approved Shop Drawing or Sample, Contractor shall be responsible for Engineer's charges to Owner for its review time, and Owner may impose a set-off against payments due Contractor to secure reimbursement for such charges, unless the need for such change is beyond the control of Contractor.

E. Submittals Other than Shop Drawings, Samples, and Owner-Delegated Designs

1. The following provisions apply to all Submittals other than Shop Drawings, Samples, and Owner-delegated designs:
 - a. Contractor shall submit all such Submittals to the Engineer in accordance with the Schedule of Submittals and pursuant to the applicable terms of the Contract Documents.
 - b. Engineer will provide timely review of all such Submittals in accordance with the Schedule of Submittals and return such Submittals with a notation of either Accepted or Not Accepted. Any such Submittal that is not returned within the time established in the Schedule of Submittals will be deemed accepted.
 - c. Engineer's review will be only to determine if the Submittal is acceptable under the requirements of the Contract Documents as to general form and content of the Submittal.
 - d. If any such Submittal is not accepted, Contractor shall confer with Engineer regarding the reason for the non-acceptance, and resubmit an acceptable document.
2. Procedures for the submittal and acceptance of the Progress Schedule, the Schedule of Submittals, and the Schedule of Values are set forth in Paragraphs 2.03, 2.04, and 2.05.

- F. Owner-delegated Designs: Submittals pursuant to Owner-delegated designs are governed by the provisions of Paragraph 7.19.

7.17 Contractor's General Warranty and Guarantee

- A. Contractor warrants and guarantees to Owner that all Work will be in accordance with the Contract Documents and will not be defective. Engineer is entitled to rely on Contractor's warranty and guarantee.

- B. Owner's rights under this warranty and guarantee are in addition to, and are not limited by, Owner's rights under the correction period provisions of Paragraph 15.08. The time in which Owner may enforce its warranty and guarantee rights under this Paragraph 7.17 is limited only by applicable Laws and Regulations restricting actions to enforce such rights; provided, however, that after the end of the correction period under Paragraph 15.08:
 - 1. Owner shall give Contractor written notice of any defective Work within 60 days of the discovery that such Work is defective; and
 - 2. Such notice will be deemed the start of an event giving rise to a Claim under Paragraph 12.01.B, such that any related Claim must be brought within 30 days of the notice.
- C. Contractor's warranty and guarantee hereunder excludes defects or damage caused by:
 - 1. abuse, or improper modification, maintenance, or operation, by persons other than Contractor, Subcontractors, Suppliers, or any other individual or entity for whom Contractor is responsible; or
 - 2. normal wear and tear under normal usage.
- D. Contractor's obligation to perform and complete the Work in accordance with the Contract Documents is absolute. None of the following will constitute an acceptance of Work that is not in accordance with the Contract Documents, a release of Contractor's obligation to perform the Work in accordance with the Contract Documents, or a release of Owner's warranty and guarantee rights under this Paragraph 7.17:
 - 1. Observations by Engineer;
 - 2. Recommendation by Engineer or payment by Owner of any progress or final payment;
 - 3. The issuance of a certificate of Substantial Completion by Engineer or any payment related thereto by Owner;
 - 4. Use or occupancy of the Work or any part thereof by Owner;
 - 5. Any review and approval of a Shop Drawing or Sample submittal;
 - 6. The issuance of a notice of acceptability by Engineer;
 - 7. The end of the correction period established in Paragraph 15.08;
 - 8. Any inspection, test, or approval by others; or
 - 9. Any correction of defective Work by Owner.
- E. If the Contract requires the Contractor to accept the assignment of a contract entered into by Owner, then the specific warranties, guarantees, and correction obligations contained in the assigned contract will govern with respect to Contractor's performance obligations to Owner for the Work described in the assigned contract.

7.18 Indemnification

- A. To the fullest extent permitted by Laws and Regulations, and in addition to any other obligations of Contractor under the Contract or otherwise, Contractor shall indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them, from losses,

- damages, costs, and judgments (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals, and all court or arbitration or other dispute resolution costs) arising from third-party claims or actions relating to or resulting from the performance or furnishing of the Work, provided that any such claim, action, loss, cost, judgment or damage is attributable to bodily injury, sickness, disease, or death, or to damage to or destruction of tangible property (other than the Work itself), including the loss of use resulting therefrom, but only to the extent caused by any negligent act or omission of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable.
- B. In any and all claims against Owner or Engineer, or any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, by any employee (or the survivor or personal representative of such employee) of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable, the indemnification obligation under Paragraph 7.18.A will not be limited in any way by any limitation on the amount or type of damages, compensation, or benefits payable by or for Contractor or any such Subcontractor, Supplier, or other individual or entity under workers' compensation acts, disability benefit acts, or other employee benefit acts.

7.19 *Delegation of Professional Design Services*

- A. Owner may require Contractor to provide professional design services for a portion of the Work by express delegation in the Contract Documents. Such delegation will specify the performance and design criteria that such services must satisfy, and the Submittals that Contractor must furnish to Engineer with respect to the Owner-delegated design.
- B. Contractor shall cause such Owner-delegated professional design services to be provided pursuant to the professional standard of care by a properly licensed design professional, whose signature and seal must appear on all drawings, calculations, specifications, certifications, and Submittals prepared by such design professional. Such design professional must issue all certifications of design required by Laws and Regulations.
- C. If a Shop Drawing or other Submittal related to the Owner-delegated design is prepared by Contractor, a Subcontractor, or others for submittal to Engineer, then such Shop Drawing or other Submittal must bear the written approval of Contractor's design professional when submitted by Contractor to Engineer.
- D. Owner and Engineer shall be entitled to rely upon the adequacy, accuracy, and completeness of the services, certifications, and approvals performed or provided by the design professionals retained or employed by Contractor under an Owner-delegated design, subject to the professional standard of care and the performance and design criteria stated in the Contract Documents.
- E. Pursuant to this Paragraph 7.19, Engineer's review, approval, and other determinations regarding design drawings, calculations, specifications, certifications, and other Submittals furnished by Contractor pursuant to an Owner-delegated design will be only for the following limited purposes:
1. Checking for conformance with the requirements of this Paragraph 7.19;

2. Confirming that Contractor (through its design professionals) has used the performance and design criteria specified in the Contract Documents; and
 3. Establishing that the design furnished by Contractor is consistent with the design concept expressed in the Contract Documents.
- F. Contractor shall not be responsible for the adequacy of performance or design criteria specified by Owner or Engineer.
- G. Contractor is not required to provide professional services in violation of applicable Laws and Regulations.

ARTICLE 8—OTHER WORK AT THE SITE

8.01 *Other Work*

- A. In addition to and apart from the Work under the Contract Documents, the Owner may perform other work at or adjacent to the Site. Such other work may be performed by Owner's employees, or through contracts between the Owner and third parties. Owner may also arrange to have third-party utility owners perform work on their utilities and facilities at or adjacent to the Site.
- B. If Owner performs other work at or adjacent to the Site with Owner's employees, or through contracts for such other work, then Owner shall give Contractor written notice thereof prior to starting any such other work. If Owner has advance information regarding the start of any third-party utility work that Owner has arranged to take place at or adjacent to the Site, Owner shall provide such information to Contractor.
- C. Contractor shall afford proper and safe access to the Site to each contractor that performs such other work, each utility owner performing other work, and Owner, if Owner is performing other work with Owner's employees, and provide a reasonable opportunity for the introduction and storage of materials and equipment and the execution of such other work.
- D. Contractor shall do all cutting, fitting, and patching of the Work that may be required to properly connect or otherwise make its several parts come together and properly integrate with such other work. Contractor shall not endanger any work of others by cutting, excavating, or otherwise altering such work; provided, however, that Contractor may cut or alter others' work with the written consent of Engineer and the others whose work will be affected.
- E. If the proper execution or results of any part of Contractor's Work depends upon work performed by others, Contractor shall inspect such other work and promptly report to Engineer in writing any delays, defects, or deficiencies in such other work that render it unavailable or unsuitable for the proper execution and results of Contractor's Work. Contractor's failure to so report will constitute an acceptance of such other work as fit and proper for integration with Contractor's Work except for latent defects and deficiencies in such other work.
- F. The provisions of this article are not applicable to work that is performed by third-party utilities or other third-party entities without a contract with Owner, or that is performed without having been arranged by Owner. If such work occurs, then any related delay,

disruption, or interference incurred by Contractor is governed by the provisions of Paragraph 4.05.C.3.

8.02 *Coordination*

- A. If Owner intends to contract with others for the performance of other work at or adjacent to the Site, to perform other work at or adjacent to the Site with Owner's employees, or to arrange to have utility owners perform work at or adjacent to the Site, the following will be set forth in the Supplementary Conditions or provided to Contractor prior to the start of any such other work:
 - 1. The identity of the individual or entity that will have authority and responsibility for coordination of the activities among the various contractors;
 - 2. An itemization of the specific matters to be covered by such authority and responsibility; and
 - 3. The extent of such authority and responsibilities.
- B. Unless otherwise provided in the Supplementary Conditions, Owner shall have sole authority and responsibility for such coordination.

8.03 *Legal Relationships*

- A. If, in the course of performing other work for Owner at or adjacent to the Site, the Owner's employees, any other contractor working for Owner, or any utility owner that Owner has arranged to perform work, causes damage to the Work or to the property of Contractor or its Subcontractors, or delays, disrupts, interferes with, or increases the scope or cost of the performance of the Work, through actions or inaction, then Contractor shall be entitled to an equitable adjustment in the Contract Price or the Contract Times. Contractor must submit any Change Proposal seeking an equitable adjustment in the Contract Price or the Contract Times under this paragraph within 30 days of the damaging, delaying, disrupting, or interfering event. The entitlement to, and extent of, any such equitable adjustment will take into account information (if any) regarding such other work that was provided to Contractor in the Contract Documents prior to the submittal of the Bid or the final negotiation of the terms of the Contract, and any remedies available to Contractor under Laws or Regulations concerning utility action or inaction. When applicable, any such equitable adjustment in Contract Price will be conditioned on Contractor assigning to Owner all Contractor's rights against such other contractor or utility owner with respect to the damage, delay, disruption, or interference that is the subject of the adjustment. Contractor's entitlement to an adjustment of the Contract Times or Contract Price is subject to the provisions of Paragraphs 4.05.D and 4.05.E.
- B. Contractor shall take reasonable and customary measures to avoid damaging, delaying, disrupting, or interfering with the work of Owner, any other contractor, or any utility owner performing other work at or adjacent to the Site.
 - 1. If Contractor fails to take such measures and as a result damages, delays, disrupts, or interferes with the work of any such other contractor or utility owner, then Owner may impose a set-off against payments due Contractor, and assign to such other contractor or utility owner the Owner's contractual rights against Contractor with respect to the breach of the obligations set forth in this Paragraph 8.03.B.

2. When Owner is performing other work at or adjacent to the Site with Owner's employees, Contractor shall be liable to Owner for damage to such other work, and for the reasonable direct delay, disruption, and interference costs incurred by Owner as a result of Contractor's failure to take reasonable and customary measures with respect to Owner's other work. In response to such damage, delay, disruption, or interference, Owner may impose a set-off against payments due Contractor.
- C. If Contractor damages, delays, disrupts, or interferes with the work of any other contractor, or any utility owner performing other work at or adjacent to the Site, through Contractor's failure to take reasonable and customary measures to avoid such impacts, or if any claim arising out of Contractor's actions, inactions, or negligence in performance of the Work at or adjacent to the Site is made by any such other contractor or utility owner against Contractor, Owner, or Engineer, then Contractor shall (1) promptly attempt to settle the claim as to all parties through negotiations with such other contractor or utility owner, or otherwise resolve the claim by arbitration or other dispute resolution proceeding or at law, and (2) indemnify and hold harmless Owner and Engineer, and the officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them from and against any such claims, and against all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such damage, delay, disruption, or interference.

ARTICLE 9—OWNER'S RESPONSIBILITIES

9.01 *Communications to Contractor*

- A. Except as otherwise provided in these General Conditions, Owner shall issue all communications to Contractor through Engineer.

9.02 *Replacement of Engineer*

- A. Owner may at its discretion appoint an engineer to replace Engineer, provided Contractor makes no reasonable objection to the replacement engineer. The replacement engineer's status under the Contract Documents will be that of the former Engineer.

9.03 *Furnish Data*

- A. Owner shall promptly furnish the data required of Owner under the Contract Documents.

9.04 *Pay When Due*

- A. Owner shall make payments to Contractor when they are due as provided in the Agreement.

9.05 *Lands and Easements; Reports, Tests, and Drawings*

- A. Owner's duties with respect to providing lands and easements are set forth in Paragraph 5.01.
- B. Owner's duties with respect to providing engineering surveys to establish reference points are set forth in Paragraph 4.03.
- C. Article 5 refers to Owner's identifying and making available to Contractor copies of reports of explorations and tests of conditions at the Site, and drawings of physical conditions relating to existing surface or subsurface structures at the Site.

9.06 *Insurance*

- A. Owner's responsibilities, if any, with respect to purchasing and maintaining liability and property insurance are set forth in Article 6.

9.07 *Change Orders*

- A. Owner's responsibilities with respect to Change Orders are set forth in Article 11.

9.08 *Inspections, Tests, and Approvals*

- A. Owner's responsibility with respect to certain inspections, tests, and approvals is set forth in Paragraph 14.02.B.

9.09 *Limitations on Owner's Responsibilities*

- A. The Owner shall not supervise, direct, or have control or authority over, nor be responsible for, Contractor's means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or for any failure of Contractor to comply with Laws and Regulations applicable to the performance of the Work. Owner will not be responsible for Contractor's failure to perform the Work in accordance with the Contract Documents.

9.10 *Undisclosed Hazardous Environmental Condition*

- A. Owner's responsibility in respect to an undisclosed Hazardous Environmental Condition is set forth in Paragraph 5.06.

9.11 *Evidence of Financial Arrangements*

- A. Upon request of Contractor, Owner shall furnish Contractor reasonable evidence that financial arrangements have been made to satisfy Owner's obligations under the Contract (including obligations under proposed changes in the Work).

9.12 *Safety Programs*

- A. While at the Site, Owner's employees and representatives shall comply with the specific applicable requirements of Contractor's safety programs of which Owner has been informed.
- B. Owner shall furnish copies of any applicable Owner safety programs to Contractor.

ARTICLE 10—ENGINEER'S STATUS DURING CONSTRUCTION

10.01 *Owner's Representative*

- A. Engineer will be Owner's representative during the construction period. The duties and responsibilities and the limitations of authority of Engineer as Owner's representative during construction are set forth in the Contract.

10.02 *Visits to Site*

- A. Engineer will make visits to the Site at intervals appropriate to the various stages of construction as Engineer deems necessary in order to observe, as an experienced and qualified design professional, the progress that has been made and the quality of the various aspects of Contractor's executed Work. Based on information obtained during such visits and observations, Engineer, for the benefit of Owner, will determine, in general, if the Work is proceeding in accordance with the Contract Documents. Engineer will not be required to

make exhaustive or continuous inspections on the Site to check the quality or quantity of the Work. Engineer's efforts will be directed toward providing for Owner a greater degree of confidence that the completed Work will conform generally to the Contract Documents. On the basis of such visits and observations, Engineer will keep Owner informed of the progress of the Work and will endeavor to guard Owner against defective Work.

- B. Engineer's visits and observations are subject to all the limitations on Engineer's authority and responsibility set forth in Paragraph 10.07. Particularly, but without limitation, during or as a result of Engineer's visits or observations of Contractor's Work, Engineer will not supervise, direct, control, or have authority over or be responsible for Contractor's means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or for any failure of Contractor to comply with Laws and Regulations applicable to the performance of the Work.

10.03 *Resident Project Representative*

- A. If Owner and Engineer have agreed that Engineer will furnish a Resident Project Representative to represent Engineer at the Site and assist Engineer in observing the progress and quality of the Work, then the authority and responsibilities of any such Resident Project Representative will be as provided in the Supplementary Conditions, and limitations on the responsibilities thereof will be as provided in the Supplementary Conditions and in Paragraph 10.07.
- B. If Owner designates an individual or entity who is not Engineer's consultant, agent, or employee to represent Owner at the Site, then the responsibilities and authority of such individual or entity will be as provided in the Supplementary Conditions.

10.04 *Engineer's Authority*

- A. Engineer has the authority to reject Work in accordance with Article 14.
- B. Engineer's authority as to Submittals is set forth in Paragraph 7.16.
- C. Engineer's authority as to design drawings, calculations, specifications, certifications and other Submittals from Contractor in response to Owner's delegation (if any) to Contractor of professional design services, is set forth in Paragraph 7.19.
- D. Engineer's authority as to changes in the Work is set forth in Article 11.
- E. Engineer's authority as to Applications for Payment is set forth in Article 15.

10.05 *Determinations for Unit Price Work*

- A. Engineer will determine the actual quantities and classifications of Unit Price Work performed by Contractor as set forth in Paragraph 13.03.

10.06 *Decisions on Requirements of Contract Documents and Acceptability of Work*

- A. Engineer will render decisions regarding the requirements of the Contract Documents, and judge the acceptability of the Work, pursuant to the specific procedures set forth herein for initial interpretations, Change Proposals, and acceptance of the Work. In rendering such decisions and judgments, Engineer will not show partiality to Owner or Contractor, and will not be liable to Owner, Contractor, or others in connection with any proceedings, interpretations, decisions, or judgments conducted or rendered in good faith.

10.07 *Limitations on Engineer's Authority and Responsibilities*

- A. Neither Engineer's authority or responsibility under this Article 10 or under any other provision of the Contract, nor any decision made by Engineer in good faith either to exercise or not exercise such authority or responsibility or the undertaking, exercise, or performance of any authority or responsibility by Engineer, will create, impose, or give rise to any duty in contract, tort, or otherwise owed by Engineer to Contractor, any Subcontractor, any Supplier, any other individual or entity, or to any surety for or employee or agent of any of them.
- B. Engineer will not supervise, direct, control, or have authority over or be responsible for Contractor's means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto, or for any failure of Contractor to comply with Laws and Regulations applicable to the performance of the Work. Engineer will not be responsible for Contractor's failure to perform the Work in accordance with the Contract Documents.
- C. Engineer will not be responsible for the acts or omissions of Contractor or of any Subcontractor, any Supplier, or of any other individual or entity performing any of the Work.
- D. Engineer's review of the final Application for Payment and accompanying documentation, and all maintenance and operating instructions, schedules, guarantees, bonds, certificates of inspection, tests and approvals, and other documentation required to be delivered by Contractor under Paragraph 15.06.A, will only be to determine generally that their content complies with the requirements of, and in the case of certificates of inspections, tests, and approvals, that the results certified indicate compliance with the Contract Documents.
- E. The limitations upon authority and responsibility set forth in this Paragraph 10.07 also apply to the Resident Project Representative, if any.

10.08 *Compliance with Safety Program*

- A. While at the Site, Engineer's employees and representatives will comply with the specific applicable requirements of Owner's and Contractor's safety programs of which Engineer has been informed.

ARTICLE 11—CHANGES TO THE CONTRACT

11.01 *Amending and Supplementing the Contract*

- A. The Contract may be amended or supplemented by a Change Order, a Work Change Directive, or a Field Order.
- B. If an amendment or supplement to the Contract includes a change in the Contract Price or the Contract Times, such amendment or supplement must be set forth in a Change Order.
- C. All changes to the Contract that involve (1) the performance or acceptability of the Work, (2) the design (as set forth in the Drawings, Specifications, or otherwise), or (3) other engineering or technical matters, must be supported by Engineer's recommendation. Owner and Contractor may amend other terms and conditions of the Contract without the recommendation of the Engineer.

11.02 *Change Orders*

- A. Owner and Contractor shall execute appropriate Change Orders covering:
 - 1. Changes in Contract Price or Contract Times which are agreed to by the parties, including any undisputed sum or amount of time for Work actually performed in accordance with a Work Change Directive;
 - 2. Changes in Contract Price resulting from an Owner set-off, unless Contractor has duly contested such set-off;
 - 3. Changes in the Work which are: (a) ordered by Owner pursuant to Paragraph 11.05, (b) required because of Owner's acceptance of defective Work under Paragraph 14.04 or Owner's correction of defective Work under Paragraph 14.07, or (c) agreed to by the parties, subject to the need for Engineer's recommendation if the change in the Work involves the design (as set forth in the Drawings, Specifications, or otherwise) or other engineering or technical matters; and
 - 4. Changes that embody the substance of any final and binding results under: Paragraph 11.03.B, resolving the impact of a Work Change Directive; Paragraph 11.09, concerning Change Proposals; Article 12, Claims; Paragraph 13.02.D, final adjustments resulting from allowances; Paragraph 13.03.D, final adjustments relating to determination of quantities for Unit Price Work; and similar provisions.
- B. If Owner or Contractor refuses to execute a Change Order that is required to be executed under the terms of Paragraph 11.02.A, it will be deemed to be of full force and effect, as if fully executed.

11.03 *Work Change Directives*

- A. A Work Change Directive will not change the Contract Price or the Contract Times but is evidence that the parties expect that the modification ordered or documented by a Work Change Directive will be incorporated in a subsequently issued Change Order, following negotiations by the parties as to the Work Change Directive's effect, if any, on the Contract Price and Contract Times; or, if negotiations are unsuccessful, by a determination under the terms of the Contract Documents governing adjustments, expressly including Paragraph 11.07 regarding change of Contract Price.
- B. If Owner has issued a Work Change Directive and:
 - 1. Contractor believes that an adjustment in Contract Times or Contract Price is necessary, then Contractor shall submit any Change Proposal seeking such an adjustment no later than 30 days after the completion of the Work set out in the Work Change Directive.
 - 2. Owner believes that an adjustment in Contract Times or Contract Price is necessary, then Owner shall submit any Claim seeking such an adjustment no later than 60 days after issuance of the Work Change Directive.

11.04 *Field Orders*

- A. Engineer may authorize minor changes in the Work if the changes do not involve an adjustment in the Contract Price or the Contract Times and are compatible with the design concept of the completed Project as a functioning whole as indicated by the Contract

Documents. Such changes will be accomplished by a Field Order and will be binding on Owner and also on Contractor, which shall perform the Work involved promptly.

- B. If Contractor believes that a Field Order justifies an adjustment in the Contract Price or Contract Times, then before proceeding with the Work at issue, Contractor shall submit a Change Proposal as provided herein.

11.05 *Owner-Authorized Changes in the Work*

- A. Without invalidating the Contract and without notice to any surety, Owner may, at any time or from time to time, order additions, deletions, or revisions in the Work. Changes involving the design (as set forth in the Drawings, Specifications, or otherwise) or other engineering or technical matters will be supported by Engineer's recommendation.
- B. Such changes in the Work may be accomplished by a Change Order, if Owner and Contractor have agreed as to the effect, if any, of the changes on Contract Times or Contract Price; or by a Work Change Directive. Upon receipt of any such document, Contractor shall promptly proceed with the Work involved; or, in the case of a deletion in the Work, promptly cease construction activities with respect to such deleted Work. Added or revised Work must be performed under the applicable conditions of the Contract Documents.
- C. Nothing in this Paragraph 11.05 obligates Contractor to undertake work that Contractor reasonably concludes cannot be performed in a manner consistent with Contractor's safety obligations under the Contract Documents or Laws and Regulations.

11.06 *Unauthorized Changes in the Work*

- A. Contractor shall not be entitled to an increase in the Contract Price or an extension of the Contract Times with respect to any work performed that is not required by the Contract Documents, as amended, modified, or supplemented, except in the case of an emergency as provided in Paragraph 7.15 or in the case of uncovering Work as provided in Paragraph 14.05.C.2.

11.07 *Change of Contract Price*

- A. The Contract Price may only be changed by a Change Order. Any Change Proposal for an adjustment in the Contract Price must comply with the provisions of Paragraph 11.09. Any Claim for an adjustment of Contract Price must comply with the provisions of Article 12.
- B. An adjustment in the Contract Price will be determined as follows:
 - 1. Where the Work involved is covered by unit prices contained in the Contract Documents, then by application of such unit prices to the quantities of the items involved (subject to the provisions of Paragraph 13.03);
 - 2. Where the Work involved is not covered by unit prices contained in the Contract Documents, then by a mutually agreed lump sum (which may include an allowance for overhead and profit not necessarily in accordance with Paragraph 11.07.C.2); or
 - 3. Where the Work involved is not covered by unit prices contained in the Contract Documents and the parties do not reach mutual agreement to a lump sum, then on the basis of the Cost of the Work (determined as provided in Paragraph 13.01) plus a Contractor's fee for overhead and profit (determined as provided in Paragraph 11.07.C).

- C. *Contractor's Fee*: When applicable, the Contractor's fee for overhead and profit will be determined as follows:
1. A mutually acceptable fixed fee; or
 2. If a fixed fee is not agreed upon, then a fee based on the following percentages of the various portions of the Cost of the Work:
 - a. For costs incurred under Paragraphs 13.01.B.1 and 13.01.B.2, the Contractor's fee will be 15 percent;
 - b. For costs incurred under Paragraph 13.01.B.3, the Contractor's fee will be 5 percent;
 - c. Where one or more tiers of subcontracts are on the basis of Cost of the Work plus a fee and no fixed fee is agreed upon, the intent of Paragraphs 11.07.C.2.a and 11.07.C.2.b is that the Contractor's fee will be based on: (1) a fee of 15 percent of the costs incurred under Paragraphs 13.01.B.1 and 13.01.B.2 by the Subcontractor that actually performs the Work, at whatever tier, and (2) with respect to Contractor itself and to any Subcontractors of a tier higher than that of the Subcontractor that actually performs the Work, a fee of 5 percent of the amount (fee plus underlying costs incurred) attributable to the next lower tier Subcontractor; provided, however, that for any such subcontracted Work the maximum total fee to be paid by Owner will be no greater than 27 percent of the costs incurred by the Subcontractor that actually performs the Work;
 - d. No fee will be payable on the basis of costs itemized under Paragraphs 13.01.B.4, 13.01.B.5, and 13.01.C;
 - e. The amount of credit to be allowed by Contractor to Owner for any change which results in a net decrease in Cost of the Work will be the amount of the actual net decrease in Cost of the Work and a deduction of an additional amount equal to 5 percent of such actual net decrease in Cost of the Work; and
 - f. When both additions and credits are involved in any one change or Change Proposal, the adjustment in Contractor's fee will be computed by determining the sum of the costs in each of the cost categories in Paragraph 13.01.B (specifically, payroll costs, Paragraph 13.01.B.1; incorporated materials and equipment costs, Paragraph 13.01.B.2; Subcontract costs, Paragraph 13.01.B.3; special consultants costs, Paragraph 13.01.B.4; and other costs, Paragraph 13.01.B.5) and applying to each such cost category sum the appropriate fee from Paragraphs 11.07.C.2.a through 11.07.C.2.e, inclusive.

11.08 *Change of Contract Times*

- A. The Contract Times may only be changed by a Change Order. Any Change Proposal for an adjustment in the Contract Times must comply with the provisions of Paragraph 11.09. Any Claim for an adjustment in the Contract Times must comply with the provisions of Article 12.
- B. Delay, disruption, and interference in the Work, and any related changes in Contract Times, are addressed in and governed by Paragraph 4.05.

11.09 *Change Proposals*

A. *Purpose and Content:* Contractor shall submit a Change Proposal to Engineer to request an adjustment in the Contract Times or Contract Price; contest an initial decision by Engineer concerning the requirements of the Contract Documents or relating to the acceptability of the Work under the Contract Documents; challenge a set-off against payment due; or seek other relief under the Contract. The Change Proposal will specify any proposed change in Contract Times or Contract Price, or other proposed relief, and explain the reason for the proposed change, with citations to any governing or applicable provisions of the Contract Documents. Each Change Proposal will address only one issue, or a set of closely related issues.

