

RESOLUTION 24-94

**A RESOLUTION TO AUTHORIZE MAYOR TO EXECUTE A TASK ORDER
EXTENSION WITH THOMAS AND HUTTON FOR THE WATER AND SEWER
CAPACITY STUDY**

WHEREAS, the City of Spring Hill authorized Thomas & Hutton to prepare a water and sewer capacity study through Resolution 22-175; and

WHEREAS, Thomas & Hutton have requested additional funding for engineering services beyond the original scope of work as detailed in the attached letter and extension request: and

WHEREAS, there is budget available in 410-52503-59121 to accommodate the request of an additional \$95,000; and

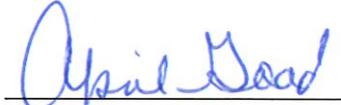
NOW, THEREFORE, BE IT RESOLVED, that the Board of Mayor and Aldermen of the City of Spring Hill authorizes the following action:

1. Approval of the Professional Services Task Order Extension with Thomas and Hutton for a lump sum fee of \$95,000.00.
2. To authorize the Mayor to execute the agreement with Thomas and Hutton.

Passed and adopted by the Board of Mayor and Aldermen of the City of Spring Hill, Tennessee on this 6th day of May, 2024.


Jim Hagaman, Mayor

ATTEST:



April Goad, City Recorder

LEGAL FORM APPROVED:



Patrick Carter, City Attorney



502 HAZELWOOD DRIVE
SMYRNA, TN 37167 | 615.220.5800
WWW.THOMASANDHUTTON.COM

Mr. Dan Allen, P.E.
Assistant City Administrator
199 Town Center Parkway,
Spring Hill, TN 37174

RE: Water and Sewer Capacity Studies
Water and Sewer Model Updates
Task Order Contract Extension

March 7, 2024

Dear Mr. Allen,

Thomas & Hutton (T&H) appreciates the opportunity the City of Spring Hill (City) has given us to provide engineering services for you and your team on the Water and Sewer Capacity Studies, which included updates to the water and sewer models. T&H recognizes the importance of this project to the City and has exercised tremendous efforts in prioritizing this project and ensuring the most accurate results. Our T&H team have spent numerous days, evenings, nights and weekends focusing on completing the project, with accuracy and attention to detail.

As you are aware, T&H has exceeded the project contract budget that was set by our team and approved by the Board of Mayor and Alderman (BOMA). We recognize that it is our responsibility to complete this project based on the proposed scope and tasks agreed too. We have continued to utilize our staff to fully complete the project goals, even though the current contract funds were expended in 2023. We understand that the project scope and tasks are fully our responsibility, however there were several significant items that we feel were beyond the expected scope of work for this project, which are summarized below.

Sewer - Engineering Services were required beyond the original scope of services largely due to extensive GIS work that was required by Thomas & Hutton to integrate the latest GIS data into the model update. Services included:

- verification of missing and incorrect GIS data,
- conversion of manhole invert data to pipe data files,
- comparison of topographic data with top of casting elevations causing errors in model runs,
- review of geocoded data and outlier accounts, and correction of geocoding.
- Verification of invert data and correction of pipe profiles to ensure proper model operation.

Water - Engineering Services were required beyond the original scope of services as after the initial calibration of data from City performed hydrant flow tests it was determined that the flow tests had not been performed as requested. Once the issue was identified, the hydrant flow tests were re-performed by City staff, which required the following additional services:

- recreation of all SCADA data for the days that the hydrants were re-flowed,
- redevelopment of diurnal patterns and flow mass balance of system data,
- Re-calibration of 60 hydrant flow tests for steady-state model runs,
- EPS recalibration using the second set of hydrant flow tests.

Additionally, inconsistencies in the GIS data required corrections to join overlapping and unconnected pipes, valves and hydrants, as well as incorporate as-built data from previous CIP projects to ensure accuracy of the pipe network and system operation.

This additional work was necessary for the models to function and operate. Also, this additional work will benefit the City as the updates can be incorporated into the City's GIS data.

T&H attempted to perform this work under the existing contract budget, however these additional tasks took a significant effort beyond the original estimates. T&H has continued to provide services to complete the project and provide the deliverables expected. However, due to the additional services that were required, we request a contract extension for the amounts described in the attached task order proposal. This request includes a lump sum amount of \$45,000.00 for water (project number 28298.0050) and \$50,000.00 for sewer (project number 28298.0051) for a total amount of \$95,000.00.

We understand this is a significant request and will be happy to set up a meeting to discuss this with you and our management team. We value the City as an important client and want to ensure that this project met your expectations and that the highest level of service was provided.

Respectfully,



Thomas & Hutton
Ryan Chamblee, P.E.
Project Manager



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Spring Hill, TN
Water and Sewer Capacity Studies
Water and Sewer Models Update
Task Order Contract Extension

Task Order No:	28298.0050 (Water) 28298.0051 (Sewer)
Date:	3-7-2024

The **Professional Service Agreement - Task Order Contract Extension** between the City of Spring Hill and Thomas & Hutton for Professional Engineering Services to Update the Water and Sewer Capacity Studies and Models. This task order contract extends the task order signed approved by the City on August 1st, 2022.

Task Description: **Water and Sewer Capacity Study Update Extension**
Water Model Update
Sewer Model Update

Contact: Dan Allen
 Assistant City Administrator

Scope of Services: Sewer

Engineering Services were required beyond the original scope of services largely due to extensive GIS work that was required by Thomas & Hutton to integrate the latest GIS data into the model update. Services included verification of GIS data, conversion of manhole invert data to pipe data files, comparison of topographic data with top of casting elevations, review of geocoded data and outlier accounts, and correction of geocoding. The additional work also included verification of invert data and correction of pipe profiles to ensure proper model operation.

Water

Engineering Services were required beyond the original scope of services as after the initial calibration of data from City performed hydrant flow tests it was determined that the flow tests had not been performed as requested. Once the issue was identified, the hydrant flow tests were re-performed by City staff, which required recreation and re-calibration of all SCADA data for the days that the hydrants were re-flowed. Additionally, inconsistencies in the GIS data required corrections to join overlapping and unconnected pipes, valves and hydrants, as well as incorporate as-built data from previous CIP projects to ensure accuracy of the pipe network and system operation.

This additional work performed by Thomas & Hutton will be beneficial to Spring Hill to be able to incorporate these updates into the City's GIS data.

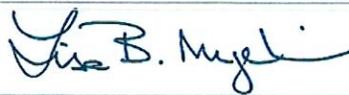
- Deliverables:**
- Updated Water and Sewer Capacity Study to Include Technical Memorandum Revisions
 - Updated Water and Sewer Models

Water Capacity Study and Model Update Extension:	Lump Sum	\$ 45,000.00
Sewer Capacity Study and Model Update Extension:	Lump Sum	\$ 50,000.00

Total Task Order Amount: \$ 95,000.00

This Agreement hereby amends the above referenced Professional Services Agreement between Thomas & Hutton and the City of Spring Hill and supersedes all prior written or oral understandings. This Agreement of Services may only be amended, supplemented, modified, or cancelled by a duly executed written instrument.

IN WITNESS WHEREOF, the parties hereto have made and executed this Agreement as of the day first written above.

Client:	CITY OF SPRING HILL	Engineer:	THOMAS & HUTTON
Signed:		Signed:	
Name:	Tim Hagan	Name:	Lisa Muzekari, P.E.
Title:	Mayor	Title:	Principal/ Environmental Leader
Date:	5-6-2024	Date:	3/7/2024