B. *Change Proposal Procedures*

1. *Submittal:* Contractor shall submit each Change Proposal to Engineer within 30 days after the start of the event giving rise thereto, or after such initial decision.
2. *Supporting Data:* The Contractor shall submit supporting data, including the proposed change in Contract Price or Contract Time (if any), to the Engineer and Owner within 15 days after the submittal of the Change Proposal.
 - a. Change Proposals based on or related to delay, interruption, or interference must comply with the provisions of Paragraphs 4.05.D and 4.05.E.
 - b. Change proposals related to a change of Contract Price must include full and detailed accounts of materials incorporated into the Work and labor and equipment used for the subject Work.

The supporting data must be accompanied by a written statement that the supporting data are accurate and complete, and that any requested time or price adjustment is the entire adjustment to which Contractor believes it is entitled as a result of said event.

3. *Engineer's Initial Review:* Engineer will advise Owner regarding the Change Proposal, and consider any comments or response from Owner regarding the Change Proposal. If in its discretion Engineer concludes that additional supporting data is needed before conducting a full review and making a decision regarding the Change Proposal, then Engineer may request that Contractor submit such additional supporting data by a date specified by Engineer, prior to Engineer beginning its full review of the Change Proposal.
4. *Engineer's Full Review and Action on the Change Proposal:* Upon receipt of Contractor's supporting data (including any additional data requested by Engineer), Engineer will conduct a full review of each Change Proposal and, within 30 days after such receipt of the Contractor's supporting data, either approve the Change Proposal in whole, deny it in whole, or approve it in part and deny it in part. Such actions must be in writing, with a copy provided to Owner and Contractor. If Engineer does not take action on the Change Proposal within 30 days, then either Owner or Contractor may at any time thereafter submit a letter to the other party indicating that as a result of Engineer's inaction the Change Proposal is deemed denied, thereby commencing the time for appeal of the denial under Article 12.
5. *Binding Decision:* Engineer's decision is final and binding upon Owner and Contractor, unless Owner or Contractor appeals the decision by filing a Claim under Article 12.

- C. *Resolution of Certain Change Proposals*: If the Change Proposal does not involve the design (as set forth in the Drawings, Specifications, or otherwise), the acceptability of the Work, or other engineering or technical matters, then Engineer will notify the parties in writing that the Engineer is unable to resolve the Change Proposal. For purposes of further resolution of such a Change Proposal, such notice will be deemed a denial, and Contractor may choose to seek resolution under the terms of Article 12.
- D. *Post-Completion*: Contractor shall not submit any Change Proposals after Engineer issues a written recommendation of final payment pursuant to Paragraph 15.06.B.

11.10 *Notification to Surety*

- A. If the provisions of any bond require notice to be given to a surety of any change affecting the general scope of the Work or the provisions of the Contract Documents (including, but not limited to, Contract Price or Contract Times), the giving of any such notice will be Contractor's responsibility. The amount of each applicable bond will be adjusted to reflect the effect of any such change.

ARTICLE 12—CLAIMS

12.01 *Claims*

- A. *Claims Process*: The following disputes between Owner and Contractor are subject to the Claims process set forth in this article:
 - 1. Appeals by Owner or Contractor of Engineer's decisions regarding Change Proposals;
 - 2. Owner demands for adjustments in the Contract Price or Contract Times, or other relief under the Contract Documents;
 - 3. Disputes that Engineer has been unable to address because they do not involve the design (as set forth in the Drawings, Specifications, or otherwise), the acceptability of the Work, or other engineering or technical matters; and
 - 4. Subject to the waiver provisions of Paragraph 15.07, any dispute arising after Engineer has issued a written recommendation of final payment pursuant to Paragraph 15.06.B.
- B. *Submittal of Claim*: The party submitting a Claim shall deliver it directly to the other party to the Contract promptly (but in no event later than 30 days) after the start of the event giving rise thereto; in the case of appeals regarding Change Proposals within 30 days of the decision under appeal. The party submitting the Claim shall also furnish a copy to the Engineer, for its information only. The responsibility to substantiate a Claim rests with the party making the Claim. In the case of a Claim by Contractor seeking an increase in the Contract Times or Contract Price, Contractor shall certify that the Claim is made in good faith, that the supporting data are accurate and complete, and that to the best of Contractor's knowledge and belief the amount of time or money requested accurately reflects the full amount to which Contractor is entitled.
- C. *Review and Resolution*: The party receiving a Claim shall review it thoroughly, giving full consideration to its merits. The two parties shall seek to resolve the Claim through the exchange of information and direct negotiations. The parties may extend the time for resolving the Claim by mutual agreement. All actions taken on a Claim will be stated in writing and submitted to the other party, with a copy to Engineer.

D. *Mediation*

1. At any time after initiation of a Claim, Owner and Contractor may mutually agree to mediation of the underlying dispute. The agreement to mediate will stay the Claim submittal and response process.
 2. If Owner and Contractor agree to mediation, then after 60 days from such agreement, either Owner or Contractor may unilaterally terminate the mediation process, and the Claim submittal and decision process will resume as of the date of the termination. If the mediation proceeds but is unsuccessful in resolving the dispute, the Claim submittal and decision process will resume as of the date of the conclusion of the mediation, as determined by the mediator.
 3. Owner and Contractor shall each pay one-half of the mediator's fees and costs.
- E. *Partial Approval*: If the party receiving a Claim approves the Claim in part and denies it in part, such action will be final and binding unless within 30 days of such action the other party invokes the procedure set forth in Article 17 for final resolution of disputes.
- F. *Denial of Claim*: If efforts to resolve a Claim are not successful, the party receiving the Claim may deny it by giving written notice of denial to the other party. If the receiving party does not take action on the Claim within 90 days, then either Owner or Contractor may at any time thereafter submit a letter to the other party indicating that as a result of the inaction, the Claim is deemed denied, thereby commencing the time for appeal of the denial. A denial of the Claim will be final and binding unless within 30 days of the denial the other party invokes the procedure set forth in Article 17 for the final resolution of disputes.
- G. *Final and Binding Results*: If the parties reach a mutual agreement regarding a Claim, whether through approval of the Claim, direct negotiations, mediation, or otherwise; or if a Claim is approved in part and denied in part, or denied in full, and such actions become final and binding; then the results of the agreement or action on the Claim will be incorporated in a Change Order or other written document to the extent they affect the Contract, including the Work, the Contract Times, or the Contract Price.

ARTICLE 13—COST OF THE WORK; ALLOWANCES; UNIT PRICE WORK

13.01 *Cost of the Work*

- A. *Purposes for Determination of Cost of the Work*: The term Cost of the Work means the sum of all costs necessary for the proper performance of the Work at issue, as further defined below. The provisions of this Paragraph 13.01 are used for two distinct purposes:
1. To determine Cost of the Work when Cost of the Work is a component of the Contract Price, under cost-plus-fee, time-and-materials, or other cost-based terms; or
 2. When needed to determine the value of a Change Order, Change Proposal, Claim, set-off, or other adjustment in Contract Price. When the value of any such adjustment is determined on the basis of Cost of the Work, Contractor is entitled only to those additional or incremental costs required because of the change in the Work or because of the event giving rise to the adjustment.
- B. *Costs Included*: Except as otherwise may be agreed to in writing by Owner, costs included in the Cost of the Work will be in amounts no higher than those commonly incurred in the

locality of the Project, will not include any of the costs itemized in Paragraph 13.01.C, and will include only the following items:

1. Payroll costs for employees in the direct employ of Contractor in the performance of the Work under schedules of job classifications agreed upon by Owner and Contractor in advance of the subject Work. Such employees include, without limitation, superintendents, foremen, safety managers, safety representatives, and other personnel employed full time on the Work. Payroll costs for employees not employed full time on the Work will be apportioned on the basis of their time spent on the Work. Payroll costs include, but are not limited to, salaries and wages plus the cost of fringe benefits, which include social security contributions, unemployment, excise, and payroll taxes, workers' compensation, health and retirement benefits, sick leave, and vacation and holiday pay applicable thereto. The expenses of performing Work outside of regular working hours, on Saturday, Sunday, or legal holidays, will be included in the above to the extent authorized by Owner.
2. Cost of all materials and equipment furnished and incorporated in the Work, including costs of transportation and storage thereof, and Suppliers' field services required in connection therewith. All cash discounts accrue to Contractor unless Owner deposits funds with Contractor with which to make payments, in which case the cash discounts will accrue to Owner. All trade discounts, rebates, and refunds and returns from sale of surplus materials and equipment will accrue to Owner, and Contractor shall make provisions so that they may be obtained.
3. Payments made by Contractor to Subcontractors for Work performed by Subcontractors. If required by Owner, Contractor shall obtain competitive bids from subcontractors acceptable to Owner and Contractor and shall deliver such bids to Owner, which will then determine, with the advice of Engineer, which bids, if any, will be acceptable. If any subcontract provides that the Subcontractor is to be paid on the basis of Cost of the Work plus a fee, the Subcontractor's Cost of the Work and fee will be determined in the same manner as Contractor's Cost of the Work and fee as provided in this Paragraph 13.01.
4. Costs of special consultants (including but not limited to engineers, architects, testing laboratories, surveyors, attorneys, and accountants) employed or retained for services specifically related to the Work.
5. Other costs consisting of the following:
 - a. The proportion of necessary transportation, travel, and subsistence expenses of Contractor's employees incurred in discharge of duties connected with the Work.
 - b. Cost, including transportation and maintenance, of all materials, supplies, equipment, machinery, appliances, office, and temporary facilities at the Site, which are consumed in the performance of the Work, and cost, less market value, of such items used but not consumed which remain the property of Contractor.
 - 1) In establishing included costs for materials such as scaffolding, plating, or sheeting, consideration will be given to the actual or the estimated life of the material for use on other projects; or rental rates may be established on the basis of purchase or salvage value of such items, whichever is less. Contractor will not

be eligible for compensation for such items in an amount that exceeds the purchase cost of such item.

c. *Construction Equipment Rental*

- 1) Rentals of all construction equipment and machinery, and the parts thereof, in accordance with rental agreements approved by Owner as to price (including any surcharge or special rates applicable to overtime use of the construction equipment or machinery), and the costs of transportation, loading, unloading, assembly, dismantling, and removal thereof. All such costs will be in accordance with the terms of said rental agreements. The rental of any such equipment, machinery, or parts must cease when the use thereof is no longer necessary for the Work.
 - 2) Costs for equipment and machinery owned by Contractor or a Contractor-related entity will be paid at a rate shown for such equipment in the equipment rental rate book specified in the Supplementary Conditions. An hourly rate will be computed by dividing the monthly rates by 176. These computed rates will include all operating costs.
 - 3) With respect to Work that is the result of a Change Order, Change Proposal, Claim, set-off, or other adjustment in Contract Price ("changed Work"), included costs will be based on the time the equipment or machinery is in use on the changed Work and the costs of transportation, loading, unloading, assembly, dismantling, and removal when directly attributable to the changed Work. The cost of any such equipment or machinery, or parts thereof, must cease to accrue when the use thereof is no longer necessary for the changed Work.
- d. Sales, consumer, use, and other similar taxes related to the Work, and for which Contractor is liable, as imposed by Laws and Regulations.
- e. Deposits lost for causes other than negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, and royalty payments and fees for permits and licenses.
- f. Losses and damages (and related expenses) caused by damage to the Work, not compensated by insurance or otherwise, sustained by Contractor in connection with the performance of the Work (except losses and damages within the deductible amounts of builder's risk or other property insurance established in accordance with Paragraph 6.04), provided such losses and damages have resulted from causes other than the negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable. Such losses include settlements made with the written consent and approval of Owner. No such losses, damages, and expenses will be included in the Cost of the Work for the purpose of determining Contractor's fee.
- g. The cost of utilities, fuel, and sanitary facilities at the Site.
- h. Minor expenses such as communication service at the Site, express and courier services, and similar petty cash items in connection with the Work.

- i. The costs of premiums for all bonds and insurance that Contractor is required by the Contract Documents to purchase and maintain.
- C. *Costs Excluded*: The term Cost of the Work does not include any of the following items:
 1. Payroll costs and other compensation of Contractor's officers, executives, principals, general managers, engineers, architects, estimators, attorneys, auditors, accountants, purchasing and contracting agents, expeditors, timekeepers, clerks, and other personnel employed by Contractor, whether at the Site or in Contractor's principal or branch office for general administration of the Work and not specifically included in the agreed upon schedule of job classifications referred to in Paragraph 13.01.B.1 or specifically covered by Paragraph 13.01.B.4. The payroll costs and other compensation excluded here are to be considered administrative costs covered by the Contractor's fee.
 2. The cost of purchasing, renting, or furnishing small tools and hand tools.
 3. Expenses of Contractor's principal and branch offices other than Contractor's office at the Site.
 4. Any part of Contractor's capital expenses, including interest on Contractor's capital employed for the Work and charges against Contractor for delinquent payments.
 5. Costs due to the negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, including but not limited to, the correction of defective Work, disposal of materials or equipment wrongly supplied, and making good any damage to property.
 6. Expenses incurred in preparing and advancing Claims.
 7. Other overhead or general expense costs of any kind and the costs of any item not specifically and expressly included in Paragraph 13.01.B.
- D. *Contractor's Fee*
 1. When the Work as a whole is performed on the basis of cost-plus-a-fee, then:
 - a. Contractor's fee for the Work set forth in the Contract Documents as of the Effective Date of the Contract will be determined as set forth in the Agreement.
 - b. for any Work covered by a Change Order, Change Proposal, Claim, set-off, or other adjustment in Contract Price on the basis of Cost of the Work, Contractor's fee will be determined as follows:
 - 1) When the fee for the Work as a whole is a percentage of the Cost of the Work, the fee will automatically adjust as the Cost of the Work changes.
 - 2) When the fee for the Work as a whole is a fixed fee, the fee for any additions or deletions will be determined in accordance with Paragraph 11.07.C.2.
 2. When the Work as a whole is performed on the basis of a stipulated sum, or any other basis other than cost-plus-a-fee, then Contractor's fee for any Work covered by a Change Order, Change Proposal, Claim, set-off, or other adjustment in Contract Price on the basis of Cost of the Work will be determined in accordance with Paragraph 11.07.C.2.
- E. *Documentation and Audit*: Whenever the Cost of the Work for any purpose is to be determined pursuant to this Article 13, Contractor and pertinent Subcontractors will establish

and maintain records of the costs in accordance with generally accepted accounting practices. Subject to prior written notice, Owner will be afforded reasonable access, during normal business hours, to all Contractor's accounts, records, books, correspondence, instructions, drawings, receipts, vouchers, memoranda, and similar data relating to the Cost of the Work and Contractor's fee. Contractor shall preserve all such documents for a period of three years after the final payment by Owner. Pertinent Subcontractors will afford such access to Owner, and preserve such documents, to the same extent required of Contractor.

13.02 *Allowances*

- A. It is understood that Contractor has included in the Contract Price all allowances so named in the Contract Documents and shall cause the Work so covered to be performed for such sums and by such persons or entities as may be acceptable to Owner and Engineer.
- B. *Cash Allowances*: Contractor agrees that:
 - 1. the cash allowances include the cost to Contractor (less any applicable trade discounts) of materials and equipment required by the allowances to be delivered at the Site, and all applicable taxes; and
 - 2. Contractor's costs for unloading and handling on the Site, labor, installation, overhead, profit, and other expenses contemplated for the cash allowances have been included in the Contract Price and not in the allowances, and no demand for additional payment for any of the foregoing will be valid.
- C. *Owner's Contingency Allowance*: Contractor agrees that an Owner's contingency allowance, if any, is for the sole use of Owner to cover unanticipated costs.
- D. Prior to final payment, an appropriate Change Order will be issued as recommended by Engineer to reflect actual amounts due Contractor for Work covered by allowances, and the Contract Price will be correspondingly adjusted.

13.03 *Unit Price Work*

- A. Where the Contract Documents provide that all or part of the Work is to be Unit Price Work, initially the Contract Price will be deemed to include for all Unit Price Work an amount equal to the sum of the unit price for each separately identified item of Unit Price Work times the estimated quantity of each item as indicated in the Agreement.
- B. The estimated quantities of items of Unit Price Work are not guaranteed and are solely for the purpose of comparison of Bids and determining an initial Contract Price. Payments to Contractor for Unit Price Work will be based on actual quantities.
- C. Each unit price will be deemed to include an amount considered by Contractor to be adequate to cover Contractor's overhead and profit for each separately identified item.
- D. Engineer will determine the actual quantities and classifications of Unit Price Work performed by Contractor. Engineer will review with Contractor the Engineer's preliminary determinations on such matters before rendering a written decision thereon (by recommendation of an Application for Payment or otherwise). Engineer's written decision thereon will be final and binding (except as modified by Engineer to reflect changed factual conditions or more accurate data) upon Owner and Contractor, and the final adjustment of Contract Price will be set forth in a Change Order, subject to the provisions of the following paragraph.

E. Adjustments in Unit Price

1. Contractor or Owner shall be entitled to an adjustment in the unit price with respect to an item of Unit Price Work if:
 - a. the quantity of the item of Unit Price Work performed by Contractor differs materially and significantly from the estimated quantity of such item indicated in the Agreement; and
 - b. Contractor's unit costs to perform the item of Unit Price Work have changed materially and significantly as a result of the quantity change.
2. The adjustment in unit price will account for and be coordinated with any related changes in quantities of other items of Work, and in Contractor's costs to perform such other Work, such that the resulting overall change in Contract Price is equitable to Owner and Contractor.
3. Adjusted unit prices will apply to all units of that item.

ARTICLE 14—TESTS AND INSPECTIONS; CORRECTION, REMOVAL, OR ACCEPTANCE OF DEFECTIVE WORK

14.01 *Access to Work*

- A. Owner, Engineer, their consultants and other representatives and personnel of Owner, independent testing laboratories, and authorities having jurisdiction have access to the Site and the Work at reasonable times for their observation, inspection, and testing. Contractor shall provide them proper and safe conditions for such access and advise them of Contractor's safety procedures and programs so that they may comply with such procedures and programs as applicable.

14.02 *Tests, Inspections, and Approvals*

- A. Contractor shall give Engineer timely notice of readiness of the Work (or specific parts thereof) for all required inspections and tests, and shall cooperate with inspection and testing personnel to facilitate required inspections and tests.
- B. Owner shall retain and pay for the services of an independent inspector, testing laboratory, or other qualified individual or entity to perform all inspections and tests expressly required by the Contract Documents to be furnished and paid for by Owner, except that costs incurred in connection with tests or inspections of covered Work will be governed by the provisions of Paragraph 14.05.
- C. If Laws or Regulations of any public body having jurisdiction require any Work (or part thereof) specifically to be inspected, tested, or approved by an employee or other representative of such public body, Contractor shall assume full responsibility for arranging and obtaining such inspections, tests, or approvals, pay all costs in connection therewith, and furnish Engineer the required certificates of inspection or approval.
- D. Contractor shall be responsible for arranging, obtaining, and paying for all inspections and tests required:
 1. by the Contract Documents, unless the Contract Documents expressly allocate responsibility for a specific inspection or test to Owner;

2. to attain Owner's and Engineer's acceptance of materials or equipment to be incorporated in the Work;
3. by manufacturers of equipment furnished under the Contract Documents;
4. for testing, adjusting, and balancing of mechanical, electrical, and other equipment to be incorporated into the Work; and
5. for acceptance of materials, mix designs, or equipment submitted for approval prior to Contractor's purchase thereof for incorporation in the Work.

Such inspections and tests will be performed by independent inspectors, testing laboratories, or other qualified individuals or entities acceptable to Owner and Engineer.

- E. If the Contract Documents require the Work (or part thereof) to be approved by Owner, Engineer, or another designated individual or entity, then Contractor shall assume full responsibility for arranging and obtaining such approvals.
- F. If any Work (or the work of others) that is to be inspected, tested, or approved is covered by Contractor without written concurrence of Engineer, Contractor shall, if requested by Engineer, uncover such Work for observation. Such uncovering will be at Contractor's expense unless Contractor had given Engineer timely notice of Contractor's intention to cover the same and Engineer had not acted with reasonable promptness in response to such notice.

14.03 *Defective Work*

- A. *Contractor's Obligation:* It is Contractor's obligation to assure that the Work is not defective.
- B. *Engineer's Authority:* Engineer has the authority to determine whether Work is defective, and to reject defective Work.
- C. *Notice of Defects:* Prompt written notice of all defective Work of which Owner or Engineer has actual knowledge will be given to Contractor.
- D. *Correction, or Removal and Replacement:* Promptly after receipt of written notice of defective Work, Contractor shall correct all such defective Work, whether or not fabricated, installed, or completed, or, if Engineer has rejected the defective Work, remove it from the Project and replace it with Work that is not defective.
- E. *Preservation of Warranties:* When correcting defective Work, Contractor shall take no action that would void or otherwise impair Owner's special warranty and guarantee, if any, on said Work.
- F. *Costs and Damages:* In addition to its correction, removal, and replacement obligations with respect to defective Work, Contractor shall pay all claims, costs, losses, and damages arising out of or relating to defective Work, including but not limited to the cost of the inspection, testing, correction, removal, replacement, or reconstruction of such defective Work, fines levied against Owner by governmental authorities because the Work is defective, and the costs of repair or replacement of work of others resulting from defective Work. Prior to final payment, if Owner and Contractor are unable to agree as to the measure of such claims, costs, losses, and damages resulting from defective Work, then Owner may impose a reasonable set-off against payments due under Article 15.

14.04 *Acceptance of Defective Work*

- A. If, instead of requiring correction or removal and replacement of defective Work, Owner prefers to accept it, Owner may do so (subject, if such acceptance occurs prior to final payment, to Engineer's confirmation that such acceptance is in general accord with the design intent and applicable engineering principles, and will not endanger public safety). Contractor shall pay all claims, costs, losses, and damages attributable to Owner's evaluation of and determination to accept such defective Work (such costs to be approved by Engineer as to reasonableness), and for the diminished value of the Work to the extent not otherwise paid by Contractor. If any such acceptance occurs prior to final payment, the necessary revisions in the Contract Documents with respect to the Work will be incorporated in a Change Order. If the parties are unable to agree as to the decrease in the Contract Price, reflecting the diminished value of Work so accepted, then Owner may impose a reasonable set-off against payments due under Article 15. If the acceptance of defective Work occurs after final payment, Contractor shall pay an appropriate amount to Owner.

14.05 *Uncovering Work*

- A. Engineer has the authority to require additional inspection or testing of the Work, whether or not the Work is fabricated, installed, or completed.
- B. If any Work is covered contrary to the written request of Engineer, then Contractor shall, if requested by Engineer, uncover such Work for Engineer's observation, and then replace the covering, all at Contractor's expense.
- C. If Engineer considers it necessary or advisable that covered Work be observed by Engineer or inspected or tested by others, then Contractor, at Engineer's request, shall uncover, expose, or otherwise make available for observation, inspection, or testing as Engineer may require, that portion of the Work in question, and provide all necessary labor, material, and equipment.
 - 1. If it is found that the uncovered Work is defective, Contractor shall be responsible for all claims, costs, losses, and damages arising out of or relating to such uncovering, exposure, observation, inspection, and testing, and of satisfactory replacement or reconstruction (including but not limited to all costs of repair or replacement of work of others); and pending Contractor's full discharge of this responsibility the Owner shall be entitled to impose a reasonable set-off against payments due under Article 15.
 - 2. If the uncovered Work is not found to be defective, Contractor shall be allowed an increase in the Contract Price or an extension of the Contract Times, directly attributable to such uncovering, exposure, observation, inspection, testing, replacement, and reconstruction. If the parties are unable to agree as to the amount or extent thereof, then Contractor may submit a Change Proposal within 30 days of the determination that the Work is not defective.

14.06 *Owner May Stop the Work*

- A. If the Work is defective, or Contractor fails to supply sufficient skilled workers or suitable materials or equipment, or fails to perform the Work in such a way that the completed Work will conform to the Contract Documents, then Owner may order Contractor to stop the Work, or any portion thereof, until the cause for such order has been eliminated; however, this right of Owner to stop the Work will not give rise to any duty on the part of Owner to exercise this

right for the benefit of Contractor, any Subcontractor, any Supplier, any other individual or entity, or any surety for, or employee or agent of any of them.

14.07 Owner May Correct Defective Work

- A. If Contractor fails within a reasonable time after written notice from Engineer to correct defective Work, or to remove and replace defective Work as required by Engineer, then Owner may, after 7 days' written notice to Contractor, correct or remedy any such deficiency.
- B. In exercising the rights and remedies under this Paragraph 14.07, Owner shall proceed expeditiously. In connection with such corrective or remedial action, Owner may exclude Contractor from all or part of the Site, take possession of all or part of the Work and suspend Contractor's services related thereto, and incorporate in the Work all materials and equipment stored at the Site or for which Owner has paid Contractor but which are stored elsewhere. Contractor shall allow Owner, Owner's representatives, agents and employees, Owner's other contractors, and Engineer and Engineer's consultants access to the Site to enable Owner to exercise the rights and remedies under this paragraph.
- C. All claims, costs, losses, and damages incurred or sustained by Owner in exercising the rights and remedies under this Paragraph 14.07 will be charged against Contractor as set-offs against payments due under Article 15. Such claims, costs, losses and damages will include but not be limited to all costs of repair, or replacement of work of others destroyed or damaged by correction, removal, or replacement of Contractor's defective Work.
- D. Contractor shall not be allowed an extension of the Contract Times because of any delay in the performance of the Work attributable to the exercise by Owner of Owner's rights and remedies under this Paragraph 14.07.

ARTICLE 15—PAYMENTS TO CONTRACTOR; SET-OFFS; COMPLETION; CORRECTION PERIOD

15.01 Progress Payments

- A. *Basis for Progress Payments:* The Schedule of Values established as provided in Article 2 will serve as the basis for progress payments and will be incorporated into a form of Application for Payment acceptable to Engineer. Progress payments for Unit Price Work will be based on the number of units completed during the pay period, as determined under the provisions of Paragraph 13.03. Progress payments for cost-based Work will be based on Cost of the Work completed by Contractor during the pay period.
- B. *Applications for Payments*
 - 1. At least 20 days before the date established in the Agreement for each progress payment (but not more often than once a month), Contractor shall submit to Engineer for review an Application for Payment filled out and signed by Contractor covering the Work completed as of the date of the Application and accompanied by such supporting documentation as is required by the Contract Documents.
 - 2. If payment is requested on the basis of materials and equipment not incorporated in the Work but delivered and suitably stored at the Site or at another location agreed to in writing, the Application for Payment must also be accompanied by: (a) a bill of sale, invoice, copies of subcontract or purchase order payments, or other documentation establishing full payment by Contractor for the materials and equipment; (b) at Owner's

request, documentation warranting that Owner has received the materials and equipment free and clear of all Liens; and (c) evidence that the materials and equipment are covered by appropriate property insurance, a warehouse bond, or other arrangements to protect Owner's interest therein, all of which must be satisfactory to Owner.

3. Beginning with the second Application for Payment, each Application must include an affidavit of Contractor stating that all previous progress payments received by Contractor have been applied to discharge Contractor's legitimate obligations associated with prior Applications for Payment.
4. The amount of retainage with respect to progress payments will be as stipulated in the Agreement.

C. Review of Applications

1. Engineer will, within 10 days after receipt of each Application for Payment, including each resubmittal, either indicate in writing a recommendation of payment and present the Application to Owner, or return the Application to Contractor indicating in writing Engineer's reasons for refusing to recommend payment. In the latter case, Contractor may make the necessary corrections and resubmit the Application.
2. Engineer's recommendation of any payment requested in an Application for Payment will constitute a representation by Engineer to Owner, based on Engineer's observations of the executed Work as an experienced and qualified design professional, and on Engineer's review of the Application for Payment and the accompanying data and schedules, that to the best of Engineer's knowledge, information and belief:
 - a. the Work has progressed to the point indicated;
 - b. the quality of the Work is generally in accordance with the Contract Documents (subject to an evaluation of the Work as a functioning whole prior to or upon Substantial Completion, the results of any subsequent tests called for in the Contract Documents, a final determination of quantities and classifications for Unit Price Work under Paragraph 13.03, and any other qualifications stated in the recommendation); and
 - c. the conditions precedent to Contractor's being entitled to such payment appear to have been fulfilled in so far as it is Engineer's responsibility to observe the Work.
3. By recommending any such payment Engineer will not thereby be deemed to have represented that:
 - a. inspections made to check the quality or the quantity of the Work as it has been performed have been exhaustive, extended to every aspect of the Work in progress, or involved detailed inspections of the Work beyond the responsibilities specifically assigned to Engineer in the Contract; or
 - b. there may not be other matters or issues between the parties that might entitle Contractor to be paid additionally by Owner or entitle Owner to withhold payment to Contractor.

4. Neither Engineer's review of Contractor's Work for the purposes of recommending payments nor Engineer's recommendation of any payment, including final payment, will impose responsibility on Engineer:
 - a. to supervise, direct, or control the Work;
 - b. for the means, methods, techniques, sequences, or procedures of construction, or the safety precautions and programs incident thereto;
 - c. for Contractor's failure to comply with Laws and Regulations applicable to Contractor's performance of the Work;
 - d. to make any examination to ascertain how or for what purposes Contractor has used the money paid by Owner; or
 - e. to determine that title to any of the Work, materials, or equipment has passed to Owner free and clear of any Liens.
 5. Engineer may refuse to recommend the whole or any part of any payment if, in Engineer's opinion, it would be incorrect to make the representations to Owner stated in Paragraph 15.01.C.2.
 6. Engineer will recommend reductions in payment (set-offs) necessary in Engineer's opinion to protect Owner from loss because:
 - a. the Work is defective, requiring correction or replacement;
 - b. the Contract Price has been reduced by Change Orders;
 - c. Owner has been required to correct defective Work in accordance with Paragraph 14.07, or has accepted defective Work pursuant to Paragraph 14.04;
 - d. Owner has been required to remove or remediate a Hazardous Environmental Condition for which Contractor is responsible; or
 - e. Engineer has actual knowledge of the occurrence of any of the events that would constitute a default by Contractor and therefore justify termination for cause under the Contract Documents.
- D. *Payment Becomes Due*
1. Ten days after presentation of the Application for Payment to Owner with Engineer's recommendation, the amount recommended (subject to any Owner set-offs) will become due, and when due will be paid by Owner to Contractor.
- E. *Reductions in Payment by Owner*
1. In addition to any reductions in payment (set-offs) recommended by Engineer, Owner is entitled to impose a set-off against payment based on any of the following:
 - a. Claims have been made against Owner based on Contractor's conduct in the performance or furnishing of the Work, or Owner has incurred costs, losses, or damages resulting from Contractor's conduct in the performance or furnishing of the Work, including but not limited to claims, costs, losses, or damages from workplace injuries, adjacent property damage, non-compliance with Laws and Regulations, and patent infringement;

- b. Contractor has failed to take reasonable and customary measures to avoid damage, delay, disruption, and interference with other work at or adjacent to the Site;
 - c. Contractor has failed to provide and maintain required bonds or insurance;
 - d. Owner has been required to remove or remediate a Hazardous Environmental Condition for which Contractor is responsible;
 - e. Owner has incurred extra charges or engineering costs related to submittal reviews, evaluations of proposed substitutes, tests and inspections, or return visits to manufacturing or assembly facilities;
 - f. The Work is defective, requiring correction or replacement;
 - g. Owner has been required to correct defective Work in accordance with Paragraph 14.07, or has accepted defective Work pursuant to Paragraph 14.04;
 - h. The Contract Price has been reduced by Change Orders;
 - i. An event has occurred that would constitute a default by Contractor and therefore justify a termination for cause;
 - j. Liquidated or other damages have accrued as a result of Contractor's failure to achieve Milestones, Substantial Completion, or final completion of the Work;
 - k. Liens have been filed in connection with the Work, except where Contractor has delivered a specific bond satisfactory to Owner to secure the satisfaction and discharge of such Liens; or
 - l. Other items entitle Owner to a set-off against the amount recommended.
2. If Owner imposes any set-off against payment, whether based on its own knowledge or on the written recommendations of Engineer, Owner will give Contractor immediate written notice (with a copy to Engineer) stating the reasons for such action and the specific amount of the reduction, and promptly pay Contractor any amount remaining after deduction of the amount so withheld. Owner shall promptly pay Contractor the amount so withheld, or any adjustment thereto agreed to by Owner and Contractor, if Contractor remedies the reasons for such action. The reduction imposed will be binding on Contractor unless it duly submits a Change Proposal contesting the reduction.
3. Upon a subsequent determination that Owner's refusal of payment was not justified, the amount wrongfully withheld will be treated as an amount due as determined by Paragraph 15.01.D.1 and subject to interest as provided in the Agreement.

15.02 Contractor's Warranty of Title

- A. Contractor warrants and guarantees that title to all Work, materials, and equipment furnished under the Contract will pass to Owner free and clear of (1) all Liens and other title defects, and (2) all patent, licensing, copyright, or royalty obligations, no later than 7 days after the time of payment by Owner.

15.03 Substantial Completion

- A. When Contractor considers the entire Work ready for its intended use Contractor shall notify Owner and Engineer in writing that the entire Work is substantially complete and request that Engineer issue a certificate of Substantial Completion. Contractor shall at the same time

- submit to Owner and Engineer an initial draft of punch list items to be completed or corrected before final payment.
- B. Promptly after Contractor's notification, Owner, Contractor, and Engineer shall make an inspection of the Work to determine the status of completion. If Engineer does not consider the Work substantially complete, Engineer will notify Contractor in writing giving the reasons therefor.
 - C. If Engineer considers the Work substantially complete, Engineer will deliver to Owner a preliminary certificate of Substantial Completion which will fix the date of Substantial Completion. Engineer shall attach to the certificate a punch list of items to be completed or corrected before final payment. Owner shall have 7 days after receipt of the preliminary certificate during which to make written objection to Engineer as to any provisions of the certificate or attached punch list. If, after considering the objections to the provisions of the preliminary certificate, Engineer concludes that the Work is not substantially complete, Engineer will, within 14 days after submission of the preliminary certificate to Owner, notify Contractor in writing that the Work is not substantially complete, stating the reasons therefor. If Owner does not object to the provisions of the certificate, or if despite consideration of Owner's objections Engineer concludes that the Work is substantially complete, then Engineer will, within said 14 days, execute and deliver to Owner and Contractor a final certificate of Substantial Completion (with a revised punch list of items to be completed or corrected) reflecting such changes from the preliminary certificate as Engineer believes justified after consideration of any objections from Owner.
 - D. At the time of receipt of the preliminary certificate of Substantial Completion, Owner and Contractor will confer regarding Owner's use or occupancy of the Work following Substantial Completion, review the builder's risk insurance policy with respect to the end of the builder's risk coverage, and confirm the transition to coverage of the Work under a permanent property insurance policy held by Owner. Unless Owner and Contractor agree otherwise in writing, Owner shall bear responsibility for security, operation, protection of the Work, property insurance, maintenance, heat, and utilities upon Owner's use or occupancy of the Work.
 - E. After Substantial Completion the Contractor shall promptly begin work on the punch list of items to be completed or corrected prior to final payment. In appropriate cases Contractor may submit monthly Applications for Payment for completed punch list items, following the progress payment procedures set forth above.
 - F. Owner shall have the right to exclude Contractor from the Site after the date of Substantial Completion subject to allowing Contractor reasonable access to remove its property and complete or correct items on the punch list.

15.04 *Partial Use or Occupancy*

- A. Prior to Substantial Completion of all the Work, Owner may use or occupy any substantially completed part of the Work which has specifically been identified in the Contract Documents, or which Owner, Engineer, and Contractor agree constitutes a separately functioning and usable part of the Work that can be used by Owner for its intended purpose without

significant interference with Contractor's performance of the remainder of the Work, subject to the following conditions:

1. At any time, Owner may request in writing that Contractor permit Owner to use or occupy any such part of the Work that Owner believes to be substantially complete. If and when Contractor agrees that such part of the Work is substantially complete, Contractor, Owner, and Engineer will follow the procedures of Paragraph 15.03.A through 15.03.E for that part of the Work.
2. At any time, Contractor may notify Owner and Engineer in writing that Contractor considers any such part of the Work substantially complete and request Engineer to issue a certificate of Substantial Completion for that part of the Work.
3. Within a reasonable time after either such request, Owner, Contractor, and Engineer shall make an inspection of that part of the Work to determine its status of completion. If Engineer does not consider that part of the Work to be substantially complete, Engineer will notify Owner and Contractor in writing giving the reasons therefor. If Engineer considers that part of the Work to be substantially complete, the provisions of Paragraph 15.03 will apply with respect to certification of Substantial Completion of that part of the Work and the division of responsibility in respect thereof and access thereto.
4. No use or occupancy or separate operation of part of the Work may occur prior to compliance with the requirements of Paragraph 6.04 regarding builder's risk or other property insurance.

15.05 Final Inspection

- A. Upon written notice from Contractor that the entire Work or an agreed portion thereof is complete, Engineer will promptly make a final inspection with Owner and Contractor and will notify Contractor in writing of all particulars in which this inspection reveals that the Work, or agreed portion thereof, is incomplete or defective. Contractor shall immediately take such measures as are necessary to complete such Work or remedy such deficiencies.

15.06 Final Payment

A. Application for Payment

1. After Contractor has, in the opinion of Engineer, satisfactorily completed all corrections identified during the final inspection and has delivered, in accordance with the Contract Documents, all maintenance and operating instructions, schedules, guarantees, bonds, certificates or other evidence of insurance, certificates of inspection, annotated record documents (as provided in Paragraph 7.12), and other documents, Contractor may make application for final payment.
2. The final Application for Payment must be accompanied (except as previously delivered) by:
 - a. all documentation called for in the Contract Documents;
 - b. consent of the surety, if any, to final payment;
 - c. satisfactory evidence that all title issues have been resolved such that title to all Work, materials, and equipment has passed to Owner free and clear of any Liens or other title defects, or will so pass upon final payment.

- d. a list of all duly pending Change Proposals and Claims; and
 - e. complete and legally effective releases or waivers (satisfactory to Owner) of all Lien rights arising out of the Work, and of Liens filed in connection with the Work.
- 3. In lieu of the releases or waivers of Liens specified in Paragraph 15.06.A.2 and as approved by Owner, Contractor may furnish receipts or releases in full and an affidavit of Contractor that: (a) the releases and receipts include all labor, services, material, and equipment for which a Lien could be filed; and (b) all payrolls, material and equipment bills, and other indebtedness connected with the Work for which Owner might in any way be responsible, or which might in any way result in liens or other burdens on Owner's property, have been paid or otherwise satisfied. If any Subcontractor or Supplier fails to furnish such a release or receipt in full, Contractor may furnish a bond or other collateral satisfactory to Owner to indemnify Owner against any Lien, or Owner at its option may issue joint checks payable to Contractor and specified Subcontractors and Suppliers.
- B. *Engineer's Review of Final Application and Recommendation of Payment:* If, on the basis of Engineer's observation of the Work during construction and final inspection, and Engineer's review of the final Application for Payment and accompanying documentation as required by the Contract Documents, Engineer is satisfied that the Work has been completed and Contractor's other obligations under the Contract have been fulfilled, Engineer will, within 10 days after receipt of the final Application for Payment, indicate in writing Engineer's recommendation of final payment and present the final Application for Payment to Owner for payment. Such recommendation will account for any set-offs against payment that are necessary in Engineer's opinion to protect Owner from loss for the reasons stated above with respect to progress payments. Otherwise, Engineer will return the Application for Payment to Contractor, indicating in writing the reasons for refusing to recommend final payment, in which case Contractor shall make the necessary corrections and resubmit the Application for Payment.
- C. *Notice of Acceptability:* In support of its recommendation of payment of the final Application for Payment, Engineer will also give written notice to Owner and Contractor that the Work is acceptable, subject to stated limitations in the notice and to the provisions of Paragraph 15.07.
- D. *Completion of Work:* The Work is complete (subject to surviving obligations) when it is ready for final payment as established by the Engineer's written recommendation of final payment and issuance of notice of the acceptability of the Work.
- E. *Final Payment Becomes Due:* Upon receipt from Engineer of the final Application for Payment and accompanying documentation, Owner shall set off against the amount recommended by Engineer for final payment any further sum to which Owner is entitled, including but not limited to set-offs for liquidated damages and set-offs allowed under the provisions of this Contract with respect to progress payments. Owner shall pay the resulting balance due to Contractor within 30 days of Owner's receipt of the final Application for Payment from Engineer.

15.07 *Waiver of Claims*

- A. By making final payment, Owner waives its claim or right to liquidated damages or other damages for late completion by Contractor, except as set forth in an outstanding Claim,

appeal under the provisions of Article 17, set-off, or express reservation of rights by Owner. Owner reserves all other claims or rights after final payment.

- B. The acceptance of final payment by Contractor will constitute a waiver by Contractor of all claims and rights against Owner other than those pending matters that have been duly submitted as a Claim, or appealed under the provisions of Article 17.

15.08 *Correction Period*

- A. If within one year after the date of Substantial Completion (or such longer period of time as may be prescribed by the Supplementary Conditions or the terms of any applicable special guarantee required by the Contract Documents), Owner gives Contractor written notice that any Work has been found to be defective, or that Contractor's repair of any damages to the Site or adjacent areas has been found to be defective, then after receipt of such notice of defect Contractor shall promptly, without cost to Owner and in accordance with Owner's written instructions:
 - 1. correct the defective repairs to the Site or such adjacent areas;
 - 2. correct such defective Work;
 - 3. remove the defective Work from the Project and replace it with Work that is not defective, if the defective Work has been rejected by Owner, and
 - 4. satisfactorily correct or repair or remove and replace any damage to other Work, to the work of others, or to other land or areas resulting from the corrective measures.
- B. Owner shall give any such notice of defect within 60 days of the discovery that such Work or repairs is defective. If such notice is given within such 60 days but after the end of the correction period, the notice will be deemed a notice of defective Work under Paragraph 7.17.B.
- C. If, after receipt of a notice of defect within 60 days and within the correction period, Contractor does not promptly comply with the terms of Owner's written instructions, or in an emergency where delay would cause serious risk of loss or damage, Owner may have the defective Work corrected or repaired or may have the rejected Work removed and replaced. Contractor shall pay all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such correction or repair or such removal and replacement (including but not limited to all costs of repair or replacement of work of others). Contractor's failure to pay such costs, losses, and damages within 10 days of invoice from Owner will be deemed the start of an event giving rise to a Claim under Paragraph 12.01.B, such that any related Claim must be brought within 30 days of the failure to pay.
- D. In special circumstances where a particular item of equipment is placed in continuous service before Substantial Completion of all the Work, the correction period for that item may start to run from an earlier date if so provided in the Specifications.
- E. Where defective Work (and damage to other Work resulting therefrom) has been corrected or removed and replaced under this paragraph, the correction period hereunder with respect to such Work will be extended for an additional period of one year after such correction or removal and replacement has been satisfactorily completed.

- F. Contractor's obligations under this paragraph are in addition to all other obligations and warranties. The provisions of this paragraph are not to be construed as a substitute for, or a waiver of, the provisions of any applicable statute of limitation or repose.

ARTICLE 16—SUSPENSION OF WORK AND TERMINATION

16.01 *Owner May Suspend Work*

- A. At any time and without cause, Owner may suspend the Work or any portion thereof for a period of not more than 90 consecutive days by written notice to Contractor and Engineer. Such notice will fix the date on which Work will be resumed. Contractor shall resume the Work on the date so fixed. Contractor shall be entitled to an adjustment in the Contract Price or an extension of the Contract Times directly attributable to any such suspension. Any Change Proposal seeking such adjustments must be submitted no later than 30 days after the date fixed for resumption of Work.

16.02 *Owner May Terminate for Cause*

- A. The occurrence of any one or more of the following events will constitute a default by Contractor and justify termination for cause:
1. Contractor's persistent failure to perform the Work in accordance with the Contract Documents (including, but not limited to, failure to supply sufficient skilled workers or suitable materials or equipment, or failure to adhere to the Progress Schedule);
 2. Failure of Contractor to perform or otherwise to comply with a material term of the Contract Documents;
 3. Contractor's disregard of Laws or Regulations of any public body having jurisdiction; or
 4. Contractor's repeated disregard of the authority of Owner or Engineer.
- B. If one or more of the events identified in Paragraph 16.02.A occurs, then after giving Contractor (and any surety) 10 days' written notice that Owner is considering a declaration that Contractor is in default and termination of the Contract, Owner may proceed to:
1. declare Contractor to be in default, and give Contractor (and any surety) written notice that the Contract is terminated; and
 2. enforce the rights available to Owner under any applicable performance bond.
- C. Subject to the terms and operation of any applicable performance bond, if Owner has terminated the Contract for cause, Owner may exclude Contractor from the Site, take possession of the Work, incorporate in the Work all materials and equipment stored at the Site or for which Owner has paid Contractor but which are stored elsewhere, and complete the Work as Owner may deem expedient.
- D. Owner may not proceed with termination of the Contract under Paragraph 16.02.B if Contractor within 7 days of receipt of notice of intent to terminate begins to correct its failure to perform and proceeds diligently to cure such failure.
- E. If Owner proceeds as provided in Paragraph 16.02.B, Contractor shall not be entitled to receive any further payment until the Work is completed. If the unpaid balance of the Contract Price exceeds the cost to complete the Work, including all related claims, costs,

- losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals) sustained by Owner, such excess will be paid to Contractor. If the cost to complete the Work including such related claims, costs, losses, and damages exceeds such unpaid balance, Contractor shall pay the difference to Owner. Such claims, costs, losses, and damages incurred by Owner will be reviewed by Engineer as to their reasonableness and, when so approved by Engineer, incorporated in a Change Order. When exercising any rights or remedies under this paragraph, Owner shall not be required to obtain the lowest price for the Work performed.
- F. Where Contractor's services have been so terminated by Owner, the termination will not affect any rights or remedies of Owner against Contractor then existing or which may thereafter accrue, or any rights or remedies of Owner against Contractor or any surety under any payment bond or performance bond. Any retention or payment of money due Contractor by Owner will not release Contractor from liability.
- G. If and to the extent that Contractor has provided a performance bond under the provisions of Paragraph 6.01.A, the provisions of that bond will govern over any inconsistent provisions of Paragraphs 16.02.B and 16.02.D.

16.03 *Owner May Terminate for Convenience*

- A. Upon 7 days' written notice to Contractor and Engineer, Owner may, without cause and without prejudice to any other right or remedy of Owner, terminate the Contract. In such case, Contractor shall be paid for (without duplication of any items):
1. completed and acceptable Work executed in accordance with the Contract Documents prior to the effective date of termination, including fair and reasonable sums for overhead and profit on such Work;
 2. expenses sustained prior to the effective date of termination in performing services and furnishing labor, materials, or equipment as required by the Contract Documents in connection with uncompleted Work, plus fair and reasonable sums for overhead and profit on such expenses; and
 3. other reasonable expenses directly attributable to termination, including costs incurred to prepare a termination for convenience cost proposal.
- B. Contractor shall not be paid for any loss of anticipated profits or revenue, post-termination overhead costs, or other economic loss arising out of or resulting from such termination.

16.04 *Contractor May Stop Work or Terminate*

- A. If, through no act or fault of Contractor, (1) the Work is suspended for more than 90 consecutive days by Owner or under an order of court or other public authority, or (2) Engineer fails to act on any Application for Payment within 30 days after it is submitted, or (3) Owner fails for 30 days to pay Contractor any sum finally determined to be due, then Contractor may, upon 7 days' written notice to Owner and Engineer, and provided Owner or Engineer do not remedy such suspension or failure within that time, terminate the contract and recover from Owner payment on the same terms as provided in Paragraph 16.03.
- B. In lieu of terminating the Contract and without prejudice to any other right or remedy, if Engineer has failed to act on an Application for Payment within 30 days after it is submitted, or Owner has failed for 30 days to pay Contractor any sum finally determined to be due,

Contractor may, 7 days after written notice to Owner and Engineer, stop the Work until payment is made of all such amounts due Contractor, including interest thereon. The provisions of this paragraph are not intended to preclude Contractor from submitting a Change Proposal for an adjustment in Contract Price or Contract Times or otherwise for expenses or damage directly attributable to Contractor's stopping the Work as permitted by this paragraph.

ARTICLE 17—FINAL RESOLUTION OF DISPUTES

17.01 *Methods and Procedures*

- A. *Disputes Subject to Final Resolution:* The following disputed matters are subject to final resolution under the provisions of this article:
1. A timely appeal of an approval in part and denial in part of a Claim, or of a denial in full, pursuant to Article 12; and
 2. Disputes between Owner and Contractor concerning the Work, or obligations under the Contract Documents, that arise after final payment has been made.
- B. *Final Resolution of Disputes:* For any dispute subject to resolution under this article, Owner or Contractor may:
1. elect in writing to invoke the dispute resolution process provided for in the Supplementary Conditions;
 2. agree with the other party to submit the dispute to another dispute resolution process; or
 3. if no dispute resolution process is provided for in the Supplementary Conditions or mutually agreed to, give written notice to the other party of the intent to submit the dispute to a court of competent jurisdiction.

ARTICLE 18—MISCELLANEOUS

18.01 *Giving Notice*

- A. Whenever any provision of the Contract requires the giving of written notice to Owner, Engineer, or Contractor, it will be deemed to have been validly given only if delivered:
1. in person, by a commercial courier service or otherwise, to the recipient's place of business;
 2. by registered or certified mail, postage prepaid, to the recipient's place of business; or
 3. by e-mail to the recipient, with the words "Formal Notice" or similar in the e-mail's subject line.

18.02 *Computation of Times*

- A. When any period of time is referred to in the Contract by days, it will be computed to exclude the first and include the last day of such period. If the last day of any such period falls on a Saturday or Sunday or on a day made a legal holiday by the law of the applicable jurisdiction, such day will be omitted from the computation.

18.03 *Cumulative Remedies*

- A. The duties and obligations imposed by these General Conditions and the rights and remedies available hereunder to the parties hereto are in addition to, and are not to be construed in any way as a limitation of, any rights and remedies available to any or all of them which are otherwise imposed or available by Laws or Regulations, by special warranty or guarantee, or by other provisions of the Contract. The provisions of this paragraph will be as effective as if repeated specifically in the Contract Documents in connection with each particular duty, obligation, right, and remedy to which they apply.

18.04 *Limitation of Damages*

- A. With respect to any and all Change Proposals, Claims, disputes subject to final resolution, and other matters at issue, neither Owner nor Engineer, nor any of their officers, directors, members, partners, employees, agents, consultants, or subcontractors, shall be liable to Contractor for any claims, costs, losses, or damages sustained by Contractor on or in connection with any other project or anticipated project.

18.05 *No Waiver*

- A. A party's non-enforcement of any provision will not constitute a waiver of that provision, nor will it affect the enforceability of that provision or of the remainder of this Contract.

18.06 *Survival of Obligations*

- A. All representations, indemnifications, warranties, and guarantees made in, required by, or given in accordance with the Contract, as well as all continuing obligations indicated in the Contract, will survive final payment, completion, and acceptance of the Work or termination of the Contract or of the services of Contractor.

18.07 *Controlling Law*

- A. This Contract is to be governed by the law of the state in which the Project is located.

18.08 *Assignment of Contract*

- A. Unless expressly agreed to elsewhere in the Contract, no assignment by a party to this Contract of any rights under or interests in the Contract will be binding on the other party without the written consent of the party sought to be bound; and, specifically but without limitation, money that may become due and money that is due may not be assigned without such consent (except to the extent that the effect of this restriction may be limited by law), and unless specifically stated to the contrary in any written consent to an assignment, no assignment will release or discharge the assignor from any duty or responsibility under the Contract.

18.09 *Successors and Assigns*

- A. Owner and Contractor each binds itself, its successors, assigns, and legal representatives to the other party hereto, its successors, assigns, and legal representatives in respect to all covenants, agreements, and obligations contained in the Contract Documents.

18.10 *Headings*

- A. Article and paragraph headings are inserted for convenience only and do not constitute parts of these General Conditions.

SUPPLEMENTARY CONDITIONS OF THE CONSTRUCTION CONTRACT

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SECTION C-800

SUPPLEMENTARY CONDITIONS OF THE CONSTRUCTION CONTRACT

These Supplementary Conditions amend or supplement EJCDC® C-700, Standard General Conditions of the Construction Contract (2018). The General Conditions remain in full force and effect except as amended.

The terms used in these Supplementary Conditions have the meanings stated in the General Conditions. Additional terms used in these Supplementary Conditions have the meanings stated below, which are applicable to both the singular and plural thereof.

The address system used in these Supplementary Conditions is the same as the address system used in the General Conditions, with the prefix "SC" added—for example, "Paragraph SC-4.05."

ARTICLE 1—DEFINITIONS AND TERMINOLOGY

1.01 *Defined Terms*

SC 1.01.10.a. Delete Paragraph 1.01.A.10.a. in its entirety and insert the following new paragraph in its place:

- (a) A demand or assertion by Owner directly to Contractor, duly submitted in compliance with the procedural requirements set forth herein, seeking an adjustment of Contract Price or Contract Times, or seeking other relief with respect to the terms of the Contract.

SC-1.01.A.50. Amend the first sentence of Paragraph 1.01.A.50. to read as follows:

Work Change Directive—A written directive to Contractor issued on or after the Effective Date of the Contract, signed by Owner, ordering an addition, deletion, or revision in the Work.

1.02 *Terminology*

SC-1.02.D.3. Delete Paragraph 1.02.D.3. in its entirety and insert the following new paragraph in its place:

- 3. has been damaged prior to final payment (unless responsibility for the protection thereof has been assumed by Owner at Substantial Completion in accordance with Paragraph 15.03 or 15.04).

ARTICLE 2—PRELIMINARY MATTERS**2.02** *Copies of Documents*

SC-2.02.A. Delete Paragraph 2.02.A. in its entirety and insert the following new paragraph in its place:

- A. Owner shall furnish to Contractor three printed copies of conformed Contract Documents incorporating and integrating all Addenda and any amendments negotiated prior to the Effective Date of the Contract (including one fully signed counterpart of the Agreement) plus, if requested by Contractor, two additional conformed sets of Drawings for a total of five copies of conformed Drawings, and one copy in electronic portable document format (PDF). Additional printed copies of the conformed Contract Documents will be furnished upon request at the cost of reproduction.

SC-2.02.B. Delete the last sentence of Paragraph 2.02.B. in its entirety.

2.03 *Before Starting Construction*

SC-2.03.A. Amend the first sentence of Paragraph 2.03.A. by replacing the following word:

Change the words “Effective Date” to “Issue Date of the Notice to Proceed”.

SC-2.03. Add the following new paragraph immediately after Paragraph 2.03.A.3.:

- B. Video Recording: The Contractor shall videotape the proposed working area of the entire construction project route prior to any construction activity. Particular attention shall be paid to pre-existing damage and shall be noted, such as broken headwalls or cracked foundations, which have sustained damage prior to the construction activity.
 - 1. Recording shall *be* performed in a professional manner, i.e. containing a narrative describing the location of the camera relative to street addresses, manhole stations, etc. and its direction as well as any findings concerning the surrounding area. Movement of the camera should be slow and steady especially when a zoom-mode is being used.
 - 2. The video files shall be indexed for easy review throughout the duration of the Work. The video files shall be provided on a digital video disk (DVD). Video files shall be in a MS Windows compatible format, such as “avi” or “mpeg”. The DVD shall be turned over to the Owner prior to starting construction and shall become property of the Owner. None of the videos shall be published without express permission of the Owner.

2.04 Preconstruction Conference; Designation of Authorized Representatives

SC-2.04.A. Amend the first sentence of Paragraph 2.04.A. to read as follows:

Before any Work at the Site is started, a conference attended by Owner, including Engineer, Contractor and others as appropriate will be held to establish a working understanding among the parties as to the Work, and to discuss the schedules referred to in Paragraph 2.03.A, procedures for handling Shop Drawings, Samples, and other Submittals, processing Applications for Payment, electronic or digital transmittals, and maintaining required records.

2.06 Electronic Transmittals

SC-2.06 Delete Paragraphs 2.06.A., 2.06.B. and 2.06.C. in their entirety and insert the following in their place:

- A. Except as otherwise stated elsewhere in the Contract, the Owner, including Engineer, and Contractor may send, and shall accept, Electronic Documents transmitted by Electronic Means.
- B. *Electronic Documents Protocol:* The parties shall conform to the following provisions in Paragraphs 2.06.B. and 2.06.C., together referred to as the Electronic Documents Protocol (“EDP” or “Protocol”) for exchange of electronic transmittals.

1. Basic Requirements

- a. To the fullest extent practical, the parties agree to and will transmit and accept Electronic Documents in an electronic or digital format using the procedures described in this Protocol. Use of the Electronic Documents and any information contained therein is subject to the requirements of this Protocol and other provisions of the Contract.
- b. The contents of the information in any Electronic Document will be the responsibility of the transmitting party.
- c. Electronic Documents as exchanged by this Protocol may be used in the same manner as the printed versions of the same documents that are exchanged using non-electronic format and methods, subject to the same governing requirements, limitations, and restrictions, set forth in the Contract Documents.

- d. Except as otherwise explicitly stated herein, the terms of this Protocol will be incorporated into any other agreement or subcontract between a party and any third party for any portion of the Work on the Project, or any Project-related services, where that third party is, either directly or indirectly, required to exchange Electronic Documents with a party or with Engineer. Nothing herein will modify the requirements of the Contract regarding communications between and among the parties and their subcontractors and consultants.
- e. When transmitting Electronic Documents, the transmitting party makes no representations as to long term compatibility, usability, or readability of the items resulting from the receiving party's use of software application packages, operating systems, or computer hardware differing from those established in this Protocol.
- f. Nothing herein negates any obligation 1) in the Contract to create, provide, or maintain an original printed record version of Drawings and Specifications, signed and sealed according to applicable Laws and Regulations; 2) to comply with any applicable Law or Regulation governing the signing and sealing of design documents or the signing and electronic transmission of any other documents; or 3) to comply with the notice requirements of Paragraph 18.01 of the General Conditions.

2. *System Infrastructure for Electronic Document Exchange*

- a. Each party will provide hardware, operating system(s) software, internet, e-mail, and large file transfer functions ("System Infrastructure") at its own cost and sufficient for complying with the EDP requirements. With the exception of minimum standards set forth in this EDP, and any explicit system requirements specified by attachment to this EDP, it is the obligation of each party to determine, for itself, its own System Infrastructure.
 - 1) The maximum size of an email attachment for exchange of Electronic Documents under this EDP is 25 MB. Attachments larger than that may be exchanged using large file transfer functions or physical media.
 - 2) Each Party assumes full and complete responsibility for any and all of its own costs, delays, deficiencies, and errors associated with converting, translating, updating, verifying, licensing, or otherwise enabling its System Infrastructure, including operating systems and software, for use with respect to this EDP.
- b. Each party is responsible for its own system operations, security, back-up, archiving, audits, printing resources, and other Information Technology ("IT") for

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maintaining operations of its System Infrastructure during the Project, including coordination with the party's individual(s) or entity responsible for managing its System Infrastructure and capable of addressing routine communications and other IT issues affecting the exchange of Electronic Documents.

- c. Each party will operate and maintain industry-standard, industry-accepted, ISO-standard, commercial-grade security software and systems that are intended to protect the other party from: software viruses and other malicious software like worms, trojans, adware; data breaches; loss of confidentiality; and other threats in the transmission to or storage of information from the other parties, including transmission of Electronic Documents by physical media such as CD/DVD/flash drive/hard drive. To the extent that a party maintains and operates such security software and systems, it shall not be liable to the other party for any breach of system security.
- d. In the case of disputes, conflicts, or modifications to the EDP required to address issues affecting System Infrastructure, the parties shall cooperatively resolve the issues; but, failing resolution, the Owner is authorized to make and require reasonable and necessary changes to the EDP to effectuate its original intent. If the changes cause additional cost or time to Contractor, not reasonably anticipated under the original EDP, Contractor may seek an adjustment in price or time under the appropriate process in the Contract.
- e. Each party is responsible for its own back-up and archive of documents sent and received during the term of the contract under this EDP, unless this EDP establishes a Project document archive, either as part of a mandatory Project website or other communications protocol, upon which the parties may rely for document archiving during the specified term of operation of such Project document archive. Further, each party remains solely responsible for its own post-Project back-up and archive of Project documents after the term of the Contract, or after termination of the Project document archive, if one is established, for as long as required by the Contract and as each party deems necessary for its own purposes.
- f. If a receiving party receives an obviously corrupted, damaged, or unreadable Electronic Document, the receiving party will advise the sending party of the incomplete transmission.
- g. The parties will bring any non-conforming Electronic Documents into compliance with the EDP. The parties will attempt to complete a successful transmission of the

Electronic Document or use an alternative delivery method to complete the communication.

C. Software Requirements for Electronic Document Exchange; Limitations

1. Each party will acquire the software and software licenses necessary to create and transmit Electronic Documents and to read and to use any Electronic Documents received from the other party (and if relevant from third parties), using the software formats required in this section of the EDP.
 - a. Prior to using any updated version of the software required in this section for sending Electronic Documents to the other party, the originating party will first notify and receive concurrence from the other party for use of the updated version or adjust its transmission to comply with this EDP.
2. The parties agree not to intentionally edit, reverse engineer, decrypt, remove security or encryption features, or convert to another format for modification purposes any Electronic Document or information contained therein that was transmitted in a

software data format, including Portable Document Format (PDF), intended by sender not to be modified, unless the receiving party obtains the permission of the sending party or is citing or quoting excerpts of the Electronic Document for Project purposes.

3. Software and data formats for exchange of Electronic Documents will conform to the requirements set forth in Exhibit A to this EDP, including software versions, if listed.

ARTICLE 3—CONTRACT DOCUMENTS: INTENT, REQUIREMENTS, REUSE

3.01 Intent

SC-3.01.G. Amend Paragraphs 3.01.G.1. and 3.01.G.2. by deleting the words “or Engineer”.

SC-3.01. Add the following new paragraphs immediately after Paragraph 3.01.G.:

- H. The Specifications and/or Drawings are intended to be explanatory to each other when made available. Should any discrepancy appear or any misunderstanding arise as to the importance of anything contained in either, the decision of the Engineer shall be final and binding on Contractor. Large scale details shall govern small scale Drawings. Figure dimensions on Drawings shall govern over scale dimensions and detailed Drawings shall govern over general Drawings. The Engineer may make any correction of errors or omissions in the Drawings or Specifications when such corrections are necessary for proper fulfillment of their intention as construed by the Engineer.

- I. All the work or materials shown on any Drawing and not mentioned in the Specifications or any work specified and not shown on the Drawings, shall be furnished, performed and completed by Contractor as if same were both mentioned in the Specifications and shown on the Drawings.
- J. Contractor shall not rely on any directions or instructions given to Contractor by any person, organization or entity, whether oral or written, regarding the Work to be performed hereunder, other than that provided by the Engineer, court or administrative agency or tribunal of competent authority, and no such direction or instructions shall be considered as an authorized change to the Work. The Owner shall not be required to make any payment or provide any other consideration to Contractor for any Work performed, actions taken, supplies and/or materials used by Contractor in reliance upon any such unauthorized change in Work.

3.02 Reference Standards

SC-3.02.A.2. Delete Paragraph 3.02.A.2. in its entirety and insert the following in its place:

- 2. No provision of any such standard specification, manual, reference standard, or code, and no instruction of a Supplier, will be effective to change the duties or responsibilities of Owner, including Engineer, or Contractor from those set forth in the part of the Contract Documents prepared by or for Engineer. No such provision or instruction shall be effective to assign to Owner, including Engineer, any duty or authority to supervise or direct the performance of the Work, or any duty or authority to undertake responsibility inconsistent with the provisions of the part of the Contract Documents prepared by or for Engineer.

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3.03 Reporting and Resolving Discrepancies

SC-3.03.A.3. Amend Paragraph 3.03.A.3. by deleting the words “or Engineer”.

3.04 Requirements of the Contract Documents

SC-3.04.A. Amend the first sentence of Paragraph 3.04.A. by deleting the words “and Owner”.

SC-3.04.B. Amend the second sentence of Paragraph 3.04.B. to read as follows:

Engineer’s written clarification, interpretation, or decision will be final and binding on Contractor, unless it appeals by submitting a Change Proposal.

SC-3.04.C. Delete Paragraph 3.04.C. in its entirety and insert the following new paragraph in its place:

C. *Reserved.*

3.05 Reuse of Documents

SC-3.05.A.1. Delete Paragraph 3.05.A.1. in its entirety and insert the following new paragraph in its place:

1. have or acquire any title to or ownership rights in any of the Drawings, Specifications, or other documents (or copies of any thereof) prepared by or bearing the seal of Engineer or its consultants, including electronic media editions, or reuse any such Drawings, Specifications, other documents, or copies thereof on extensions of the Project or any other project without written consent of Owner and specific written verification or adaptation by Engineer; or

ARTICLE 4—COMMENCEMENT AND PROGRESS OF THE WORK

4.01 Commencement of Contract Times; Notice to Proceed

SC-4.01. Delete Paragraph 4.01.A. in its entirety and insert the following new paragraph in its place:

- A. The Contract Times will commence to run on the day indicated in the Notice to Proceed. A Notice to Proceed may be given at any time within 30 days after the Effective Date of the Contract. In no event will the Contract Times commence to run later than the 60th day after the day of Bid opening or the 30th day after the Effective Date of the Contract, whichever date is earlier, unless a later commencement date is mutually agreed upon by Contractor and Owner.

4.03 Reference Points

SC-4.03. Add the following new paragraphs immediately after Paragraph 4.03.A.:

- B. All work under this Contract shall be constructed in accordance with the lines and grades shown on the Drawings or as directed by the Engineer. Elevation of existing ground and appurtenances are believed to be reasonably correct but are not guaranteed to be absolute and therefore are presented only as an approximation. Any error or apparent discrepancy in the data shown or omissions of data required for accurately accomplishing the stake out survey shall be referred immediately to the Engineer for interpretation or correction. Engineer may check all or any portion of the work, including lines, elevations and reference marks set by Contractor, and Contractor shall afford all necessary assistance to the Engineer in carrying out such checks. Contractor shall correct any errors disclosed by such check. Such checking by the Engineer shall not be considered as approval of Contractor's work and shall not relieve Contractor of the responsibility for the accuracy and completeness of Contractor's Work. Contractor shall furnish personnel to assist Engineer in checking lines and grades.
- C. It shall be the Contractor's responsibility to verify all reference points shown on the Contract Documents prior to beginning Work on the site. All survey work for construction control purposes shall be made by the Contractor at his expense. This verification shall be conducted by professionally qualified personnel in a manner which will verify the accuracy of the information shown in the Contract Documents. On projects which involve the connections to or additions to existing structures, the elevations of these existing structures shall also be verified. Any findings which differ from those shown on the Contract Documents shall be submitted in writing to the Engineer for resolution.
- D. Contractor shall establish all baselines for the location of the principal component parts of the work together with a suitable number of bench marks and batter boards adjacent to the work. Contractor shall develop and make all detail surveys necessary for construction, including slope stakes, batter boards, stakes for all working points, lines and elevations.
- E. Contractor shall have the responsibility to carefully preserve the bench marks, reference points and stakes, and in the case of destruction thereof by the Contractor or resulting from his negligence, the Contractor shall be charged with the expense and damage resulting therefrom and shall be responsible for any mistakes that may be caused by the unnecessary loss or disturbance of such bench marks, reference points and stakes.
- F. The Contractor shall review the Contract Documents and the Site to determine the presence and location of any property or rights-of-way monuments or markers and to assess the possibility of disruption to these monuments or markers. It will be the Contractor's responsibility to flag, erect guard post or provide offset references for the protection or the re-monumentation of these property or rights-of-way monuments or markers.

- G. Existing or new control points, property markers and monuments that will be or are covered, disturbed or destroyed during the normal causes of construction shall be reestablished by the Contractor and all reference ties recorded therefore shall be furnished to the Engineer. The Contractor shall provide a Licensed Surveyor as Chief of Party, competently qualified men, all necessary instruments, stakes, and other material to perform the work. All computations necessary to establish the exact position of the work shall be made and preserved by the Contractor.
- H. Additional surveys necessary for the construction staking shall be performed by the Contractor, the cost of which shall be incorporated into the appropriate items of Work. On projects in which payment is classified by depth of cut, the construction staking shall be performed in a manner that will allow for the determination of cut classification.
- I. At completion of the work, the Contractor shall furnish Record Drawings indicating the final layout of all structures, roads, existing bench marks, etc. The Record Drawings shall indicate all critical elevations, such as elevations of piping, structures and finish grades.

4.04 Progress Schedule

SC-4.04. Add the following new paragraphs immediately after Paragraph 4.04.B.:

- C. If, in the opinion of the Owner, the Contractor falls behind in meeting the schedule presented in the current monthly Project Schedule Update, the Contractor shall provide such information as may be necessary to show on a revised Project Schedule the steps that will bring it into compliance with the Contract Time requirements or other milestones as identified by the Owner without additional cost to the Owner. Such information shall be submitted to the satisfaction of the Owner prior to the next Project Schedule Update. Compliance with such Submittal requirements shall be a condition precedent to any obligation of the Owner to consider any Application for Payment.

4.05 Delays in Contractor's Progress

SC-4.05.A. Delete Paragraph 4.05.A. in its entirety and insert the following new paragraph in its place:

- A. If Owner, including Engineer, or anyone for whom Owner is responsible, delays, disrupts, or interferes with the performance or progress of the Work, then Contractor shall be entitled to an equitable adjustment in Contract Price or Contract Times.

SC-4.05. Amend Paragraph 4.05.C. by adding the following subparagraphs:

5. *Weather-Related Delays*

- a. If “abnormal weather conditions” as set forth in Paragraph 4.05.C.2 of the General Conditions are the basis for a request for an equitable adjustment in the Contract Times, such request must be documented by data substantiating each of the following: 1) that weather conditions were abnormal for the period of time in which the delay occurred, 2) that such weather conditions could not have been reasonably anticipated, and 3) that such weather conditions had an adverse effect on the Work as scheduled.
- b. The existence of abnormal weather conditions with regard to precipitation will be determined on a month-by-month basis in accordance with the following:
 - 1) A workday will be considered a “bad weather day”, if total precipitation (as rain equivalent) occurring between 7:00 p.m. on the preceding day (regardless of whether such preceding day is a workday) through 7:00 p.m. on the workday in question equals or exceeds 0.1” of precipitation (as rain equivalent), based on the snow/rain conversion indicated in the table entitled Foreseeable Bad Weather Days; such table is hereby incorporated in this SC-4.05.C by reference.
 - 2) For daily rain amounts in excess of one inch, the Contractor may be awarded one day beyond the number of days calculated as described above. The added day shall be a recovery period for the Contractor to perform Site maintenance, to dewater the Site and to restore erosion control measures before resuming work. Written requests for recovery days shall include a description of work activities performed during the recovery day.

- 3) Contractor shall anticipate the number of foreseeable bad weather days per month indicated in the table in Exhibit B—Foreseeable Bad Weather Days.
- 4) In each month, every bad weather day exceeding the number of foreseeable bad weather days established in the table in Exhibit B—Foreseeable Bad Weather Days will be considered as “abnormal weather conditions.” The existence of abnormal weather conditions will not relieve Contractor of the obligation to demonstrate and document that delays caused by abnormal weather are specific to the planned work activities or that such activities thus delayed were on Contractor’s then-current Progress Schedule’s critical path for the Project.

ARTICLE 5—SITE, SUBSURFACE AND PHYSICAL CONDITIONS, HAZARDOUS ENVIRONMENTAL CONDITIONS

5.01 Availability of Lands

SC-5.01.A. Add the following new sentences immediately after the last sentence of Paragraph 5.01.A.:

The Owner shall obtain or cause to be obtained all permanent and temporary construction easements as shown on the Drawings. The Contractor shall verify that these agreements have been obtained and shall comply with the conditions set forth in each agreement.

SC-5.01.B. Delete Paragraph 5.01.B. in its entirety and insert the following new paragraph in its place:

B. Reserved.

SC-5.01.C. Delete Paragraph 5.01.C. in its entirety and insert the following new paragraph in its place:

- C. Contractor shall provide for all additional lands and access thereto that may be required for temporary construction facilities, construction equipment, or storage of materials and equipment to be incorporated in the Work unless otherwise indicated on the Drawings.

5.02 Use of Site and Other Areas

SC-5.02.A.2. Delete Paragraph 5.02.A.2. in its entirety and insert the following new paragraph in its place:

2. If a damage or injury claim is made by the owner or occupant of any such land or area because of the performance of the Work, or because of other actions or conduct of the Contractor or those for which Contractor is responsible, Contractor shall (a) take immediate corrective or remedial action as required by Paragraph 7.13, or otherwise; (b) promptly attempt to settle the claim as to all parties through negotiations with such

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owner or occupant, or otherwise resolve the claim by arbitration or other dispute resolution proceeding, or in a court of competent jurisdiction; and (c) to the fullest extent permitted by Laws and Regulations, indemnify and hold harmless Owner and its officers, directors, members, partners, employees, agents, consultants and subcontractors of each and any of them, from and against any such claim, and against all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to any claim or action, legal or equitable, brought by any such owner or occupant against Owner or any other party indemnified hereunder to the extent caused directly or indirectly, in whole or in part by, or based upon, Contractor's performance of the Work, or because of other actions or conduct of the Contractor or those for which Contractor is responsible.

SC-5.02. Add the following paragraph immediately following Paragraph 5.02.D.:

- E. *Temporary Access Reinstatement*: When the Work involves disturbance of existing features in or across streets, rights-of-way, easements, or private property, the Contractor shall (as the work progresses) promptly backfill, compact, grade, and otherwise restore the disturbed area to the basic condition which will permit resumption of pedestrian or vehicular traffic and any other critical activity or functions consistent with the original use of the land. The requirements for temporary paving of streets, walks, and driveways are specified elsewhere. Unsightly mounds of earth, large stones, boulders, and debris shall be removed so that the site presents a neat appearance.

5.03 *Subsurface and Physical Conditions*

SC-5.03.D. Amend the first part of the first sentence of Paragraph 5.03.D. to read as follows:

- D. *Limitations of Other Data and Documents*: Except for such reliance on Technical Data, Contractor may not rely upon or make any claim against Owner, or any of its officers, directors, members, partners, employees, agents, consultants, or subcontractors, with respect to:

5.04 Differing Subsurface or Physical Conditions

SC-5.04.A. Amend the last paragraph of Paragraph 5.04.A. to read as follows:

then Contractor shall, promptly after becoming aware thereof and before further disturbing the subsurface or physical conditions or performing any Work in connection therewith (except in an emergency as required by Paragraph 7.15), notify Engineer in writing about such condition. Contractor shall not further disturb such condition or perform any Work in connection therewith (except with respect to an emergency) until receipt of a written statement permitting Contractor to do so.

SC-5.04 Delete Paragraphs 5.04.B., 5.04.C. and 5.04.D. in their entirety and insert the following new paragraphs in their place:

- B. *Engineer's Review:* After receipt of written notice as required by the preceding paragraph, Engineer will promptly review the subsurface or physical condition in question, determine whether it is necessary for Owner to obtain additional exploration or tests with respect to the condition, conclude whether the condition falls within any one or more of the differing site condition categories in Paragraph 5.04.A., obtain any pertinent cost or schedule information from Contractor, and determine the need for any change in the Drawings or Specifications.
- C. *Engineer's Statement to Contractor Regarding Site Condition:* Engineer shall issue a written statement to Contractor with its findings, conclusions, and recommendations regarding the subsurface or physical condition in question, addressing the resumption of Work in connection with such condition, and indicating whether any change in the Drawings or Specifications will be made.
- D. *Early Resumption of Work:* If at any time Engineer determines that Work in connection with the subsurface or physical condition in question may resume prior to completion of Engineer's review and issuance of its statement to Contractor, because the condition in question has been adequately documented, and analyzed on a preliminary basis, then the Engineer may at its discretion instruct Contractor to resume such Work.

SC-5.04.E.4. Delete Paragraph 5.04.E.4. in its entirety and insert the following new paragraph in its place:

- 4. Contractor may submit a Change Proposal regarding its entitlement to or the amount or extent of any adjustment in the Contract Price or Contract Times, no later than 30 days after Engineer's issuance of the Engineer's written statement to Contractor regarding the subsurface or physical condition in question.

5.05 *Underground Facilities*

SC-5.05.B. Amend the last line of Paragraph 5.05.B. by deleting the words "Owner and".

SC-5.05.C Delete Paragraph 5.05.C. in its entirety and insert the following new paragraph in its place:

C. *Engineer's Review:* Engineer will:

1. promptly review the Underground Facility and conclude whether such Underground Facility was not shown or indicated on the Drawings, or was not shown or indicated with reasonable accuracy;
2. identify and communicate with the owner of the Underground Facility; if necessary, issue any preliminary instructions to Contractor regarding the Contractor's resumption of Work in connection with the Underground Facility in question; and
3. obtain any pertinent cost or schedule information from Contractor; determine the extent, if any, to which a change is required in the Drawings or Specifications to reflect and document the consequences of the existence or location of the Underground Facility.

During such time, Contractor shall be responsible for the safety and protection of such Underground Facility.

SC-5.05.D. Delete Paragraph 5.05.D. in its entirety and insert the following new paragraph in its place:

- D. *Engineer's Statement to Contractor Regarding Underground Facility:* Engineer shall issue a written statement to Contractor with its findings, conclusions, and recommendations regarding the Underground Facility in question, addressing the resumption of Work in connection with such Underground Facility, and indicating whether any change in the Drawings or Specifications will be made.

SC-5.05.E. Delete Paragraph 5.05.E. in its entirety and insert the following new paragraph in its place:

- E. *Early Resumption of Work:* If at any time Engineer determines that Work in connection with the Underground Facility may resume prior to completion of Engineer's review or issuance of its statement to Contractor, because the Underground Facility in question and conditions affected by its presence have been adequately documented, and analyzed on a preliminary basis, then the Engineer may at its discretion instruct Contractor to resume such Work.

SC-5.05.F.3. Delete Paragraph 5.04.F.3. in its entirety and insert the following new paragraph in its place:

3. Contractor may submit a Change Proposal regarding its entitlement to or the amount or extent of any adjustment in the Contract Price or Contract Times, no later than 30 days after Engineer's issuance of the Engineer's written statement to Contractor regarding the Underground Facility in question.

5.06 Hazardous Environmental Conditions

SC-5.06. Add the following new paragraphs immediately after Paragraph 5.06.A.3.:

4. The following table lists the reports known to Owner relating to Hazardous Environmental Conditions at or adjacent to the Site, and the Technical Data (if any) upon which Contractor may rely: **[If there are no such reports, so indicate in the table]**

Report Title	Date of Report	Technical Data
		[Identify Technical Data]

5. The following table lists the drawings known to Owner relating to Hazardous Environmental Conditions at or adjacent to the Site, and Technical Data (if any) contained in such Drawings upon which Contractor may rely: **[If there are no such drawings, so indicate in the table]**

Drawings Title	Date of Drawings	Technical Data
		[Identify Technical Data]

SC-5.06.B. Amend the third sentence of Paragraph 5.06.B. to read as follows:

Except for such reliance on Technical Data, Contractor may not rely upon or make any claim against Owner, or any of its officers, directors, members, partners, employees, agents, consultants, or subcontractors, with respect to:

SC-5.06.E. Delete Paragraph 5.06.E. in its entirety and insert the following new paragraph in its place:

- E. If Contractor encounters, uncovers, or reveals a Hazardous Environmental Condition whose removal or remediation is not expressly identified in the Contract Documents as being within

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the scope of the Work, or if Contractor or anyone for whom Contractor is responsible creates a Hazardous Environmental Condition, then Contractor shall immediately: (1) secure or otherwise isolate such condition; (2) stop all Work in connection with such condition and in any area affected thereby (except in an emergency as required by Paragraph 7.15); and (3) notify Engineer (and promptly thereafter confirm such notice in writing). Engineer will determine necessity for Owner to retain a qualified expert to evaluate such condition or take corrective action, if any. Owner shall take such actions as are necessary to permit Owner to timely obtain required permits and provide Contractor the written notice required by Paragraph 5.06.F. If Contractor or anyone for whom Contractor is responsible created the Hazardous Environmental Condition in question, then Owner may remove and remediate the Hazardous Environmental Condition, and impose a set-off against payments to account for the associated costs.

SC-5.06.I. Amend the first sentence of Paragraph 5.06.I. to read as follows:

To the fullest extent permitted by Laws and Regulations, Owner shall indemnify and hold harmless Contractor and Subcontractors, and the officers, directors, members, partners, employees, agents, consultants, and subcontractors of each and any of them, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals, and all court, arbitration, or other dispute resolution costs) arising out of or relating to a Hazardous Environmental Condition, provided that such Hazardous Environmental Condition (1) was not shown or indicated in the Drawings, Specifications, or other Contract Documents, identified as Technical Data entitled to limited reliance pursuant to Paragraph 5.06.B, or identified in the Contract Documents to be included within the scope of the Work, and (2) was not created by Contractor or by anyone for whom Contractor is responsible.

SC-5.06.J. Amend the first sentence of Paragraph 5.06.J. to read as follows:

To the fullest extent permitted by Laws and Regulations, Contractor shall indemnify and hold harmless Owner, and its officers, directors, members, partners, employees, agents, consultants, and subcontractors, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to the failure to control, contain, or remove a Constituent of Concern brought to the Site by Contractor or by anyone for whom Contractor is responsible, or to a Hazardous Environmental Condition created by Contractor or by anyone for whom Contractor is responsible.

ARTICLE 6—BONDS AND INSURANCE**6.01 Performance, Payment, and Other Bonds**

SC-6.01.A. Amend the first sentence of Paragraph 6.01.A. to read as follows:

If the Contract Price is equal to or greater than one hundred thousand dollars (\$100,000.00), Contractor shall furnish a performance and a payment bond, each in an amount equal to the Contract Price, as security for the faithful performance and payment of all of Contractor's obligations under the Contract.

SC-6.01.A. Add the following paragraphs immediately after Paragraph 6.01.A.:

1. *Required Performance Bond Form:* The performance bond that Contractor furnishes will be in the form of EJCDC® C-610, Performance Bond (2010, 2013, or 2018 edition).
2. *Required Payment Bond Form:* The payment bond that Contractor furnishes will be in the form of EJCDC® C-615, Payment Bond (2010, 2013, or 2018 edition).

SC-6.01.C. Amend the first sentence of Paragraph 6.01.C. to read as follows:

All bonds must be in the form included in the Bidding Documents or otherwise specified by Owner prior to execution of the Contract, except as provided otherwise by Laws or Regulations, must be issued and signed by a surety named in "Companies Holding Certificates of Authority as Acceptable Sureties on Federal Bonds and as Acceptable Reinsuring Companies" as published in Department Circular 570 (as amended and supplemented) by the Bureau of the Fiscal Service, U.S. Department of the Treasury, and may not be written for an amount exceeding the amount approved for the surety.

SC-6.01.D. Add the following language after the first sentence of Paragraph 6.01.D.:

If, at any time after the execution of the Agreement between the parties, the Owner shall deem the surety or sureties upon such bond(s) to be unsatisfactory, or if, for any reason, such bond ceases to be adequate to cover the performance of the work or the payment of Subcontractors and/or Subconsultants performing labor and/or work on the Project or furnishing materials in connection therewith, Contractor shall, at no additional expense to the Owner, within five days after receipt of notice from the Owner to do so, furnish an additional bond or bonds in such form and amount and with such surety or sureties as shall be satisfactory to the Owner. In such event, no further payment to Contractor shall be deemed to be due under this Contract until such new or additional security for the faithful

performance of the Work and/or payment of liens and claims has been furnished by Contractor to the Owner in manner and form satisfactory to the Owner.

SC-6.01.E. Delete Paragraph 6.01.E. in its entirety and insert the following new paragraph in its place:

E. If the surety on a bond furnished by Contractor is declared bankrupt or becomes insolvent, or the surety ceases to meet the requirements above, then Contractor shall promptly notify Owner in writing and shall, within 20 days after the event giving rise to such notification, provide another bond and surety, both of which must comply with the bond and surety requirements above.

6.02 Insurance—General Provisions

SC-6.02.D. Insert the following language immediately after the first sentence of Paragraph 6.02.D.:

Certificates of insurance shall be provided on the standard ACORD form with endorsements and shall reference the Project or Contract to which they apply in the description of operations section.

SC-6.02.G. Delete the second sentence of Paragraph 6.02.G. in its entirety and insert the following new sentence in its place:

Owner's liability policies, if any, operate separately and independently from policies required to be provided by Contractor, and Contractor cannot rely upon Owner's liability policies for any of Contractor's obligations to the Owner, including Engineer, or third parties.

SC-6.02.H.1. Amend Paragraph 6.02.H.1. by deleting the words "and Engineer".

6.03 Contractor's Insurance

SC-6.03.C.1. Amend Paragraph 6.03.C.1. by deleting the words "and Engineer".

SC-6.03. Supplement Paragraph 6.03. with the following provisions after Paragraph 6.03.C.:

D. *Other Additional Insureds:* As a supplement to the provisions of Paragraph 6.03.C. of the General Conditions, the commercial general liability, automobile liability, umbrella or excess, pollution liability, and unmanned aerial vehicle liability policies must include as additional insureds (in addition to Owner) the following:

[Additional insured – legal name]

[Additional insured – address]

- E. *Workers' Compensation and Employer's Liability:* Contractor shall purchase and maintain workers' compensation and employer's liability insurance, including, as applicable, United States Longshoreman and Harbor Workers' Compensation Act, Jones Act, stop-gap employer's liability coverage for monopolistic states, and foreign voluntary workers' compensation (from available sources, notwithstanding the jurisdictional requirement of Paragraph 6.02.B of the General Conditions).

Workers' Compensation and Related Policies	Policy limits of not less than:
Workers' Compensation	
State	Statutory
Applicable Federal (e.g., Longshoreman's)	Statutory
Foreign voluntary workers' compensation (employer's responsibility coverage), if applicable	Statutory
Employer's Liability	
Each accident	\$1,000,000.00
Each employee	\$1,000,000.00
Policy limit	\$1,000,000.00

- F. *Commercial General Liability—Claims Covered:* Contractor shall purchase and maintain commercial general liability insurance, covering all operations by or on behalf of Contractor, on an occurrence basis, against claims for:
1. damages because of bodily injury, sickness or disease, or death of any person other than Contractor's employees,
 2. damages insured by reasonably available personal injury liability coverage, and

3. damages because of injury to or destruction of tangible property wherever located, including loss of use resulting therefrom.
- G. *Commercial General Liability—Form and Content:* Contractor's commercial liability policy must be written on a 1996 (or later) Insurance Services Organization, Inc. (ISO) commercial general liability form (occurrence form) and include the following coverages and endorsements:
1. Products and completed operations coverage.
 - a. Such insurance must be maintained for three years after final payment.
 - b. Contractor shall furnish Owner and each other additional insured (as identified in the Supplementary Conditions or elsewhere in the Contract) evidence of continuation of such insurance at final payment and three years thereafter.
 2. Blanket contractual liability coverage, including but not limited to coverage of Contractor's contractual indemnity obligations in Paragraph 7.18.
 3. Severability of interests and no insured-versus-insured or cross-liability exclusions.
 4. Underground, explosion, and collapse coverage.
 5. Personal injury coverage.
 6. Additional insured endorsements that include both ongoing operations and products and completed operations coverage through ISO Endorsements CG 20 10 10 01 and CG 20 37 10 01 (together). If Contractor demonstrates to Owner that the specified ISO endorsements are not commercially available, then Contractor may satisfy this requirement by providing equivalent endorsements.
 7. For design professional additional insureds, ISO Endorsement CG 20 32 07 04 "Additional Insured—Engineers, Architects or Surveyors Not Engaged by the Named Insured" or its equivalent.
- H. *Commercial General Liability—Excluded Content:* The commercial general liability insurance policy, including its coverages, endorsements, and incorporated provisions, must not include any of the following:
1. Any modification of the standard definition of "insured contract" (except to delete the railroad protective liability exclusion if Contractor is required to indemnify a railroad or others with respect to Work within 50 feet of railroad property).

2. Any exclusion for water intrusion or water damage.
3. Any provisions resulting in the erosion of insurance limits by defense costs other than those already incorporated in ISO form CG 00 01.
4. Any exclusion of coverage relating to earth subsidence or movement.
5. Any exclusion for the insured's vicarious liability, strict liability, or statutory liability (other than worker's compensation).
6. Any limitation or exclusion based on the nature of Contractor's work.
7. Any professional liability exclusion broader in effect than the most recent edition of ISO form CG 22 79.

I. *Commercial General Liability—Minimum Policy Limits*

Commercial General Liability	Policy limits of not less than:
General Aggregate	\$2,000,000.00
Products—Completed Operations Aggregate	\$2,000,000.00
Personal and Advertising Injury	\$1,000,000.00
Bodily Injury and Property Damage—Each Occurrence	\$1,000,000.00

- J. *Automobile Liability:* Contractor shall purchase and maintain automobile liability insurance for damages because of bodily injury or death of any person or property damage arising out of the ownership, maintenance, or use of any motor vehicle. The automobile liability policy must be written on an occurrence basis.

Automobile Liability	Policy limits of not less than:
Bodily Injury	

Automobile Liability	Policy limits of not less than:
Each Person	\$1,000,000.00
Each Accident	\$1,000,000.00
Property Damage	
Each Accident	\$1,000,000.00
[or]	
Combined Single Limit	
Combined Single Limit (Bodily Injury and Property Damage)	\$1,000,000.00

- K. *Umbrella or Excess Liability:* Contractor shall purchase and maintain umbrella or excess liability insurance written over the underlying employer's liability, commercial general liability, and automobile liability insurance described in the Paragraphs above. The coverage afforded must be at least as broad as that of each and every one of the underlying policies.

Excess or Umbrella Liability	Policy limits of not less than:
Each Occurrence	\$5,000,000.00
General Aggregate	\$5,000,000.00

- L. *Using Umbrella or Excess Liability Insurance to Meet CGL and Other Policy Limit Requirements:* Contractor may meet the policy limits specified for employer's liability, commercial general liability, and automobile liability through the primary policies alone, or through combinations of the primary insurance policy's policy limits and partial attribution of the policy limits of an umbrella or excess liability policy that is at least as broad in coverage as that of the underlying policy, as specified herein. If such umbrella or excess liability policy was required under this Contract, at a specified minimum policy limit, such umbrella or

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excess policy must retain a minimum limit of **\$5,000,000.00** after accounting for partial attribution of its limits to underlying policies, as allowed above.

- M. *Contractor's Pollution Liability Insurance:* Contractor shall purchase and maintain a policy covering third-party injury and property damage, including cleanup costs, as a result of pollution conditions arising from Contractor's operations and completed operations. This insurance must be maintained for no less than three years after final completion.

Contractor's Pollution Liability	Policy limits of not less than:
Each Occurrence/Claim	\$5,000,000.00
General Aggregate	\$5,000,000.00

- N. *Contractor's Professional Liability Insurance:* If Contractor will provide or furnish professional services under this *Contract*, through a delegation of professional design services or otherwise, then Contractor shall be responsible for purchasing and maintaining applicable professional liability insurance. This insurance must cover negligent acts, errors, or omissions in the performance of professional design or related services by the insured or others for whom the insured is legally liable. The insurance must be maintained throughout the duration of the Contract and for a minimum of two years after Substantial Completion. The retroactive date on the policy must pre-date the commencement of furnishing services on the Project.

- O. *Unmanned Aerial Vehicle Liability Insurance*: If Contractor uses unmanned aerial vehicles (UAV—commonly *referred* to as drones) at the Site or in support of any aspect of the Work, Contractor shall obtain UAV liability insurance in the amounts stated; name Owner, Engineer, and all individuals and entities identified in the Supplementary Conditions as additional insureds; and provide a certificate to Owner confirming Contractor’s compliance with this requirement. Such insurance will provide coverage for property damage, bodily injury or death, and invasion of privacy.

Unmanned Aerial Vehicle Liability Insurance	Policy limits of not less than:
Each Claim	\$1,000,000.00
General Aggregate	\$1,000,000.00

6.04 Builder's Risk and Other Property Insurance

SC-6.04. Supplement Paragraph 6.04. of the General Conditions with the following provisions:

F. *Builder's Risk Requirements:* The builder's risk insurance must:

1. be written on a builder's risk "all risk" policy form that at a minimum includes insurance for physical loss or damage to the Work, temporary buildings, falsework, and materials and equipment stored and in transit, and must not exclude the coverage of the following risks: fire; windstorm; hail; flood; earthquake, volcanic activity, and other earth movement; lightning; riot; civil commotion; terrorism; vehicle impact; aircraft; smoke; theft; vandalism and malicious mischief; mechanical breakdown, boiler explosion, and artificially generated electric current; collapse; explosion; debris removal; demolition occasioned by enforcement of Laws and Regulations; and water damage (other than that caused by flood).
 - a. Such policy will include an exception that results in coverage for ensuing losses from physical damage or loss with respect to any defective workmanship, methods, design, or materials exclusions.
 - b. If insurance against mechanical breakdown, boiler explosion, and artificially generated electric current; earthquake, volcanic activity, and other earth movement; or flood, are not commercially available under builder's risk policies, by endorsement or otherwise, such insurance will be provided through other insurance policies acceptable to Owner and Contractor.
2. cover, as insured property, at least the following: (a) the Work and all materials, supplies, machinery, apparatus, equipment, fixtures, and other property of a similar nature that are to be incorporated into or used in the preparation, fabrication, construction, erection, or completion of the Work, including Owner-furnished or assigned property; (b) spare parts inventory required within the scope of the Contract; and (c) temporary works which are not intended to form part of the permanent constructed Work but which are intended to provide working access to the Site, or to the Work under construction, or which are intended to provide temporary support for

- the Work under construction, including scaffolding, form work, fences, shoring, falsework, and temporary structures.
3. cover expenses incurred in the repair or replacement of any insured property (including but not limited to fees and charges of contractors, engineers, and architects).
 4. extend to cover damage or loss to insured property while in temporary storage at the Site or in a storage location outside the Site (but not including property stored at the premises of a manufacturer or Supplier).
 5. extend to cover damage or loss to insured property while in transit.
 6. allow for the waiver of the insurer's subrogation rights, as set forth in this Contract.
 7. allow for partial occupancy or use by Owner by endorsement, and without cancellation or lapse of coverage.
 8. include performance/hot testing and start-up, if applicable.
 9. include a Builder's Risk Installation Floater, if the Work involves renovation, addition to, altering or remodeling existing Owner facilities with materials, supplies, machinery, fixtures, and equipment valued over \$10,000 to be installed. Coverage shall include any loss to property while in transit, any loss at the Site, and any loss while in storage, both on-site and off-site. The coverage shall also include Contractor's labor, materials and equipment to be used for completion of work performed under this Contract. The minimum amount of coverage to be carried shall be equal to the full amount of the Contractor's labor, equipment, materials, or fixtures to be installed, in-transit, or stored off-site during the performance of this Contract. This installation floater shall include a waiver of subrogation applicable to Owner, Contractor, Engineer, all Subcontractors, and the officers, directors, partners, employees, agents and other consultants and subcontractors of any of them.
 10. be maintained in effect until the Work is complete, as set forth in Paragraph 15.06.D of the General Conditions, or until written confirmation of Owner's procurement of property insurance following Substantial Completion, whichever occurs first.
 11. include as named insureds the Owner, Contractor, Subcontractors (of every tier), and any other individuals or entities required by this Contract to be insured under such builder's risk policy. For purposes of Paragraphs 6.04, 6.05, and 6.06 of the General Conditions, and this and all other corresponding Supplementary Conditions, the parties

required to be insured will be referred to collectively as “insureds.”

12. provide sinkhole coverage, which includes the sudden settlement or collapse of the earth supporting any insured property at the Site.

SC-6.04. Supplement Paragraph 6.04. of the General Conditions with the following provision:

- G. *Coverage for Completion Delays:* The builder’s risk policy will include, for the benefit of Owner, loss of revenue and soft cost coverage for losses arising from delays in completion that result from covered physical losses or damage. Such coverage will include, without limitation, fixed expenses and debt service for a minimum of 12 months with a maximum deductible of 30 days, compensation for loss of net revenues, rental costs, and attorneys’ fees and engineering or other consultants’ fees, if not otherwise covered.

SC-6.04. Supplement Paragraph 6.04 of the General Conditions with the following provisions:

- H. *Builder’s Risk and Other Property Insurance Deductibles:* The purchaser of any required builder’s risk, installation floater, or other property insurance will be responsible for costs not covered because of the application of a policy deductible.

1. The builder’s risk policy (or if applicable the installation floater) will be subject to a deductible amount of no more than \$10,000.00 for direct physical loss in any one occurrence.

ARTICLE 7—CONTRACTOR’S RESPONSIBILITIES

7.01 Contractor’s Means and Methods of Construction

SC-7.01.B. Delete the second sentence of Paragraph 7.01.B. in its entirety and insert the following new sentence in its place:

Such services are not Owner-delegated professional design services under this Contract, and Owner has no responsibility with respect to (1) Contractor’s determination of the need for such services, (2) the qualifications or licensing of the design professionals retained or employed by Contractor, (3) the performance of such services, or (4) any errors, omissions, or defects in such services.

7.02 Supervision and Superintendence

SC-7.02.B. Delete Paragraph 7.02.B. in its entirety and insert the following new paragraph in its place:

B. At all times during the progress of the Work, Contractor shall assign a competent resident superintendent who will not be replaced without written notice to Owner except under extraordinary circumstances.

7.03 Labor; Working Hours

SC-7.03.A. Add the following sentence immediately after the last sentence of Paragraph 7.03.A.:

Should the Owner reasonably object to an individual deployed on the Project by Contractor, Contractor agrees to promptly replace the individual with someone reasonably acceptable to the Owner.

SC-7.03.B. Amend Paragraph 7.03.B. by deleting the words “and Engineer”.

- SC-7.03. Delete the last two sentences of Paragraph 7.03.C. in their entirety and insert the following new sentences in their place:

Contractor will not perform Work on a Saturday, Sunday, any legal holiday or Owner-observed holiday. Contractor may perform Work outside regular working hours or on Saturdays, Sundays, legal holidays or Owner-observed holidays only with Owner's written consent, which will not be unreasonably withheld.

- SC-7.03.C. Add the following new subparagraphs immediately after Paragraph 7.03.C.:

1. Regular working hours will be **8:00 AM TO 4:30 PM**.
2. Unless otherwise specifically permitted, the normal time of work under this Contract is limited to a 40-hour work week, less recognized holidays.
3. Owner's legal holidays and Owner-observed holidays are:

New Year's Day

Martin Luther King's Birthday

Presidents Day

Memorial Day

Independence Day

Labor Day

Veterans Day

Thanksgiving

Friday after Thanksgiving (Columbus Day Observed)

Christmas Eve

Christmas Day

When the stated holiday falls on Saturday, Owner will observe the preceding Friday; when the stated holiday falls on Sunday, Owner will observe the following Monday. When Christmas Eve and Christmas Day fall on Saturday and Sunday, Owner will observe the following Monday and Tuesday.

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SC-7.03. Add the following new paragraph immediately after Paragraph 7.03.C.:

- C. Approval for Work outside regular scheduled working hours or on Saturdays, Sundays, legal holidays or Owner-observed holidays, shall be requested no less than 48 hours prior to the requested work period. Contractor shall request approval of changes in regular scheduled working hours no less than one week prior to the desired change.
- D. If it shall become imperative to perform work at night, the Owner shall be informed a reasonable time in advance of the beginning of such work. Temporary lighting and all other necessary facilities for performing and inspecting the work shall be provided and maintained by the Contractor.
- E. Unless otherwise specifically permitted, all work that would be subject to damage shall be stopped during inclement, stormy or freezing weather. Only such work that will not suffer injury to workmanship or materials will be permitted. Contractor shall carefully protect Contractor's work against damage or injury from the weather, and when work is permitted during freezing weather, Contractor shall provide and maintain approved facilities for heating the materials and for protecting the finished work.
- F. Contractor shall be responsible for the cost of any overtime pay or other expense incurred by the Owner for Engineer's services (including those of the Resident Project Representative, if any), Owner's representative, and construction observation services, occasioned by the performance of Work on Saturday, Sunday, any legal holiday or Owner-observed holiday, or as overtime on any regular work day. If Contractor is responsible but does not pay, or if the

parties are unable to agree as to the amount owed, then Owner may impose a reasonable set-off against payments due under Article 15.

1. For purposes of administering the foregoing requirement, additional overtime costs are defined as the employees' hourly cost of actual hours spent beyond regular working hours, as defined in SC-7.03.C, as well as the actual cost of additional expenses associated with work outside unapproved regular working hours. Hourly rates will vary depending on classifications of employees involved.
- G. Contractor will not be responsible for extra costs associated with construction observation overtime for work in excess of 40 hours per week when such overtime work is explicitly required by the Contract Documents.

7.06 Substitutes

SC-7.06.B. Amend the first sentence of Paragraph 7.06.B to read as follows:

Engineer's Evaluation and Determination: Engineer will be allowed a reasonable time to evaluate each substitute request.

7.07 Concerning Subcontractors and Suppliers

SC-7.07.D. Add the following sentence immediately after the first sentence of Paragraph 7.07.D.:

The aforementioned Subcontractor or Supplier identity shall at a minimum include name of the firm, name of primary contact, address and contact phone number.

SC-7.07.K. Amend Paragraph 7.07.K. by deleting the words "and Engineer".

SC-7.07.M. Amend Paragraph 7.07.M. by deleting the words "Engineer or".

7.08 Patent Fees and Royalties

SC-7.08.A. Amend the last sentence of Paragraph 7.08.A to read as follows:

If an invention, design, process, product, or device is specified in the Contract Documents for use in the performance of the Work and if, to the actual knowledge of Owner, its use is subject to patent rights or copyrights calling for the payment of any license fee or royalty to others, the existence of such rights will be disclosed in the Contract Documents.

SC-7.08.B. Delete Paragraph 7.08.B. in its entirety and insert the following new paragraph in its place:

B. *Reserved.*

SC-7.08.C Delete Paragraph 7.07.C in its entirety and insert the following new paragraph in its place:

- C. To the fullest extent permitted by Laws and Regulations, Contractor shall indemnify and hold harmless Owner, and its officers, directors, members, partners, employees, agents, consultants and subcontractors, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to any infringement of patent rights or copyrights incident to the use in the performance of the Work or resulting from the incorporation in the Work of any invention, design, process, product, or device not specified in the Contract Documents.

7.09 *Permits*

SC-7.09. Add the following new paragraphs immediately after Paragraph 7.09.A.:

- B. The Contractor shall obtain, keep current and pay all fees for any necessary construction permits, including utility, grading and building permits, from those authorities, agencies, or municipalities having jurisdiction over land areas, utilities, or structures which are located within the Contract limits and which will be occupied, encountered, used, or temporarily interrupted by the Contractor's operations unless otherwise stated. Record copies of all permits shall be furnished to the Engineer.
- C. When construction permits are accompanied by regulations or requirements issued by a particular authority, agency or municipality, it shall be the Contractor's responsibility to familiarize himself and comply with such regulations or requirements as they apply to his operations on this Project.
- D. Contractor shall implement and maintain appropriate Erosion Prevention and Sediment Control (EPSC) measures, as published in the TDOT Standards and Specifications and/or the Tennessee Department of Environment and Conservation (TDEC) Erosion and Sediment Control Handbook.

7.10 *Taxes*

SC-7.10. Add a new paragraph immediately after Paragraph 7.10.A.:

- B. Pursuant to TCA Title 67, Chapter 6, special tax exemptions exist for contractors performing work relating to water pollution control, such as the Owner's wastewater and sewage system. Any contractor providing services or equipment relating to water pollution control shall not include sales and/or use taxes for exempted work on its requests for payment.

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7.11 *Laws and Regulations*

SC-7.11.A Amend the second sentence of Paragraph 7.11.A to read as follows:

Owner shall not be responsible for monitoring Contractor's compliance with any Laws or Regulations.

SC-7.11.B Amend the first sentence of Paragraph 7.11.B to read as follows:

If Contractor performs any Work or takes any other action knowing or having reason to know that it is contrary to Laws or Regulations, Contractor shall bear all resulting costs and losses, and shall indemnify and hold harmless Owner, and its officers, directors, members, partners, employees, agents, consultants, and subcontractors, from and against all claims, costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such Work or other action.

SC-7.11. Add the following new paragraphs immediately after Paragraph 7.11.C.:

- D. In accordance with Title VI of the Civil Rights Act, as amended, 42 U.S.C. § 2000d, section 303 of the Age Discrimination Act of 1975, as amended, 42 U.S.C. § 6102, section 202 of the Americans with Disabilities Act of 1990, 42 U.S.C. § 12132, and Federal transit law at 49 U.S.C. § 5332, the Contractor agrees that it will not discriminate against any employee or applicant for employment because of race, color, creed, national origin, sex, age or disability. In addition, the Contractor agrees to comply with applicable Federal implementing regulations

and other implementing requirements that the Federal Transit Administration (FTA), Federal Highway Administration (FHWA) and/or Department of Transportation (DOT) may issue. Contractor further agrees that this paragraph will be incorporated by Contractor in all contracts entered into with Suppliers of materials or services, Subcontractors and/or Subconsultants that may perform any labor or services in connection with this Contract.

E. Certification of Eligibility under the Davis-Bacon Act

1. By the execution of this Agreement, the Contractor certifies that neither it nor any person or firm who has an interest in the Contractor's firm is a person or firm ineligible to be awarded contracts by the United States Government by virtue of section 3(a) of the Davis-Bacon Act or 29 CFR 5.12(a)(1).
2. No part of the Agreement shall be subcontracted to any person or firm ineligible to be awarded contracts by the United States Government by virtue of section 3(a) of the Davis-Bacon Act or 29 CFR 5.12(a)(1).
3. The penalty for making false statements is prescribed in the U.S. Criminal Code, 18 U.S.C.1001.

F. *Illegal Aliens* – Clarksville Ordinance 30-2006-07 provides as follows:

If any person who contracts to supply goods or services to the city or other city entities, or who submits a bid to contract to supply goods or services to the city or other city entities, is discovered to have knowingly utilized the services of illegal aliens in the performance of such a contract to supply goods or services to the city or other city entities, the purchasing agents shall declare that person to be prohibited from contracting for or submitting a bid for any contract to supply goods or services to the city or other city entities for a period of one (1) year from the date of discovery of the usage of illegal alien services in the performance of a contract to supply goods or services to the city or other city entities.

- G. The Contractor and, if applicable, its subcontractor(s) shall have a license to do business with the City of Franklin in accordance with TCA §67-4-701, *et sequentia*.

7.13 Safety and Protection

SC-7.13.D. Amend Paragraph 7.13.D. by deleting the words “or Engineer”.

SC-7.13. Insert the following after the second sentence of Paragraph 7.13.G.:

The following Owner safety programs are applicable to the Work:

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1. Contractor/Firm/Business Safety Program (Section C-452).

SC-7.13.H. Amend Paragraph 7.13.H. by deleting the words “and Engineer” as well as “and Engineer’s”.

SC-7.13.I. Amend Paragraph 7.13.I. by deleting the words “Owner and”.

SC-7.13. Add the following new paragraph immediately after Paragraph 7.13.J.:

K. Certain aspects of work performed under this Agreement may involve the entry into manholes, tanks, pits, etc. which are defined as confined spaces by the OSHA requirements and which are detailed in the Combined Federal Register 1910.146. The Contractor shall become familiar with all aspects and requirements of this OSHA policy in order for the Contractor to protect its employees and all others involved from the dangers, which may be associated with the limited access and hazardous atmospheres that may exist in these confined spaces. It is the Contractor’s responsibility to become familiar with and institute the various permitting, sampling and other associated safety requirements for confined space entry.

7.16 Submittals

SC-7.16.A.2. Add the following sentence after the last sentence of Paragraph 7.16.A.2.:

Submittals without the Contractor’s stamp of approval will not be reviewed by the Engineer and will be returned to the Contractor.

SC-7.16.A. Add the following new paragraphs immediately after Paragraph 7.16.A.3.:

4. Drawings indicate the extent and general arrangement of the Work. If any departures from the Drawings are deemed necessary by the Contractor to accommodate the materials and equipment he proposes to furnish, details of such departures and reasons therefore shall be submitted as soon as practicable to the Engineer for approval. No such departures shall be made without the prior written approval of the Engineer. Approved changes shall be made without additional cost to the Owner for this work. If the submittals contain any departures from the Contract Documents, and specific mention thereof is not made in the Contractor's letter of transmittal, the review of such submittals shall not constitute approval of the departure.
5. The specific equipment proposed for use by the Contractor on the project may require changes in structures, auxiliary equipment, piping, electrical, mechanical, controls or other work to provide a complete satisfactory operating installation. The Contractor shall submit to the Engineer, for approval, all necessary Drawings and details showing such changes to verify conformance with the overall project structural and architectural requirements and overall project operating performance. The Bid Price shall include all costs in connection with the preparation of new drawings and details and all changes to construction work to accommodate the proposed equipment.

SC-7.16.C.1. Add the following sentence immediately after the last sentence of Paragraph 7.16.C.1.:

Engineer's review will be confined to general arrangement and compliance with the Contract Drawings and Specifications only, and will not be for the purpose of checking dimensions, weights, clearances, fittings, tolerances, interferences, coordination of trades, etc.

SC-7.16.C. Add the following new paragraphs immediately after Paragraph 7.16.C.8.:

9. In the event that the Engineer is required to provide additional engineering services as a result of changes by the Contractor in dimension, weight, power requirements, etc., of the equipment and accessories furnished, or if the Engineer is required to examine

and evaluate any changes proposed by the Contractor for the convenience of the Contractor, then the cost of Engineer's effort and expenses in connection with such additional services shall be charged to the Contractor by the Owner, and Owner may impose a set-off against payments due to Contractor to secure reimbursement for the cost of Engineer's effort and expenses.

10. In the event that the Engineer is required to provide additional engineering services as a result of Contractor's errors, omissions, or failure to conform to the requirements of the Contract Documents, then the cost of Engineer's effort and expenses in connection with such additional services shall be charged to the Contractor by the Owner, and Owner may impose a set-off against payments due to Contractor to secure reimbursement for the cost of Engineer's effort and expenses.

SC-7.16.D.2. Amend Paragraph 7.16.D.2. by deleting the words "to Owner".

SC-7.16.D.3. Amend Paragraph 7.16.D.3. by deleting the words "to Owner".

7.17 Contractor's General Warranty and Guarantee

SC-7.17.D.2. Delete Paragraph 7.17.D.2. in its entirety and insert the following new paragraph in its place:

2. Payment by Owner of any progress or final payment;

7.18 Indemnification

SC-7.18.A. Delete Paragraph 7.18.A. in its entirety and insert the following new paragraph in its place:

- A. To the fullest extent permitted by Laws and Regulations, and in addition to any other obligations of Contractor under the Contract or otherwise, Contractor shall indemnify and hold harmless Owner, and its officers, directors, members, partners, employees, agents, consultants and subcontractors, from losses, damages, costs, and judgments (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals, and all court or arbitration or other dispute resolution costs) arising from third-party claims or actions relating to or resulting from the performance or furnishing of the Work, provided that any such claim, action, loss, cost, judgment or damage is attributable to bodily injury, sickness, disease, or death, or to damage to or destruction of tangible property (other than the Work itself), including the loss of use resulting therefrom, but only to the extent caused by any negligent act or omission of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable.

SC-7.18.B. Delete Paragraph 7.18.B. in its entirety and insert the following new paragraph in its place:

- B. In any and all claims against Owner, or any of its officers, directors, members, partners, employees, agents, consultants, or subcontractors, by any employee (or the survivor or personal representative of such employee) of Contractor, any Subcontractor, any Supplier, or any individual or entity directly or indirectly employed by any of them to perform any of the Work, or anyone for whose acts any of them may be liable, the indemnification obligation under Paragraph 7.18.A will not be limited in any way by any limitation on the amount or type of damages, compensation, or benefits payable by or for Contractor or any such Subcontractor, Supplier, or other individual or entity under workers' compensation acts, disability benefit acts, or other employee benefit acts.

7.19 Delegation of Professional Design Services

SC-7.19.D. Amend Paragraph 7.19.D. by deleting the words "and Engineer".

SC-7.19.F. Amend Paragraph 7.19.F. by deleting the words "or Engineer".

ARTICLE 8—OTHER WORK AT THE SITE

8.02 *Legal Relationships*

SC-8.03.C. Delete Paragraph 8.03.C. in its entirety and insert the following new paragraph in its place:

- C. If Contractor damages, delays, disrupts, or interferes with the work of any other contractor, or any utility owner performing other work at or adjacent to the Site, through Contractor's failure to take reasonable and customary measures to avoid such impacts, or if any claim

arising out of Contractor's actions, inactions, or negligence in performance of the Work at or adjacent to the Site is made by any such other contractor or utility owner against Contractor or Owner, then Contractor shall (1) promptly attempt to settle the claim as to all parties through negotiations with such other contractor or utility owner, or otherwise resolve the claim by arbitration or other dispute resolution proceeding or at law, and (2) indemnify and hold harmless Owner, and its officers, directors, members, partners, employees, agents, consultants and subcontractors, from and against any such claims, and against all costs, losses, and damages (including but not limited to all fees and charges of engineers, architects, attorneys, and other professionals and all court or arbitration or other dispute resolution costs) arising out of or relating to such damage, delay, disruption, or interference.

ARTICLE 9—OWNER'S RESPONSIBILITIES

No Supplementary Conditions in this Article.

ARTICLE 10—ENGINEER'S STATUS DURING CONSTRUCTION

10.02 Visits to Site

SC-10.02.A. Delete the last sentence of Paragraph 10.02.A. in its entirety.

10.03 Resident Project Representative

SC-10.03.A. Delete Paragraph 10.03.A. in its entirety and insert the following new paragraph in its place:

- A. If Owner deems necessary, Engineer will furnish a Resident Project Representative to represent Engineer at the Site and assist Engineer in observing the progress and quality of the Work, then the authority and responsibilities of any such Resident Project Representative will be as provided in the Supplementary Conditions, and limitations on the responsibilities thereof will be as provided in the Supplementary Conditions and in Paragraph 10.07.

10.06 Decisions on Requirements of Contract Documents and Acceptability of Work

SC-10.06.A. Delete the second sentence of Paragraph 10.06.A. in its entirety and insert the following new sentence in its place:

In rendering such decisions and judgments, Engineer will not show partiality to Owner or Contractor, and will not be liable to Contractor or others in connection with any proceedings, interpretations, decisions, or judgments conducted or rendered in good faith.

10.08 Compliance with Safety Program

SC-10.08.A. Delete Paragraph 10.08.A. in its entirety and insert the following paragraph in its place:

EJCDC® C-800, Supplementary Conditions of the Construction Contract.

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- A. While at the Site, Engineer's employees and representatives will comply with the specific applicable requirements of Contractor's safety programs of which Engineer has been informed.

ARTICLE 11—CHANGES TO THE CONTRACT

11.01 Amending and Supplementing the Contract

SC-11.01.C. Delete the last sentence of Paragraph 11.01.C. in its entirety.

11.02 Change Orders

SC-11.02.A.2. Delete Paragraph 11.02.A.2. in its entirety and insert the following new paragraph in its place:

- 2. *Reserved.*

SC-11.02.A.3. Delete Paragraph 11.02.A.3. in its entirety and insert the following new paragraph in its place:

- 3. Changes in the Work which are: (a) ordered by Owner pursuant to Paragraph 11.05, (b) required because of Owner's acceptance of defective Work under Paragraph 14.04 or Owner's correction of defective Work under Paragraph 14.07, or (c) agreed to by the parties; and

11.05 Owner-Authorized Changes in the Work

SC-11.05.A. Delete the second sentence of Paragraph 11.05.A. in its entirety.

11.09 Change Proposals

SC-11.09.B.2. Amend the first sentence of Paragraph 11.09.B.2. by deleting the words "and Owner".

(This page intentionally blank)

SC-11.09.B.3. Delete the first sentence of Paragraph 11.09.B.3. in its entirety.

SC-11.09.B.4. Amend Paragraph 11.09.B.4. by deleting the words “Owner and” and deleting the words “either Owner or”.

SC-11.09.B.5. Amend Paragraph 11.09.B.5. by deleting the words “Owner and” and deleting the words “Owner or”.

SC-11.09.C. Delete Paragraph 11.09.C. in its entirety and insert the following in its place:

C. *Reserved*

ARTICLE 12—CLAIMS

12.01 Claims

SC-12.01.A Delete Paragraph 12.01.A. in its entirety and insert the following new paragraph in its place:

- A. *Claims Process*: The following disputes between Owner and Contractor are subject to the Claims process set forth in this article:
1. Appeals by Contractor of Engineer’s decisions regarding Change Proposals;
 2. Owner demands for adjustments in the Contract Price or Contract Times, or other relief under the Contract Documents;
 3. Subject to the waiver provisions of Paragraph 15.07, any dispute arising after Engineer has issued a written recommendation of final payment pursuant to Paragraph 15.06.B.

SC-12.01.C Amend the last sentence of Paragraph 12.01.C to read as follows:

All actions taken on a Claim shall be stated in writing and submitted to the other party.

ARTICLE 13—COST OF WORK; ALLOWANCES, UNIT PRICE WORK

13.01 Cost of the Work

SC-13.01.B.3. Amend the second sentence of Paragraph 13.01.B.3. to read as follows:

If required by Owner, Contractor shall obtain competitive bids from subcontractors acceptable to Owner and Contractor and shall deliver such bids to Owner, which will then determine, which bids, if any, will be acceptable.

13.02 Allowances

SC-13.02.A Amend Paragraph 13.02.A. by deleting the words “and Engineer”.

SC-13.02.D Amend Paragraph 13.02.D. by deleting the words “as recommended by Engineer”.

13.03 Unit Price Work

SC-13.03.D. Amend the last sentence of Paragraph 13.03.D. by deleting the words “Owner and”.

ARTICLE 14—TESTS AND INSPECTIONS; CORRECTION, REMOVAL, OR ACCEPTANCE OF DEFECTIVE WORK

14.01 Access to Work

SC-14.01.A. Amend the first sentence of Paragraph 14.01.A. to read as follows:

Owner, its consultants and other representatives and personnel of Owner, independent testing laboratories, and authorities having jurisdiction have access to the Site and the Work at reasonable times for their observation, inspection, and testing.

14.02 Tests, Inspections, and Approvals

SC-14.02.D.2. Amend Paragraph 14.02.D.2. by deleting the words “Owner’s and”.

SC-14.02.D Amend the last sentence of Paragraph 14.02.D. by deleting the words “Owner and”.

SC-14.02.E Delete Paragraph 14.02.E in its entirety and insert the following new paragraph in its place:

E. If the Contract Documents require the Work (or part thereof) to be approved by Owner, including Engineer, or another designated individual or entity, then Contractor shall assume full responsibility for arranging and obtaining such approvals.

14.03 Defective Work

SC-14.03.C Delete Paragraph 14.03.C in its entirety and insert the following new paragraph in its place:

C. *Notice of Defects:* Prompt notice of all defective Work of which Owner has actual knowledge will be given to Contractor.

14.07 Owner May Correct Defective Work

SC-14.07.B Amend the last sentence of Paragraph 14.07.B to read as follows:

Contractor shall allow Owner, Owner's representatives, agents and employees, Owner's other contractors, and Owner's consultants access to the Site to enable Owner to exercise the rights and remedies under this paragraph.

ARTICLE 15—PAYMENTS TO CONTRACTOR, SET OFFS; COMPLETIONS; CORRECTION PERIOD

15.01 Progress Payments

SC-15.01.B.1. Amend the first sentence of Paragraph 15.01.B.1. to read as follows:

At least 30 days before the date established in the Agreement for each progress payment (but not more often than once a month), Contractor shall submit to Engineer for review an Application for Payment filled out and signed by Contractor covering the Work completed as of the date of the Application and accompanied by such supporting documentation as is required by the Contract Documents.

SC-15.01.B.2. Add the following language at the end of Paragraph 15.01.B.2.:

The certificate of property insurance shall list the Owner as additional insured and must, at a minimum, include the following information:

- a. Location of property stored;
- b. Invoice number or itemized information including the description of stored items, such as tag number, manufacturer, etc.
- c. Cost or value of materials or equipment stored.

Off-site storage locations shall be secure and provide proper protection from unauthorized removal, pilferage and theft and shall protect material from negative effects of weather, water damage, insect and rodent infestation, deterioration because of dust, temperature, static electricity and humidity. If applicable, materials must be supported, piled or arranged in accordance with manufacturer's recommendations and warranty requirements. Materials shall be clearly labeled to identify the component. Owner reserves the right to periodically inspect off-site stored materials without notice and may, if applicable, require certification by manufacturer's representative. If detailed information received by Contractor of manufacturer's representative is not of sufficient detail or markings are not adequate to complete verification of stored materials proposed for payment, then Contractor's request will be denied. If Contractor's off-site

location request is approved, Contractor shall allow a minimum 30-day review prior to inclusion on Contractor's application for payment due to required coordination. If review of the off-site storage location for materials or equipment, that have previously been included on Contractor's Application for Payment and paid by Owner, reveals that storage conditions have changed or materials or equipment show visible damage, Contractor shall deduct the cost of such materials or equipment on the next Application for Payment. Contractor shall notify Engineer if materials stored off-site are moved and stored on site. If material or equipment is not in acceptable condition when delivered to the project Site, Contractor shall not incorporate it into the Work and cost of material or equipment must be deducted from Contractor's next Application for Payment.

SC-15.01.C.1. Delete the first sentence of Paragraph 15.01.C.1. in its entirety and insert the following new sentence in its place:

Engineer will, within 10 days after receipt of each Application for Payment, including each resubmittal, either approve payment or return the Application to Contractor indicating in writing Engineer's reasons for refusing to approve payment.

SC-15.01.C.2. Amend the first sentence of Paragraph 15.01.C.2. to read as follows:

Engineer's approval of any payment requested in an Application for Payment will constitute a representation by Engineer, based on Engineer's observations of the executed Work as an experienced and qualified design professional, and on Engineer's review of the Application for Payment and the accompanying data and schedules, that to the best of Engineer's knowledge, information and belief:

SC-15.01.C.3. Amend the first sentence of Paragraph 15.01.C.3. to read as follows:

By approving any such payment Engineer will not thereby be deemed to have represented that:

SC-15.01.C.4. Amend the first sentence of Paragraph 15.01.C.4. to read as follows:

Neither Engineer's review of Contractor's Work for the purposes of approving payments nor Engineer's approval of any payment, including final payment, will impose responsibility on Engineer:

SC-15.01.C.5. Amend Paragraph 15.01.C.5. by deleting the words "to Owner".

SC-15.01.C.6. Amend the first sentence of Paragraph 15.01.C.6 to read as follows:

Engineer may reduce payment (set-off) necessary in Engineer's opinion to protect Owner from loss because:

SC-15.01.D.1. Amend the first sentence of Paragraph 15.01.D.1. to read as follows:

Twenty days after presentation of the Application for Payment to Owner with Engineer's approval, the amount approved (subject to any Owner set-offs) will become due, and when due will be paid by Owner to Contractor.

SC-15.01.E.1. Amend the first sentence of Paragraph 15.01.E.1. to read as follows:

In addition to any reductions in payment (set-offs) by Engineer, Owner is entitled to impose a set-off against payment based on any of the following:

SC-15.01.E.1.k. Insert the following paragraphs after Paragraph 15.01.E.1.k. and renumber subsequent paragraphs accordingly:

- l. any fines levied against the Owner for failure of Contractor to adhere to permit requirements or to abide by laws and regulations;
- m. Owner has incurred extra charges or engineering costs related to Contractor's work outside regular working hours;
- n. Owner has incurred extra costs related to failure of Contractor to perform periodic cleanup and basic restoration of the Site satisfactory to the Engineer;

SC-15.01.E.2. Amend the first sentence of Paragraph 15.01.E.2. to read as follows:

If Owner imposes any set-off against payment, Owner will give Contractor immediate written notice stating the reasons for such action and the specific amount of the reduction, and promptly pay Contractor any amount remaining after deduction of the amount so withheld.

15.03 Substantial Completion

SC-15.03.A. Amend Paragraph 15.03.A. by deleting the words "Owner and" in the first and second sentence.

SC-15.03.B. Amend the first sentence of Paragraph 15.03.B. to read as follows:

Promptly after Contractor's notification, Owner, including Engineer, and Contractor shall make an inspection of the Work to determine the status of completion.

SC-15.03.B. Add the following new subparagraph to Paragraph 15.03.B.:

1. If some or all of the Work has been determined not to be at a point of Substantial Completion and will require re-inspection or re-testing by Engineer, the cost of such re-inspection or re-testing, including the cost of time, travel and living expenses, will be paid by Contractor to Owner. If Contractor does not pay, or the parties are unable to agree as to the amount owed, then Owner may impose a reasonable set-off against payments due under this Article 15.

SC-15.03.C. Delete Paragraph 15.03.C. in its entirety and insert the following new paragraph in its place:

- C. If Engineer considers the Work substantially complete, Engineer will, within 14 days, execute and deliver to Contractor a final certificate of Substantial Completion (with a revised punch list of items to be completed or corrected).

SC-15.03.D. Amend the first sentence of Paragraph 15.03.D. to read as follows:

At the time of receipt of the Contractor's request for issuance of Substantial Completion, Owner and Contractor will confer regarding Owner's use or occupancy of the Work following Substantial Completion, review the builder's risk insurance policy with respect to the end of the builder's risk coverage, and confirm the transition to coverage of the Work under a permanent property insurance policy held by Owner.

15.04 Partial Use or Occupancy

SC-15.04.A Amend the first sentence of Paragraph 15.04.A to read as follows:

Prior to Substantial Completion of all the Work, Owner may use or occupy any substantially completed part of the Work which has specifically been identified in the Contract Documents, or which Owner, including Engineer, and Contractor agree constitutes a separately functioning and usable part of the Work that can be used by Owner for its intended purpose without significant interference with Contractor's performance of the remainder of the Work, subject to the following conditions:

SC-15.04.A.1. Amend the second sentence of Paragraph 15.04.A.1. to read as follows:

If and when Contractor agrees that such part of the Work is substantially complete, Contractor and Owner, including Engineer, will follow the procedures of Paragraph 15.03.A through E for that part of the Work.

SC-15.04.A.2. Amend Paragraph 15.04.A.2. by deleting the words "Owner and".

SC-15.04.A.3. Amend the first and second sentence of Paragraph 15.04.A.3. to read as follows:

Within a reasonable time after either such request, Owner, including Engineer, and Contractor shall make an inspection of that part of the Work to determine its status of completion. If Engineer does not consider that part of the Work to be substantially complete, Engineer will notify Contractor in writing giving the reasons therefor.

15.05 Final Inspection

SC-15.05.A. Amend Paragraph 15.05.A. by deleting the words "Owner and".

SC-15.05. Add the following new paragraph immediately after Paragraph 15.05.A.:

- B. Final cleaning and repairing shall be so arranged as to be finished upon completion of the construction work. The Contractor will make his final cleaning and repairing, and any portion of the work finally inspected and accepted by the Engineer shall be kept clean by the Contractor, until the final acceptance of the entire Work.

15.06 Final Payment

SC-15.06.B. Delete Paragraph 15.06.B. in its entirety and insert the following new paragraph in its place:

- B. *Engineer's Review of Final Application and Recommendation of Payment:* If, on the basis of Engineer's observation of the Work during construction and final inspection, and Engineer's review of the final Application for Payment and accompanying documentation as required by the Contract Documents, Engineer is satisfied that the Work has been completed and Contractor's other obligations under the Contract have been fulfilled, Engineer will, within 10 days after receipt of the final Application for Payment, indicate in writing Engineer's approval of final payment and present the Application for Payment to Owner for payment. Such approval shall account for any set-offs against payment that are necessary in Engineer's opinion to protect Owner from loss for the reasons stated above with respect to progress payments.

SC-15.06.C. Delete Paragraph 15.06.C in its entirety and insert the following new paragraph in its place:

- C. *Notice of Acceptability:* Engineer's payment approval of the final Application for Payment, will serve as Engineer's notice that the Work is acceptable, subject to stated limitations in the notice and to the provisions of Paragraph 15.07.

SC-15.06.D. Delete Paragraph 15.06.D. in its entirety and insert the following new paragraph in its place:

- D. *Completion of Work*: The Work is complete (subject to surviving obligations) when it is ready for final payment as established by the Engineer's written approval of final payment.

SC-15.06.E. Delete Paragraph 15.06.E. in its entirety and insert the following new paragraph in its place:

E.. *Final Payment Becomes Due*: Upon receipt from Engineer of the final Application for Payment and accompanying documentation, Owner shall set off against the amount approved by Engineer for final payment any further sum to which Owner is entitled, including but not limited to set-offs for liquidated damages and set-offs allowed under the provisions of this Contract with respect to progress payments. Owner shall pay the resulting balance due to Contractor within 30 days of Owner's receipt of the final Application for Payment from Engineer.

ARTICLE 16—SUSPENSION OF WORK AND TERMINATION

16.01 Owner May Suspend Work

SC-16.01.A. Amend the first sentence of Paragraph 16.01.A. by deleting the words "and Engineer".

SC-16.01. Add the following new paragraph immediately after Paragraph 16.01.A.:

- B. Should the Resident Project Representative (RPR) or Owner's Site Representative (OSR) suspend Work due to unsafe Work conducted by the Contractor, Contractor shall not resume Work until re-inspected by Owner's safety personnel or by subsequent inspection by Tennessee OSHA. The Contractor shall not be allowed any adjustment in Contract Price or extension of Contract Time attributed to this delay.

16.02 Owner May Terminate for Cause

SC-16.02.A.4. Delete Paragraph 16.02.A.4. in its entirety and insert the following new paragraph in its place:

4. Contractor's repeated disregard of the authority of Owner, including Engineer.

SC-16.02.E. Amend the fourth sentence of Paragraph 16.02.E. to read as follows:

Such claims, costs, losses, and damages incurred by Owner will be incorporated in a Change Order.

16.03 Owner May Terminate for Convenience

SC-16.03.A Amend the first sentence of Paragraph 16.03.A. by deleting the words “and Engineer”.

16.04 Contractor May Stop Work or Terminate

SC-16.04.A. Delete paragraph 16.04.A. in its entirety and insert the following new paragraph in its place:

- A. If, through no act or fault of Contractor, (1) the Work is suspended for more than 90 consecutive days by Owner or under an order of court or other public authority, or (2) Engineer fails to act on any Application for Payment within 30 days after it is submitted, or (3) Owner fails for 30 days to pay Contractor any sum finally determined to be due, then Contractor may, upon 7 days written notice to Owner, and provided Owner does not remedy such suspension or failure within that time, terminate the contract and recover from Owner payment on the same terms as provided in Paragraph 16.03.

SC-16.04.B. Amend the first sentence of Paragraph 16.04.B. to read as follows:

In lieu of terminating the Contract and without prejudice to any other right or remedy, if Engineer has failed to act on an Application for Payment within 30 days after it is submitted, or Owner has failed for 30 days to pay Contractor any sum finally determined to be due, Contractor may, 7 days after written notice to Owner, stop the Work until payment is made of all such amounts due Contractor.

ARTICLE 17—FINAL RESOLUTIONS OF DISPUTES

17.01 Methods and Procedures

SC-17.01. Delete paragraph 17.01.B.3. in its entirety and insert the following new paragraph in its place:

3. if no dispute resolution process is provided for in the Supplementary Conditions or mutually agreed to, either party may submit the dispute to the exclusive jurisdiction and venue of the state courts located in Williamson County, Tennessee, and both parties specifically agree to be bound by the jurisdiction and venue thereof.

17.02 Attorneys’ Fees

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SC-17.02. Add the following new Paragraph immediately after Paragraph 17.01.:

17.02. Attorneys' Fees

- A. For any matter subject to final resolution under this Article, each party shall bear its own attorney's fees, expert fees and any discretionary costs.

ARTICLE 18—MISCELLANEOUS

18.01 Giving Notice

SC-18.01. Delete the first two lines of Paragraph 18.01.A. in their entirety and replace with the following:

Whenever any provision of the Contract requires the giving of written notice to Owner, including Engineer, or Contractor, it will be deemed to have been validly given only if delivered to the party's designated representative:

18.04 Limitation of Damages

SC-18.04.A Delete Paragraph 18.04.A in its entirety and insert the following new paragraph in its place:

- A. With respect to any and all Change Proposals, Claims, disputes subject to final resolution, and other matters at issue, neither Owner nor any of its officers, directors, members, partners, employees, agents, consultants, or subcontractors, shall be liable to Contractor for any claims, costs, losses, or damages sustained by Contractor on or in connection with any other project or anticipated project.

18.11 *Right to Inspect Records*

SC-18.11. Add the following new paragraph immediately after Paragraph 18.10.:

18.11 *Right to Inspect Records*

- A. Contractor shall establish a reasonable invoice accounting system, which enables ready identification of contractor costs of goods and use of funds relating to the Work performed under the Contract. The Owner or its representative may audit the Contractor's records any time during the Contract Time and for an additional period of four years after final payment or until all disputed claims have been settled, whichever is longer, to verify the Owner's payment obligation and the use of the Owner's funds. This right to audit shall include all supporting documentation of subcontractors' invoices for goods or services that are subcontracted by the Contractor. Any disputed claims will be verified by an independent auditor at the cost of the Owner unless the Contractor is found to have overcharged the Owner in which case the Contractor will pay the cost of the audit as well as repay all overcharges.
- B. Contractor agrees to cooperate with and make reasonable accommodation to Owner for audit or financial examination purposes. Contractor further agrees that failure to cooperate or to carry out the requirements set forth in Paragraph 18.11. shall constitute a breach of contract and may result in termination of this Contract by the Owner.
- C. This Paragraph 18.11. shall not be construed to limit, revoke, or abridge any other rights, powers, or obligations relating to audit which the Owner may have by Federal, State, or Municipal law, whether those rights, powers, or obligations are express or implied.

EXHIBIT A—SOFTWARE REQUIREMENTS FOR ELECTRONIC DOCUMENT EXCHANGE**[MODIFY TABLE TO CONFORM TO PROJECT-SPECIFIC REQUIREMENTS.]**

Item	Electronic Documents	Transmittal Means	Data Format	Note (*)
a.1	General communications, transmittal covers, meeting notices and responses to general information requests for which there is no specific prescribed form.	Email	Email	
a.2	Meeting agendas, meeting minutes, RFI's and responses to RFI's, and Contract forms.	Email w/ Attachment	PDF	(**)
a.3	Contactors Submittals (Shop Drawings, "or equal" requests, substitution requests, documentation accompanying Sample submittals and other submittals) to Engineer, and Engineer's responses to Contractor's Submittals, Shop Drawings, correspondence, and Applications for Payment.	Email w/ Attachment	PDF	
a.4	Correspondence; milestone and final version Submittals of reports, layouts, Drawings, maps, calculations and spreadsheets, Specifications, Drawings and other Submittals from Contractor to Owner or Engineer and for responses from Engineer and Owner to Contractor regarding Submittals.	Email w/ Attachment or LFE	PDF	
a.5	Layouts and drawings to be submitted to Owner for future use and modification.	Email w/ Attachment or LFE	DWG	
a.6	Correspondence, reports and Specifications to be submitted to Owner for future word processing use and modification.	Email w/ Attachment or LFE	DOC	
a.7	Spreadsheets and data to be submitted to Owner for future data processing use and modification.	Email w/ Attachment or LFE	EXC	
a.8	Database files and data to be submitted to Owner for future data processing use and modification.	Email w/ Attachment or LFE	DB	
Notes				
(*)	All exchanges and uses of transmitted data are subject to the appropriate provisions of Contract Documents.			
(**)	Transmittal of written notices is governed by Paragraph 18.01 of the General Conditions.			
Key				
Email	Standard Email formats (.htm, .rtf, or .txt). Do not use stationery formatting or other features that impair legibility of content on screen or in printed copies			
LFE	Agreed upon Large File Exchange method (FTP, CD, DVD, hard drive)			
PDF	Portable Document Format readable by Adobe® Acrobat Reader			
DWG	Autodesk® AutoCAD .dwg format			
DOC	Microsoft® Word .docx format Version Word 2010 or later			
EXC	Microsoft® Excel .xls or .xml format Version Excel 2010 or later			
DB	Microsoft® Access .mdb format Version Access 2010 or later			

**Exhibit A—Software Requirements for Electronic Document Exchange.
EJCDC® C-800, Supplementary Conditions of the Construction Contract.**

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EXHIBIT B—FORESEEABLE BAD WEATHER DAYS

Month	Number of Foreseeable Bad Weather Days in Month Based on Precipitation as Rain Equivalent (inches) (*)
January	5
February	5
March	6
April	6
May	6
June	6
July	5
August	4
September	4
October	4
November	5
December	6

Notes:

- * Two inches of sleet equal one inch of rain. Five inches of wet, heavy snow equal one inch of rain. Fifteen inches of “dry” powder snow equals one inch of rain

Exhibit B—Foreseeable Bad Weather Days.**EJCDC® C-800, Supplementary Conditions of the Construction Contract.**

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PROJECT MANUAL

SEWER SYSTEM IMPROVEMENTS – REPLACEMENT OF HOLIDAY COURT PUMPING STATION

City of Franklin, TN

June 2017



Hethcoat & Davis, Inc.
278 Franklin Road, Suite 200
Brentwood, Tennessee 37027
615-577-4300

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City of Franklin Addendum No. 1 to

Purchasing Office Solicitation No.: 2020-017

1. Solicitation identified: This Addendum No. 1 applies to the following procurement solicitation:

Holiday Court sewer system improvements

Purchasing Office Solicitation No.: 2020-017

2. Notice to Bidders publication date: **January 2, 2020**
3. Solicitation release date: **January 2, 2020**
4. Addendum No. 1 release date: **January 23, 2020**
5. Deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise any aspect of this procurement solicitation: **January 23, 2020, 2:00 p.m. Central Time**
January 27, 2020, 2:00 p.m. Central Time
6. Bids submittal deadline and scheduled opening: **February 4, 2020, 2:00 p.m. Central Time**
7. Tentative date of release of City's tabulation of bids received and notice of intent to award: **February 14, 2020**
8. Tentative date of award: Meeting of Board of Mayor and Aldermen at which is tentatively scheduled to be awarded the selection of the lowest and best responsive and responsible bid: **February 25, 2020**
9. Addendum:

In reference to the City of Franklin's January 2, 2020 Purchasing Office Solicitation No. 2020-017 for Holiday Court sewer system improvements, the City has determined that certain aspects of the solicitation need to be revised, and the City has been asked certain questions about the solicitation by one or more contractors who are potential bidders.

The purpose of this Addendum No. 1 is (a) to announce the City's determination to revise the package of front-end documents released with the package of bid solicitation documents, (b) to release the package of bid solicitation documents as revised to date, and (c) to announce the City's responses to the questions that have been asked to date.

Please note that the submittal deadline and scheduled opening of all bids received remains unchanged and is:

February 4, 2020, 2:00 p.m. Central Time

City of Franklin Addendum No. 1 to

Purchasing Office Solicitation No.: 2020-017

The following document included in the package of bid solicitation documents has now been revised and is included, as revised, in the package of bid solicitation documents as revised to date and released with this Addendum No. 1:

- a. Drawings for Holiday Court sewer system improvements

The following documents not included in the package of front-end documents released with the package of bid solicitation documents have now been added to the package of bid solicitation documents as revised to date and released with this Addendum No. 1:

- a. C-111 ("Advertisement for Bids")
- b. C-300 ("State Contractor License Information Form")
- c. C-410 ("Bid Form")
- d. C-430 ("Bid Bond")
- e. C-451 ("Qualifications Statement")
- f. C-452 ("Contractor Business Safety Program")
- g. C-453 ("Conflict of Interest Statement")
- h. C-454 ("Drug-Free Workplace Affidavit")
- i. C-455 ("Attestation Regarding Illegal Immigrants or Aliens")
- j. C-456 ("Iran Divestment Act Certification")
- k. C-470 ("Statement of No Bid")
- l. C-610 ("Performance Bond")
- m. C-615 ("Payment Bond")

Below are the questions asked to date and the City's responses thereto:

Q1: Do you anticipate extending the bid due date?

A1: Not at this time. However, please note that, by this Addendum No. 1, the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise any aspect of this procurement solicitation has been postponed to January 27, 2020, 2:00 p.m. Central Time.

Q2: What additional details are you willing to provide, if any, beyond what is stated in bid documents concerning how you will identify the winning bid?

A2: Please see Article 13 ("Basis of Bid") of the Instructions to Bidders for Construction Contract.

Q3: Was this bid posted to the nationwide free bid notification website at www.mygovwatch.com?

A3: Not by the City of Franklin, Tennessee.

Q4: Other than your own website, where was this bid posted?

A4: On the Vendor Registry website (<https://vendorregistry.com/>).

Q5: Could you please advise what the value of this project is?

A5: The engineer's opinion of construction cost is, in total, \$564,000.

Q6: What is the estimated construction cost?

City of Franklin Addendum No. 1 to

Purchasing Office Solicitation No.: 2020-017

A6: Please see A5 above.

Q7: I would like to request a plan-holders or bidders list.

A7: The City is not maintaining such a list for this project.

Q8: I would like to confirm that the bid date and time are unchanged.

A8: Please see A1 above.

Q9: Could you provide a cost estimate?

A9: Please see A6 above.

10. Acknowledge addendum: Bidders shall acknowledge this addendum on their submitted Bid Form.

11. Questions seeking to clarify or revise the procurement solicitation: Questions seeking to clarify or revise any aspect of the procurement solicitation shall be submitted by contacting:

City of Franklin Purchasing Office
Franklin City Hall, Suite 107
109 3rd Ave. South
Franklin, TN 37064
purchasing@franklintn.gov
Tel: 615-550-6692
Fax: 615-550-0079

Such questions of a non-procedural nature shall be submitted before the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise the procurement solicitation.

Such questions of a procedural nature may be submitted either before or after the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise the procurement solicitation.

Depending upon the inquiry, the City may request that the question seeking to clarify or revise any aspect of the procurement solicitation be submitted in writing, and the City may choose to announce, typically in the form of an addendum, both the inquiry and the City's response thereto.

12. Communication with City during procurement phase: Any questions seeking to clarify or revise any aspect of the procurement solicitation should be addressed to the City as described above. Until the procurement award has been made, contractors shall not communicate about either the content of or the procurement process pertaining to this procurement solicitation with any official, employee or other representative of the City except through the City's Purchasing Office. The City reserves the right to disqualify any contractor that initiates unauthorized communication with the City during the procurement phase (that is, the period of time between when the procurement solicitation has been posted on the [Business Opportunities webpage](https://www.franklintn.gov) of the City's website (<https://www.franklintn.gov/>) and when the procurement award has been made).

City of Franklin Addendum No. 2 to

Purchasing Office Solicitation No.: 2020-017

1. Solicitation identified: This Addendum No. 2 applies to the following procurement solicitation:

Holiday Court sewer system improvements

Purchasing Office Solicitation No.: 2020-017

2. Notice to Bidders publication date: **January 2, 2020**
3. Solicitation release date: **January 2, 2020**
4. Addendum No. 1 release date: **January 23, 2020**
5. Addendum No. 2 release date: **January 24, 2020**
6. Deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise any aspect of this procurement solicitation: **January 27, 2020, 2:00 p.m. Central Time**
7. Bids submittal deadline and scheduled opening: **February 4, 2020, 2:00 p.m. Central Time**
8. Tentative date of release of City's tabulation of bids received and notice of intent to award: **February 14, 2020**
9. Tentative date of award: Meeting of Board of Mayor and Aldermen at which is tentatively scheduled to be awarded the selection of the lowest and best responsive and responsible bid: **February 25, 2020**

10. Addendum:

In reference to the City of Franklin's January 2, 2020 Purchasing Office Solicitation No. 2020-017 for Holiday Court sewer system improvements, the City has determined that certain aspects of the solicitation need to be further revised by releasing Section C-300 ("State Contractor License Information Form"). The purpose of this Addendum No. 2 is to release Section C-300 which is attached to this Addendum No. 2.

Please note that the submittal deadline and scheduled opening of all bids received remains unchanged and is:

February 4, 2020, 2:00 p.m. Central Time

City of Franklin Addendum No. 2 to

Purchasing Office Solicitation No.: 2020-017

11. Acknowledge addendum: Bidders shall acknowledge this addendum on their submitted Bid Form.

12. Questions seeking to clarify or revise the procurement solicitation: Questions seeking to clarify or revise any aspect of the procurement solicitation shall be submitted by contacting:

City of Franklin Purchasing Office

Franklin City Hall, Suite 107

109 3rd Ave. South

Franklin, TN 37064

purchasing@franklintn.gov

Tel: 615-550-6692

Fax: 615-550-0079

Such questions of a non-procedural nature shall be submitted before the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise the procurement solicitation.

Such questions of a procedural nature may be submitted either before or after the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise the procurement solicitation.

Depending upon the inquiry, the City may request that the question seeking to clarify or revise any aspect of the procurement solicitation be submitted in writing, and the City may choose to announce, typically in the form of an addendum, both the inquiry and the City's response thereto.

13. Communication with City during procurement phase: Any questions seeking to clarify or revise any aspect of the procurement solicitation should be addressed to the City as described above. Until the procurement award has been made, contractors shall not communicate about either the content of or the procurement process pertaining to this procurement solicitation with any official, employee or other representative of the City except through the City's Purchasing Office. The City reserves the right to disqualify any contractor that initiates unauthorized communication with the City during the procurement phase (that is, the period of time between when the procurement solicitation has been posted on the [Business Opportunities webpage](https://www.franklintn.gov) of the City's website (<https://www.franklintn.gov/>) and when the procurement award has been made).

SECTION C-300**STATE CONTRACTOR LICENSE INFORMATION FORM***Complete applicable portions of this form and attach to the outside of envelope containing the Bid***Bidder/Prime Contractor Name:** _____

Street Address: _____

City, State, Zip: _____

If bid amount is \$25,000 or greater, Bidder shall complete Tennessee Contractor License Information:

License No.: _____

Expiration Date: _____

License Classification: _____

License Limit: _____

Electrical Contractor

(should subcontract portion be \$25,000 or greater, Tennessee Contractor License Information shall also be provided)

Name: _____

License No.: _____

License Classification: _____

License Expiration Date: _____

License Limit: _____

Plumbing Contractor

(should subcontract portion be \$25,000 or greater, Tennessee Contractor License Information shall also be provided)

Name: _____

License No.: _____

License Classification: _____

License Expiration Date: _____

License Limit: _____

Heating, Ventilation and Air Conditioning (HVAC) Contractor

(should subcontract portion be \$25,000 or greater, Tennessee Contractor License Information shall also be provided)

Name: _____

License No.: _____

License Classification: _____

License Expiration Date: _____

License Limit: _____

Vertical Closed Loop Geothermal Heating and Cooling Contractor

(should subcontract portion be \$25,000 or greater, Tennessee Contractor License Information shall also be provided)

Name: _____

License No.: _____

License Classification: _____

License Expiration Date: _____

License Limit: _____

Roofing Contractor

(should subcontract portion be \$25,000 or greater, Tennessee Contractor License Information shall also be provided)

Name: _____

License No.: _____

License Classification: _____

License Expiration Date: _____

License Limit: _____

Masonry Contractor

(should subcontract portion be \$100,000 or greater, Tennessee Contractor License Information shall also be provided)

Name: _____

License No.: _____

License Classification: _____

License Expiration Date: _____

License Limit: _____

Per Tennessee Department of Commerce & Insurance Board for Licensing Contractors Rule 0680-01-.24 (2): Award of the subcontract to one not listed on the base bid envelope in violation of T.C.A. §62-6-119 will be subject to review and disciplinary action by the Board.

Contractor's Authorized Agent: _____

EJCDC® C-200, Instructions to Bidders for Construction Contract.

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City of Franklin Addendum No. 3 to

Purchasing Office Solicitation No.: 2020-017

1. Solicitation identified: This Addendum No. 3 applies to the following procurement solicitation:

Holiday Court sewer system improvements

Purchasing Office Solicitation No.: 2020-017

2. Notice to Bidders publication date: **January 2, 2020**
3. Solicitation release date: **January 2, 2020**
4. Addendum No. 1 release date: **January 23, 2020**
5. Addendum No. 2 release date: **January 24, 2020**
6. Deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise any aspect of this procurement solicitation: **January 27, 2020, 2:00 p.m. Central Time**
7. Addendum No. 3 release date: **January 29, 2020**
8. Bids submittal deadline and scheduled opening: **February 4, 2020, 2:00 p.m. Central Time**
9. Tentative date of release of City's tabulation of bids received and notice of intent to award: **February 14, 2020**
10. Tentative date of award: Meeting of Board of Mayor and Aldermen at which is tentatively scheduled to be awarded the selection of the lowest and best responsive and responsible bid: **February 25, 2020**

City of Franklin Addendum No. 3 to

Purchasing Office Solicitation No.: 2020-017

11. Addendum:

In reference to the City of Franklin's January 2, 2020 Purchasing Office Solicitation No. 2020-017 for Holiday Court sewer system improvements, the City has determined that certain aspects of the solicitation need to be further revised, and the City has been asked certain additional questions about the solicitation by one or more contractors who are potential bidders.

The purpose of this Addendum No. 3 is (a) to announce the City's determination to revise the package of front-end documents released with the package of bid solicitation documents, (b) to release Section C-452 ("Contractor / Firm / Business Safety Program") which is attached to this Addendum No. 3, and (c) to announce the City's responses to the additional questions that have been asked since issuance of Addenda Nos. 1 and 2.

Please note that the submittal deadline and scheduled opening of all bids received remains unchanged and is:

February 4, 2020, 2:00 p.m. Central Time

The following document included in the package of bid solicitation documents as previously revised and released with Addendum No. 1 has now been revised and is attached to and released with this Addendum No. 3:

- a. Section C-452 ("Contractor / Firm / Business Safety Program") has been revised on p. 8 of 9 by deleting the name and title of the City official listed for approval.

Below are the additional questions asked since issuance of Addenda Nos. 1 and 2 and the City's responses thereto:

Q1: [Section C-111] ("Advertisement for Bids") [hereafter, "AFB"] describes the scope of work to include CIPP of 956 LF of 30" & 36" diameter sewer, etc. I'm sure the AFB was copied from a previous job and this is just an oversight that will not impact the Holiday Court bid, correct?

A1: Bidders shall disregard the scope of work as indicated in the AFB. By this Addendum No. 3, City hereby revises the scope of work as indicated in the AFB to read as follows:

The Project includes the following Work:

The work to be performed (Work) consists of the installment of approximately 997 linear feet of 6-inch diameter DIP Pressure Class 350 with Protecto 401 lining force main, demolition of an existing sewer lift station and installation of a new 300 gpm sanitary sewer lift station, 10-inch dip gravity sewer pipe, manhole(s) installation, SCADA installation and pavement / concrete repair as shown on the contract drawings and specifications. Contractor shall provide all necessary materials, labor and equipment to complete the Work.

City of Franklin Addendum No. 3 to

Purchasing Office Solicitation No.: 2020-017

Q2: The AFB also states that two sets of bidding documents, one original and one copy, shall be submitted, although Article 14 refers to only one set.

A2: Bidders shall disregard the number of sets of bidding documents as indicated in the AFB; Article 14 (“Submittal of Bid”) of Section C-200 (“Instructions to Bidders for Construction Contract”) accurately reflects the City’s requirements regarding the number of sets of bidding documents.

Q3: The AFB states that each bidder must include with the bid a completed and signed Statement of Qualifications, Contractor Safety Information and Acknowledgement of Receipt of Contractor Safety Program. Articles 3.01 and 3.02, under [Section] C-200, state that written evidence of bidder’s qualifications to be submitted within seven days of Owner’s request, while Article 3.03 [of Section C-200] states this information be submitted with the Bid. I note that Article 2, under [Section] C-410, lists all documents to be submitted with the bid. We respectfully request approval to submit our “summarized” qualification statement with our bid. We can provide detailed information if the City requests such.

A3: Bidders shall disregard any aspect of the AFB inconsistent with other sections of the front-end documents for the Holiday Court sewer system improvements. City declines the Q3 request for approval to submit a “summarized” qualification statement with the bid. By this Addendum No. 3, City hereby revises Article 3 (“Qualifications of Bidders”) of Section C-200 (“Instructions to Bidders for Construction Contract”) to read as follows:

3.01 ~~To demonstrate Bidder’s qualifications to perform the Work, after submitting its Bid and within seven days of Owner’s request, Bidder must submit the following information:~~[This subsection deleted.]

~~A. Evidence of Bidder’s authority to do business in the state where the Project is located.~~

~~B. Bidder’s and Subcontractor(s)’ state or other contractor license number, if applicable.~~

~~C. Subcontractor and Supplier qualification information, if required by Article 12 of these Instructions, “Subcontractors, Suppliers and Others.~~

3.02 ~~To demonstrate Bidder’s qualifications to perform the Work, after submitting its Bid and within seven days of Owner’s request, Bidder shall submit within seven days of Owner’s request (a) written evidence establishing its qualifications such as financial data, previous experience, and present commitments, and (b) the following additional information:~~

~~A. Bidder registration as a vendor with the City of Franklin. Subcontractor(s)’ state or other contractor license number, if applicable.~~

~~B. Bidder’s valid City of Franklin and Williamson County, Tennessee business licenses.~~

City of Franklin Addendum No. 3 to

Purchasing Office Solicitation No.: 2020-017

- 3.03 Bidder is to submit the following information with its Bid to demonstrate Bidder's qualifications to perform the Work:
 - A. Written evidence establishing its qualifications such as financial data, previous experience, and present commitments.
 - B. A written statement that Bidder is authorized to do business in the state where the Project is located, or a written certification that Bidder will obtain such authority prior to the Effective Date of the Contract.
 - C. Bidder's state or other contractor license number, if applicable.
 - D. Subcontractor and Supplier qualification information, if required by Article 11 ("Subcontractors, Suppliers and Others") of these Instructions.
 - E. Other required information regarding qualifications.
- 3.04 A Bidder's failure to submit required qualification information within the times indicated may disqualify Bidder from receiving an award of the Contract.
- 3.05 No requirement in this Article 3 to submit information will prejudice the right of Owner to seek additional pertinent information regarding Bidder's qualifications.

City of Franklin Addendum No. 3 to

Purchasing Office Solicitation No.: 2020-017

12. Acknowledge addendum: Bidders shall acknowledge this addendum on their submitted Bid Form.

13. Questions seeking to clarify or revise the procurement solicitation: Questions seeking to clarify or revise any aspect of the procurement solicitation shall be submitted by contacting:

City of Franklin Purchasing Office
Franklin City Hall, Suite 107
109 3rd Ave. South
Franklin, TN 37064
purchasing@franklinton.gov
Tel: 615-550-6692
Fax: 615-550-0079

Such questions of a non-procedural nature shall be submitted before the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise the procurement solicitation.

Such questions of a procedural nature may be submitted either before or after the deadline for optional submittal in writing of questions of a non-procedural nature seeking to clarify or revise the procurement solicitation.

Depending upon the inquiry, the City may request that the question seeking to clarify or revise any aspect of the procurement solicitation be submitted in writing, and the City may choose to announce, typically in the form of an addendum, both the inquiry and the City's response thereto.

14. Communication with City during procurement phase: Any questions seeking to clarify or revise any aspect of the procurement solicitation should be addressed to the City as described above. Until the procurement award has been made, contractors shall not communicate about either the content of or the procurement process pertaining to this procurement solicitation with any official, employee or other representative of the City except through the City's Purchasing Office. The City reserves the right to disqualify any contractor that initiates unauthorized communication with the City during the procurement phase (that is, the period of time between when the procurement solicitation has been posted on the [Business Opportunities webpage](https://www.franklinton.gov) of the City's website (<https://www.franklinton.gov>) and when the procurement award has been made).

SECTION C-452**CONTRACTOR/FIRM/BUSINESS SAFETY PROGRAM****1. PURPOSE**

This program is designed to set safety and health expectations and establish a screening process so that The City of Franklin may hire and use Contractors/Firms/Businesses who accomplish the desired job tasks without compromising the safety and health of employees. The Contractor/Firm/Business must assure that contract employees are trained on: performing the job safely, of the hazards related to the job, and other applicable provisions of the OSHA Standards. The program is a systematic approach that must be used to evaluate Contractor/Firm/Business personnel used in the conduct of business at the City of Franklin.

The City of Franklin does not take responsibility for the safety of the Contractor's/Firm's/Business' employees. Nor does the City take responsibility for instructing Contractors/Firms/Businesses on how to perform work. Rather, this program spells out what is expected of Contractors/Firms/Businesses conducting work for the City of Franklin.

Contractors/Firms/Businesses are defined as non-city government individuals or businesses that are retained by the City to provide specific labor or services.

2. RESPONSIBILITIES OF THE CONTRACTOR/FIRM/BUSINESS

Contractor/Firm/Business compliance with all state and federal occupational safety and health standards is a condition of doing business with the City of Franklin. Contractors/Firms/Businesses have the responsibility to:

- Conduct daily safety inspections of all assigned areas.
- Identify and correct hazards within their responsibility and report hazards to the city.
- Provide Contractor/Firm/Business employees with personal protective equipment as needed to safely perform contracted tasks.
- Ensure Contractor/Firm/Business employees have the training for assigned tasks as is required by state and federal occupational safety and health standards.
- Coordinate with City Health and Safety Manager for safety related issues that may affect city operations.
- Establish and maintain an effective safety and health program for Contractor/Firm/Business employees.
- Establish and maintain an effective safe housekeeping program.
- Make available for inspection by the City any written safety programs, safety data sheets, training records and other safety-related documents.

3. MONITORING AND INSPECTIONS

All Contractors/Firms/Businesses and subcontractors working under contract with the City of Franklin are subject to regular safety, health and environmental monitoring by the City.

4. HAZARDOUS CHEMICAL / SUBSTANCE NOTIFICATION

Contractors/Firms/Businesses must follow state and federal Occupational Safety and Health Administration Hazard Communication standard requirements including use, safe handling and storage of chemicals. Contractors/Firms/Businesses are required to inform the City of all hazardous substances which may be brought on to City property, including providing the most current Safety Data Sheet (MSDS)/(SDS) for each substance. All spills and leaks of hazardous chemicals shall be immediately reported to the City Health & Safety Manager.

5. WORK ZONE TRAFFIC CONTROL

All Contractors/Firms/Businesses conducting work which involve traffic control in the public way shall comply with the Federal Highway Administration's Manual on Uniform Traffic Control Devices. The City Traffic Engineer (615-791-3218) should also be contacted prior to commencing operations. This measure is to insure the safety of workers and the public.

6. DUE REGARD FOR THE PUBLIC

All Contractors/Firms/Businesses and their employees while engaged in work for the City of Franklin shall exercise due regard and reasonable care for the safety of the public.

7. OTHER POLICIES AND PROCEDURES

All Contractor/Firm/Business employees shall adhere to all City policies and procedures, including but not limited to: access to City facilities and equipment, use of controlled substances, firearm & explosive restrictions, harassment of other persons, traffic and parking regulations.

8. CONTACT INFORMATION FOR CITY SAFETY COORDINATOR

Contact the Occupational Health and Safety Trainer (Human Resources), Franklin, TN 37064, (615) 615- 3216 ext: 6984, Email: chris.edwards@franklintn.gov

9. ENVIRONMENTAL, SAFETY AND HEALTH SOURCES OF INFORMATION

- TENNESSEE OSHA: <https://www.tn.gov/workforce/section/tosha>
- FEDERAL OSHA: <https://www.osha.gov/>
- TENNESSEE DEPARTMENT OF ENVIRONMENT & CONSERVATION:
<http://www.tennessee.gov/environment>

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CONTRACTOR/FIRM/BUSINESS SAFETY INFORMATION

PURPOSE: The purpose of this questionnaire is to provide the City of Franklin with necessary information about your company's safety program and performance. All items must be completed.

Company Name: _____

Address: _____

Name of Safety Officer/Director: _____ Phone #: _____
(Person responsible for safety)

Email: _____

1. Provide information regarding Contractor's/Firm's/Business' safety organization and safety performance.

Safety Certifications		
Certification Name	Issuing Agency	Expiration

2. Provide Worker's Compensation Insurance Experience Modification Rate (EMR), Total Recordable Frequency Rate (TRFR) for incidents, and Total Number of Recorded Manhours (MH) for the last 3 years and the EMR, TRFR, and MH history for the last 3 years of any proposed Subcontractor(s) that will provide Work valued at 10% or more of the Contract Price. Provide documentation of the EMR history for Contractor/Firm/Business and Subcontractor(s).

Year									
Company	EMR	TRFR	MH	EMR	TRFR	MH	EMR	TRFR	MH

3. Accident/Injury Experience

Using last year's OSHA 300 Log or Worker's Compensation Documentation, fill in the following:

i) Number of recordable injuries/illnesses _____

ii) Number of restricted work days _____

iii) Number of lost work days _____

iv) Number of fatalities _____

v) Employee hours worked last year _____

vi) Number of injuries/illnesses requiring hospitalization _____

4. Safety Program

i) Does your company have a written safety program?

Yes _____ No _____

ii) Is the program revised/updated annually?

Yes _____ No _____

iii) Does your written program contain a statement that your company abides by all federal (OSHA), state and local rules and regulations relating to safe work practices?

Yes _____ No _____

iv) Do you have a new hire orientation program pertaining to safety training?

Yes _____ No _____

v) Does it include any training on the following? (If your company has a handbook, please submit a copy).

Yes _____ No _____

Head Protection

Eye Protection

Hearing Protection

Respiratory Protection

Fall Protection

Scaffolding

Housekeeping

Fire Protection

Confined Space Entry

Emergency Procedures

Hazardous Substances

Trench & Evacuation

Barricades

Electrical Safety

Rigging & Crane Safety

Hand & Power Tool Safety

Hand Protection

Others

vi) Do you have a foreman safety training program?

Yes _____ No _____ If yes, please include an outline.

vii) Do you conduct regular safety meetings? Yes _____ No _____

viii) How often? _____ Are records kept? Yes _____ No _____

ix) Do you generate accident investigation reports? Yes _____ No _____

x) Do you perform project safety inspections?

Yes _____ No _____

Who conducts them? Name _____

Job Title _____

How often? _____

5. Lockout/Tagout

Does the work that you are submitting a bid for, involve any "Lockout/Tagout" situations?

Yes _____ No _____

If yes, please submit a copy of your written Lockout/Tagout procedures.

6. Hazard Communication

Does the work that you are submitting a bid for, involve the use of any "Hazardous Substances"?

Yes _____ No _____

If yes, please submit a copy of your written hazard communication program and material safety data sheets for any hazardous substance that you will be using in your work.

7. Confined Spaces

Does the work you are bidding involve working in a "Confined Space"?

Yes _____ No _____

If yes, include your work plan, copies of training certification of the pertinent employees, entry permit and who will be in the confined space permit-required.

8. Elevated Work and Fall Protection

Does the work that you are submitting a bid for, involve any "Elevated Work"?

Yes _____ No _____

If yes, please submit a copy of your fall protection and elevated work rules policy.

9. Powered Industrial Vehicles

i) Does the work that you are submitting a bid for, involve the use of any powered industrial vehicles? (i.e., fork trucks, highlifts, etc.)

Yes _____ No _____

ii) Have designated people been trained on such?

Yes _____ No _____

10. Respiratory Compliance

i) Does your company have a written respiratory program or policy?

Yes _____ No _____

ii) Have employees been fit tested quantitatively or qualitatively?

Yes _____ No _____

iii) Do you have established medical surveillance procedures?

Yes _____ No _____

iv) What type of respiratory training has your employee had?

v) What type of respiratory equipment are they permitted to wear?

11. Key Personnel

List the key onsite people you would use for this project.

Name: _____ Title: _____

Name: _____ Title: _____

For City Use Only

Recommendations:		
Comments:		
Authorization		
Approved:	*YES	NO

* Further detailed on attachment: YES _____ NO _____

I certify that I have conducted a review of the information contained in this questionnaire and approved the contractor/firm/business for the above described work.

Name:	Title:
Signature:	
Date:	Time:

CONTRACTOR / FIRM / BUSINESS ACKNOWLEDGEMENT OF RECEIPT OF

CITY OF FRANKLIN CONTRACTOR/FIRM/BUSINESS SAFETY PROGRAM

Contractor/Firm/Business Name: _____

Contractor's/Firm's/Business' Authorized Safety Representative: _____

Contractor's/Firm's/Business' Authorized Agent: _____
(Printed Name)

I acknowledge receipt of and agree to comply with the City of Franklin's Contractor/Firm/Business Safety Program. I will also make employees and subcontractors aware of City's safety expectations and requirements.

I understand that any accidents, injuries or property damage will be reported to the City Health and Safety Manager within three (3) days.

I also understand that any questions regarding the program can be directed to the contracting department head and/or the City Health & Safety Manager.

I certify that all personnel conducting work have been trained in accordance with Occupational Safety and Health Administration regulation: 29 Code of Federal Regulations §1910/1926.

Contractor's/Firm's/Business' Authorized Agent: _____
(Signature)

Date: _____

SECTION C-410

BID FORM FOR CONSTRUCTION CONTRACT

The terms used in this Bid with initial capital letters have the meanings stated in the Instructions to Bidders, the General Conditions, and the Supplementary Conditions.

ARTICLE 1—OWNER AND BIDDER

1.01 This Bid is submitted to:

City of Franklin
Third Avenue South, Suite
107 Franklin, TN 37064

1.02 The undersigned Bidder proposes and agrees, if this Bid is accepted, to enter into an Agreement with Owner in the form included in the Bidding Documents to perform all Work as specified or indicated in the Bidding Documents for the prices and within the times indicated in this Bid and in accordance with the other terms and conditions of the Bidding Documents.

ARTICLE 2—ATTACHMENTS TO THIS BID

2.01 The following documents are submitted with and made a condition of this Bid:

- A. Required Bid security;
- B. List of Proposed Subcontractors;
- C. List of Proposed Suppliers;
- D. Evidence of authority to do business in the state of the Project;
- E. State Contractor License Information Form (C-300);
- F. Qualifications Statement (C-451) with supporting data;
- G. Contractor/Firm/Business Safety Information and Acknowledgement of Receipt of Contractor/Firm/Business Safety Program (C-452);
- H. Conflict of Interest Statement (C-453);
- I. Drug-Free Workplace Affidavit (C-454);
- J. Attestation Regarding Illegal Immigrants or Aliens (C-455); and
- K. Iran Divestment Act Certification (C-456).

ARTICLE 3—BASIS OF BID

3.01 *Unit Price Bids*

- A. Bidder will perform the following Work at the indicated unit prices:

EJCDC® C-410, Bid Form for Construction Contract.

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HOLIDAY CT. SEWER IMPROVEMENTS

Bid No. 2020-017

Item No.	Description	Unit	Est. Qty.	Bid Unit Price	Bid Amount
1	Sewer Pump Station Complete and Operable	LS	1	\$ 223,225.00	\$ 223,225.00
2	6 inch DIP Pressure Class 350 with PROTECTO 401 Lining and Restraint Grip Gaskets Force Main. Shall including all pipe, valves, fittings, related appurtenances and testing.	LF	997	\$ 154.70	\$ 154,335.90
3	Demolition, Complete	LS	1	\$ 18,867.00	\$ 18,867.00
4	Erosion Control, Clearing, Tree Removal, Fence Replacement, Temporary relocation of sheds or other structures	LS	1	\$ 4,450.00	\$ 4,450.00
5	Mobilization	LS	1	\$ 2,000.00	\$ 2,000.00
6	Yard Piping as per sheet MP3, for 10 inch DIP gravity line, Port Plug Valve and appurtenances, Coring and Invert Reshape MHA-2	LS	1	\$ 33,420.00	\$ 33,420.00
7	Doghouse Manhole A-1, approximate +/-14' depth 4'-0" Diameter	EA	1	\$ 7,591.50	\$ 7,591.50
8	Manhole A-3, approximate +/- 15' depth.	EA	1	\$ 6,844.00	\$ 6,844.00
9	Erosion Control Intermediate/Final	LS	1	\$ 1,700.00	\$ 1,700.00
10	Allowance for Telemetry Relocation	ALLOWANCE			\$ 4,000.00
11	Asphalt Pavement Repair	Sq-ft	5400	\$ 10.00	\$ 54,000.00
12	Concrete Pavement Repair	Sq-ft	1778	\$ 11.50	\$ 20,447.00
13	Undercutting/ Excavation of gravity sewer line and or wetwell where directed by Owner or Engineer including Unclassified Excavation, removal and disposal of unsuitable material, furnishing and installing 2-inch surge stone, including all dewatering, slope protection and shoring.	C.Y.	300	\$ 77.39	\$ 23,217.00
Total of All Unit Price Bid Items				\$ 554,057.40	

TOTAL BID PRICE, EQUAL TO THE SUM OF ITEMS 1 THROUGH 11, IS IN THE AMOUNT OF

five hundred fifty four thousand fifty seven

(words)

dollars + forty cents

DOLLARS

(words)

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B. Bidder acknowledges that:

1. each Bid Unit Price includes an amount considered by Bidder to be adequate to cover Contractor's overhead and profit for each separately identified item, and
2. estimated quantities are not guaranteed, and are solely for the purpose of comparison of Bids, and final payment for all Unit Price Work will be based on actual quantities, determined as provided in the Contract Documents.

ARTICLE 4—TIME OF COMPLETION

- 4.01 Bidder agrees that the Work will be substantially complete and will be completed and ready for final payment in accordance with Paragraph 15.06 of the General Conditions on or before the dates or within the number of calendar days indicated in the Agreement.

4.02 Bidder accepts the provisions of the Agreement as to liquidated damages.

ARTICLE 5—BIDDER'S ACKNOWLEDGEMENTS: ACCEPTANCE PERIOD, INSTRUCTIONS AND RECEIPT OF ADDENDA

5.01 Bid Acceptance Period

- A. This Bid will remain subject to acceptance for 60 days after the Bid opening, or for such longer period of time that Bidder may agree to in writing upon request of Owner.

5.02 Instructions to Bidders

- A. Bidder accepts all of the terms and conditions of the Instructions to Bidders, including without limitation those dealing with the disposition of Bid security.

5.03 Receipt of Addenda

- A. Bidder hereby acknowledges receipt of the following Addenda:

Addendum Number	Addendum Date
1	1/23/2020
2	1/24/2020
3	1/29/2020

ARTICLE 6—BIDDER'S REPRESENTATIONS AND CERTIFICATIONS

6.01 Bidder's Representations

- A. In submitting this Bid, Bidder represents the following:
1. Bidder has examined and carefully studied the Bidding Documents, including Addenda.
 2. Bidder has visited the Site, conducted a thorough visual examination of the Site and adjacent areas, and become familiar with the general, local, and Site conditions that may affect cost, progress, and performance of the Work.
 3. Bidder is familiar with all Laws and Regulations that may affect cost, progress, and performance of the Work.
 4. Bidder has carefully studied the reports of explorations, if any, and tests of subsurface conditions at or adjacent to the Site, if any, and the drawings of physical conditions relating to existing surface or subsurface structures at the Site, if any, that have been identified in the Supplementary Conditions, with respect to the Technical Data in such reports and drawings.

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5. Bidder has carefully studied the reports and drawings relating to Hazardous Environmental Conditions, if any, at or adjacent to the Site that have been identified in the Supplementary Conditions, with respect to Technical Data in such reports and drawings.
6. Bidder has considered the information known to Bidder itself; information commonly known to contractors doing business in the locality of the Site; information and observations obtained from visits to the Site; the Bidding Documents; and the Technical Data identified in the Supplementary Conditions or by definition, with respect to the effect of such information, observations, and Technical Data on (a) the cost, progress, and performance of the Work; (b) the means, methods, techniques, sequences, and procedures of construction to be employed by Bidder, if selected as Contractor; and (c) Bidder's (Contractor's) safety precautions and programs.
7. Based on the information and observations referred to in the preceding paragraph, Bidder agrees that no further examinations, investigations, explorations, tests, studies, or data are necessary for the performance of the Work at the Contract Price, within the Contract Times, and in accordance with the other terms and conditions of the Contract.
8. Bidder is aware of the general nature of work to be performed by Owner and others at the Site that relates to the Work as indicated in the Bidding Documents.
9. Bidder has given Engineer written notice of all conflicts, errors, ambiguities, or discrepancies that Bidder has discovered in the Bidding Documents, and of discrepancies between Site conditions and the Contract Documents, and the written resolution thereof by Engineer is acceptable to Contractor.
10. The Bidding Documents are generally sufficient to indicate and convey understanding of all terms and conditions for performance and furnishing of the Work.
11. The submission of this Bid constitutes an incontrovertible representation by Bidder that without exception the Bid and all prices in the Bid are premised upon performing and furnishing the Work required by the Bidding Documents.

6.02 Bidder's Certifications

A. The Bidder certifies the following:

1. This Bid is genuine and not made in the interest of or on behalf of any undisclosed individual or entity and is not submitted in conformity with any collusive agreement or rules of any group, association, organization, or corporation.
2. Bidder has not directly or indirectly induced or solicited any other Bidder to submit a false or sham Bid.
3. Bidder has not solicited or induced any individual or entity to refrain from bidding.
4. Bidder has not engaged in corrupt, fraudulent, collusive, or coercive practices in competing for the Contract. For the purposes of this Paragraph 8.02.A:
 - a. Corrupt practice means the offering, giving, receiving, or soliciting of anything of value likely to influence the action of a public official in the bidding process.

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- b. Fraudulent practice means an intentional misrepresentation of facts made (a) to influence the bidding process to the detriment of Owner, (b) to establish bid prices at artificial non-competitive levels, or (c) to deprive Owner of the benefits of free and open competition.
- c. Collusive practice means a scheme or arrangement between two or more Bidders, with or without the knowledge of Owner, a purpose of which is to establish bid prices at artificial, non-competitive levels.
- d. Coercive practice means harming or threatening to harm, directly or indirectly, persons or their property to influence their participation in the bidding process or affect the execution of the Contract.

HOLIDAY CT. SEWER IMPROVEMENTS

Bid No. 2020-017

BIDDER hereby submits this Bid as set forth above:

Bidder:

Middle Tennessee Infrastructure, Inc.

(typed or printed name of organization)

By:

Dean Carroll

(individual's signature)

Name:

Dean Carroll

(typed or printed)

Title:

Secretary

(typed or printed)

Date:

2/03/20

(typed or printed)

If Bidder is a corporation, a partnership, or a joint venture, attach evidence of authority to sign.

Attest:

Robin Carroll

(individual's signature)

Name:

Robin Carroll

(typed or printed)

Title:

President

(typed or printed)

Date:

2/03/20

(typed or printed)

Address for giving notices: 105 Homewood Dr. Murfreesboro, TN 37127

Bidder's Contact:

Name:

Dean Carroll

(typed or printed)

Title:

Secretary

(typed or printed)

Phone:

615-428-7780

Email:

midtni@comcast.net

Address:

105 Homewood Dr. Murfreesboro, TN 37127

Bidder's Contractor License No.: (if applicable) 67411 (correction: 64711)

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CONTRACTOR/FIRM/BUSINESS SAFETY INFORMATION

PURPOSE: The purpose of this questionnaire is to provide the City of Franklin with necessary information about your company's safety program and performance. All items must be completed.

Company Name: Middle Tennessee Infrastructure, Inc

Address: 10 S Homewood Dr Murfreesboro, TN 37127

Name of Safety Officer/Director: Tristan Carroll Phone #: 615-624-3014
(Person responsible for safety)

Email: tristan.carroll@midtni.com

1. Provide information regarding Contractor's/Firm's/Business' safety organization and safety performance.

Safety Certifications		
Certification Name	Issuing Agency	Expiration

2. Provide Worker's Compensation Insurance Experience Modification Rate (EMR), Total Recordable Frequency Rate (TRFR) for incidents, and Total Number of Recorded Manhours (MH) for the last 3 years and the EMR, TRFR, and MH history for the last 3 years of any proposed Subcontractor(s) that will provide Work valued at 10% or more of the Contract Price. Provide documentation of the EMR history for Contractor/Firm/Business and Subcontractor(s).

Year	2017			2018			2019		
Company	EMR	TRFR	MH	EMR	TRFR	MH	EMR	TRFR	MH
Middle TN Infra.	.78	0	45284	.76	0	41684	.74	0	48284

3. Accident/Injury Experience

Using last year's OSHA 300 Log or Worker's Compensation Documentation, fill in the following:

- i) Number of recordable injuries/illnesses 0
- ii) Number of restricted work days 0
- iii) Number of lost work days 0
- iv) Number of fatalities 0

v) Employee hours worked last year 48284

vi) Number of injuries/illnesses requiring hospitalization 0

4. Safety Program

i) Does your company have a written safety program?

Yes ☒ No ☐

ii) Is the program revised/updated annually?

Yes ☒ No ☐

iii) Does your written program contain a statement that your company abides by all federal (OSHA), state and local rules and regulations relating to safe work practices?

Yes ☒ No ☐

iv) Do you have a new hire orientation program pertaining to safety training?

Yes ☒ No ☐

v) Does it include any training on the following? (If your company has a handbook, please submit a copy).

Yes ☒ No ☐

Head Protection
Eye Protection
Hearing Protection
Respiratory Protection
Fall Protection
Scaffolding
Housekeeping
Fire Protection
Confined Space Entry

Emergency Procedures
Hazardous Substances
Trench & Evacuation
Barricades
Electrical Safety
Rigging & Crane Safety
Hand & Power Tool Safety
Hand Protection
Others

vi) Do you have a foreman safety training program?

Yes ☒ No ☐ If yes, please include an outline.

*10 Hour Training Course
for the Construction
Industry*

vii) Do you conduct regular safety meetings? Yes ☒ No ☐

viii) How often? weekly Are records kept? Yes ☒ No ☐

ix) Do you generate accident investigation reports? Yes ☒ No ☐

x) Do you perform project safety inspections?

Yes ☒ No ☐

Who conducts them? Name Kelsey Hubbard

Job Title Director of Risk Management at Meridian Safety

How often? monthly

5. Lockout/Tagout

Does the work that you are submitting a bid for, involve any "Lockout/Tagout" situations?

Yes ☐ No ☒

If yes, please submit a copy of your written Lockout/Tagout procedures.

6. Hazard Communication

Does the work that you are submitting a bid for, involve the use of any "Hazardous Substances"?

Yes ☐ No ☒

If yes, please submit a copy of your written hazard communication program and material safety data sheets for any hazardous substance that you will be using in your work.

7. Confined Spaces

Does the work you are bidding involve working in a "Confined Space"?

Yes ☐ No ☒

If yes, include your work plan, copies of training certification of the pertinent employees, entry permit and who will be in the confined space permit-required.

8. Elevated Work and Fall Protection

Does the work that you are submitting a bid for, involve any "Elevated Work"?

Yes ☐ No ☒

If yes, please submit a copy of your fall protection and elevated work rules policy.

9. Powered Industrial Vehicles

i) Does the work that you are submitting a bid for, involve the use of any powered industrial vehicles? (i.e., fork trucks, highlifts, etc.)

Yes ☒ No ☐

ii) Have designated people been trained on such?

Yes ☒ No ☐

10. Respiratory Compliance

i) Does your company have a written respiratory program or policy?

Yes ☐ No ☒

ii) Have employees been fit tested quantitatively or qualitatively?

Yes ☐ No ☐ *N/A*

iii) Do you have established medical surveillance procedures?

Yes ☐ No ☐ *N/A*

iv) What type of respiratory training has your employee had?

N/A

v) What type of respiratory equipment are they permitted to wear?

N/A

11. Key Personnel

List the key onsite people you would use for this project.

Name: John Horstmeyer Title: Superintendent
 Name: Ed Radrick Title: Foreman

For City Use Only

Recommendations:		
Comments:		
Authorization		
Approved:	*YES	NO

* Further detailed on attachment: YES ☐ NO ☐

I certify that I have conducted a review of the information contained in this questionnaire and approved the contractor/firm/business for the above described work.

Name: Wesley Golden	Title: Health & Safety Manager
Signature:	
Date:	Time:

**CONTRACTOR / FIRM / BUSINESS ACKNOWLEDGEMENT OF RECEIPT OF
CITY OF FRANKLIN CONTRACTOR/FIRM/BUSINESS SAFETY PROGRAM**

Contractor/Firm/Business Name: Middle Tennessee Infrastructure, Inc.

Contractor's/Firm's/Business' Authorized Safety Representative: Tristan Carroll

Contractor's/Firm's/Business' Authorized Agent: Dean Carroll
(Printed Name)

I acknowledge receipt of and agree to comply with the City of Franklin's Contractor/Firm/Business Safety Program. I will also make employees and subcontractors aware of City's safety expectations and requirements.

I understand that any accidents, injuries or property damage will be reported to the City Health and Safety Manager within three (3) days.

I also understand that any questions regarding the program can be directed to the contracting department head and/or the City Health & Safety Manager.

I certify that all personnel conducting work have been trained in accordance with Occupational Safety and Health Administration regulation: 29 Code of Federal Regulations §1910/1926.

Contractor's/Firm's/Business' Authorized Agent: 
(Signature)

Date: 2/03/20

SECTION C-453

CONFLICT OF INTEREST STATEMENT

Contractor/Firm/Business Name:

Middle Tennessee Infrastructure, Inc

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Printed Name)

I hereby certify that this bid/proposal is submitted in conformance with the City of Franklin's conflict of interest restrictions. No employee of the City of Franklin, officer, agent, any member of an employee's immediate family or his or her partner has any financial interest or a tangible personal benefit in the profit of any contract, service or other work performed as a result of my submission of this bid/proposal. A conflict of interest would also arise when the parties indicated herein are employed or about to be employed by the person or company submitting this bid/proposal. Additionally, no party indicated herein has an indirect interest in the contract, which is the subject of this bid/proposal*.

In the event I am providing a service** to the City of Franklin, I certify that I have no conflict of interest relating to the service to be provided pursuant to this Request for Proposals (RFP), Request for Qualifications (RFQ) or the project/work.

Should a conflict arise at any time during the duration of the contract, agreement, etc., it is the vendor's responsibility to inform the City of said conflict within 30 days.

Therefore, the undersigned (corporation, partnership, limited liability company, or other business organization or individual) has no conflict of interest, or potential conflict of interest in connection with this proposal or in connection with any contract executed or to be executed, concerning or with response to this RFP/RFQ for this project/work.

* **"Indirect Interest"** means any contract in which an employee has no direct interest however a spouse or relative has an interest in the contract. *A conflict of interest exists if a spouse or relative commingle their assets.* Examples of commingling assets include sharing a joint-checking account or jointly owned property together with a company or person doing business with the City of Franklin.

** **"Service Vendors"** include but are not limited to: architects, engineers, appraisers, surveyors, accountants, etc.

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Signature)

Date:

2/03/20

SECTION C-454

DRUG-FREE WORKPLACE AFFIDAVIT

Contractor/Firm/Business Name:

Middle Tennessee Infrastructure, Inc.

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Printed Name)

(Check applicable box)



I hereby state that, as an employer, I have adopted a Drug-Free Workplace policy, which meets the criteria set forth by the Tennessee Department of Labor and Workforce Development and at a minimum the requirements of the City of Franklin's Drug-Free Workplace program, which includes pre-employment drug testing, reasonable suspicion drug testing and, when applicable, compliance with the U.S. Department of Transportation Procedures for Transportation Workplace Drug Testing Programs as specified in Title 49 of the Code of Federal Regulations (CFR) Part 40 and Title 49 CFR Part 199.

Said Drug-Free Workplace program is in compliance with the Tennessee Drug-Free Workplace Act, Tennessee Code Annotated §50-9-101 *et sequentia*.



I hereby state that I employ less than five (5) employees, and I am not required to submit the Drug-Free Workplace Affidavit.

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Signature)

Date:

2/03/20

SECTION C-455

ATTESTATION REGARDING ILLEGAL IMMIGRANTS or ALIENS

Contractor/Firm/Business Name:

Middle Tennessee Infrastructure, Inc

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Printed Name)

Pursuant to Tennessee Code Annotated §12-3-309, and Section 6-105 of the Official Code of the City of Franklin, I (we), the Contractor/Firm/Business identified above, hereby attest, certify, warrant and assure that I (we) will not knowingly utilize the services of any illegal immigrant or alien in the performance of this Contract, and will not knowingly utilize the services of any subcontractor who will utilize the services of an illegal immigrant or alien in the performance of this Contract.

Contractor's/Firm's/Business' Authorized Agent:



(Signature)

Date:

2/03/20

SECTION C-456

IRAN DIVESTMENT ACT CERTIFICATION

Contractor/Firm/Business Name:

Middle Tennessee Infrastructure, Inc.

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Printed Name)

By submission of this bid/proposal, each contractor/firm/business and each person signing on behalf of the contractor/firm/business certifies, and in the case of a joint bid/proposal each party thereto certifies as to its own organization, under penalty of perjury, that to the best of its knowledge and belief that each contractor/firm/business is not on the list created pursuant to Tennessee Code Annotated §12-12-106 in reference to the Iran Divestment Act.

This act prohibits a person identified on the list from contracting with a local government and makes any contract entered into void. The State of Tennessee list can be found at: <https://www.tn.gov/generalservices/procurement/central-procurement-office--cpo-/library-/public-information-library.html>.

The undersigned hereby certifies that he or she is authorized by the contractor/firm/business to certify that his/her company is not on the list.

Contractor's/Firm's/Business' Authorized Agent:

Dean Carroll

(Signature)

Date:

2/03/20

Tabulation of Bid Line-Item Pricing for
Holiday Court sewer system improvements (Sol. No. 2020-017)

Item No.	Description	Unit	Estimated Quantity	Civil Constructors, LLC		Middle Tennessee Infrastructure, Inc.		W & O Construction, Inc.	
				Bid Unit Price	Bid Amount	Bid Unit Price	Bid Amount	Bid Unit Price	Bid Amount
1	Sewer Pump Station Complete and Operable	LS	1	\$250,925.00	\$250,925.00	\$223,285.00	\$223,285.00	\$322,500.00	\$322,500.00
2	6 inch DIP Pressure Class 350 with PROTECTO 401 Lining and Restraint Grip Gaskets Force Main. Shall including all pipe, valves, fittings, fittings, related appurtenances and testing.	LF	997	\$123.50	\$123,129.50	\$154.70	\$154,235.90	\$120.00	\$119,640.00
3	Demolition, Complete	LS	1	\$19,936.00	\$19,936.00	\$18,867.00	\$18,867.00	\$15,000.00	\$15,000.00
4	Erosion Control, Clearing, Tree Removal, Fence Replacement, Temporary relocation of sheds or other structures	LS	1	\$28,446.00	\$28,446.00	\$4,450.00	\$4,450.00	\$6,000.00	\$6,000.00
5	Mobilization	LS	1	\$10,683.00	\$10,683.00	\$2,000.00	\$2,000.00	\$35,000.00	\$35,000.00
6	Yard Piping as per sheet MP3, for 10 inch DIP gravity line, Port Plug Valve and appurtenances, Coring and Invert Reshape MHA-2	LS	1	\$95,701.00	\$95,701.00	\$33,420.00	\$33,420.00	\$20,000.00	\$20,000.00
7	Doghouse Manhole A-1, approximate +/-14' depth 4'-0" Diameter	EA	1	\$13,268.00	\$13,268.00	\$7,591.50	\$7,591.50	\$11,000.00	\$11,000.00
8	Manhole A-3, approximate +/- 15' depth.	EA	1	\$13,937.00	\$13,937.00	\$6,844.00	\$6,844.00	\$10,000.00	\$10,000.00
9	Erosion Control Intermediate/Final	LS	1	\$13,353.00	\$13,353.00	\$1,700.00	\$1,700.00	\$6,000.00	\$6,000.00
10	Allowance for Telemetry Relocation	n/a	1	\$4,000.00	\$4,000.00	\$4,000.00	\$4,000.00	\$4,000.00	\$4,000.00
11	Asphalt Pavement Repair	Sq-ft	5400	\$6.00	\$32,400.00	\$10.00	\$54,000.00	\$6.00	\$32,400.00
12	Concrete Pavement Repair	Sq-ft	1778	\$11.65	\$20,713.70	\$11.50	\$20,447.00	\$23.00	\$40,894.00
13	Undercutting/ Excavation of gravity sewer line and or wetwell where directed by Owner or Engineer including Unclassified Excavation, removal and disposal of unsuitable material, furnishing and installing 2-inch surge stone, including all dewatering, slope protection and shoring.	C.Y.	300	\$69.00	\$20,700.00	\$77.39	\$23,217.00	\$40.00	\$12,000.00
Grand Totals:					\$647,192.20		\$554,057.40		\$634,434.00



City of Franklin

109 3rd Ave S
Franklin, TN 37064
(615)791-3217

Master

File Number: 19-1203

File ID: 19-1203

Type: Contract/Agreement

Status: Passed

Version: 1

**Agenda
Section:**

In Control: Board of Mayor &
Aldermen

File Created: 11/08/2019

Subject: procurement award for Holiday Court sewer system
improvements

Final Action: 03/10/2020

Title: Consideration Of Procurement Award To Middle Tennessee Infrastructure, Inc. Of Murfreesboro, Tennessee In The Total Amount Of \$554,057.40 For Holiday Court Sewer System Improvements For The Sewer-General Division Of The Water Management Department (Purchasing Office Procurement Solicitation No. 2020-017; City Project No. 2019-016; \$500,000 Budgeted In 431-89320-52219 For Fiscal Year 2020; City Contract No. 2019-0310) (WS 2/25/20)

Internal Notes:

Sponsors: Michelle Hatcher and Brian Goodwin

Enactment Date:

Attachments: 2020-017 Tabulation of bids 2020.02.19.1119,
2019-0310 C-520 Agreement with all but attachments
2a, 2b and 9c.Law Reviewed, 2020-017 Tabulation of
bid line-item pricing 2020.02.06

Res/Ord Number:

Recommendation:

Hearing Date:

Drafter: brianw@franklintn.gov

Effective Date:

Related Files:

History of Legislative File

Ver- sion:	Acting Body:	Date:	Action:	Sent To:	Due Date:	Return Date:	Result:
1	Work Session	02/11/2020	referred	Work Session	02/25/2020		
	Action Text: This Contract/Agreement was referred to the Work Session meeting on 2/25/2020.						
1	Work Session	02/25/2020	referred as a Consent Item	Board of Mayor & Aldermen	03/10/2020		
	Action Text: This Contract/Agreement was referred as a Consent Item to the Board of Mayor & Aldermen meeting on 3/10/2020.						
1	Board of Mayor & Aldermen	03/10/2020	approved				
	Action Text: A motion was made by Alderman Bransford, seconded by Alderman Martin, that this Contract/Agreement be approved. The motion carried by a unanimous vote.						

Text of Legislative File 19-1203

DATE: February 19, 2020

TO: Board of Mayor and Aldermen

FROM: Eric S. Stuckey, City Administrator
Mark Hilty, Assistant City Administrator - Public Works
Kristine Brock, Assistant City Administrator / CFO
Michelle Hatcher, PE, Director, Water Management Department
Brian Goodwin, PE, Assistant Director, Water Management Department
Brian Wilcox, Purchasing Manager

SUBJECT:

Consideration Of Procurement Award To Middle Tennessee Infrastructure, Inc. Of Murfreesboro, Tennessee In The Total Amount Of \$554,057.40 For Holiday Court Sewer System Improvements For The Sewer-General Division Of The Water Management Department (Purchasing Office Procurement Solicitation No. 2020-017; City Project No. 2019-016; \$500,000 Budgeted In 431-89320-52219 For Fiscal Year 2020; City Contract No. 2019-0310) (WS 2/25/20)

Purpose

The purpose of this procurement is to purchase Holiday Court sewer system improvements for the Wastewater Collection Division of the Water Management Department. The primary purpose of the improvements is to rehabilitate the Holiday Court sanitary sewer pump or lift station which staff estimates was constructed in the early 1980s and has outlived its expected service life.

Background

The City published on January 2, 2020 a Notice to Bidders in the *Williamson Herald* for Holiday Court sewer system improvements. In addition, bid documents were sent on or about the same date directly to seven (7) potential bidders known or thought to be interested in this solicitation. Bids from three (3) contractors were publicly opened at the bid opening held on February 4, 2020. Both a tabulation of the bids received for this solicitation and a tabulation of bid line-item pricing are attached.

Financial Impact

The responsible bidder that submitted the lowest priced responsive bid is Middle Tennessee Infrastructure, Inc. of Murfreesboro, Tennessee, in the total amount of \$554,057.40 for the specified project. This bid was identified because it is the lowest bid that meets or exceeds the City's intention as expressed and implied by the City's specifications as well as the instructions, terms and conditions pertaining to this procurement solicitation. The engineer's October 9, 2017 opinion of construction cost is, in total, \$564,000. The Water Management Department Sewer-General Division budget for fiscal year 2020 allocates \$500,000 out of the Sewer Fund for the Holiday Court lift station rehabilitation. The Middle Tennessee Infrastructure, Inc. bid amount is \$54,057.40 (about 10.8%) over budget.

Options

In accordance with the bid documents, the City reserves the right to reject any and all bids.

Recommendation

Staff recommends that the City accept, contingent upon Law Department and City Administrator approval of City Contract No. 2019-0310, the apparent lowest best bid, from Middle Tennessee Infrastructure, Inc. of Murfreesboro, Tennessee, in the total amount of \$554,057.40 for the specified project, and award this procurement to this bidder. The City's Purchasing Manager believes the prepared solicitation documents as distributed allowed for competition among multiple service providers, and that the staff recommendation appears to be made in a fair and impartial manner based upon the proposals received. Pursuant to authority previously granted by the Board of Mayor and Aldermen, Contract No. 2019-0310 has been prepared for execution by the City Administrator and is attached pending approval by the Board of Mayor and Aldermen of the staff recommendation to accept the bid from and award the procurement to Middle Tennessee Infrastructure, Inc.