



City of San Antonio

Agenda Memorandum

File Number:21-1615

Agenda Item Number: 27.

Agenda Date: 4/1/2021

In Control: City Council A Session

DEPARTMENT: Public Works

DEPARTMENT HEAD: Razi Hosseini, P.E., R.P.L.S.

COUNCIL DISTRICTS IMPACTED: Citywide

SUBJECT:

Interlocal Agreement: Predictive Flood Modeling

SUMMARY:

An ordinance authorizing the execution of an Interlocal Agreement between the City of San Antonio and the San Antonio River Authority (SARA) for the development and use of a predictive flood modeling system.

BACKGROUND INFORMATION:

The City of San Antonio (City) and San Antonio River Authority (SARA) have worked with other local governmental entities since 2004 as part of an Interlocal Agreement which formed the regional management program known as the Bexar Regional Watershed Management Program (BRWM) to deliver regional flood control, drainage, and storm water and water quality projects and services to more effectively address associated public safety and resource management issues.

The mutual benefit to the City and SARA is that computerized mapping of timely flood warnings and forecasting is available during declared emergencies. The City is responsible for protecting its citizens and public safety personnel from potential emergency flood situations by warning of any flooding or high water danger while guaranteeing adequate information about changing high water and flood conditions.

SARA previously procured a hydrological and hydrodynamic modeling application to provide flood simulations to improve emergency response and warning, co-funded with the City's Office of Emergency Management through an Interlocal Agreement approved by Ordinance 2012-08-02-0562. This agreement was

terminated in May 2020 in anticipation of the current proposed Interlocal Agreement for an updated forecasting system. The City has received regular updates and demonstrations from SARA regarding the new flood modeling system since SARA initiated their current flood modeling process in 2019.

The current system will provide flood modeling for the San Antonio River, Leon Creek, Salado Creek, Upper Cibolo Creek, Calaveras Creek, Martinez B Creek, Lower San Antonio Creek and Lower Medina River. Full functionality of the predictive flood modeling system is anticipated by the end of Summer 2021.

ISSUE:

This ordinance authorizes the execution of an Interlocal Agreement between the City of San Antonio and SARA for the development and use of a predictive flood modeling system.

This agreement will establish and promote the cooperative and collaborative development of a predictive flood modeling system. Additionally, it will ensure the coordination of governmental resources and functions to support the project. As part of this agreement, the roles and responsibilities between the City and SARA are described to ensure cooperation and coordination with the implementation of projects and establish procedures to support implementation.

The City will be responsible for sharing requested data and information related to the project including high-water and rainfall detection system's operational status and detail details. The City will incorporate the predicative flood modeling as part of its Emergency Management System. SARA will develop, manage and maintain the predictive flood modeling system and keep the City informed of any updates, modifications or outages.

The City and SARA agree on the value of real-time flood information for establishing situational awareness. Additionally, they agree optimizing each entity's technical and operational resources will equip the City to improve emergency responses to catastrophic flooding to save lives and property. SARA will provide 100% of the initial development funding and subject to budget approval provide additional funding to support the continued maintenance and operation of the predictive flood modeling system.

The scope of work as outlined in this agreement will focus on agency jurisdictions within Bexar County. The initial scope of work consists of SARA's development, implementation and maintenance of a predictive flood modeling system. Additional related work may be authorized in the future through the execution of mutually agreeable task orders. Public communications regarding the use or interpretation of the project will be coordinated by both entities and will be co-branded in a mutually agreeable manner.

ALTERNATIVES:

City Council could choose not to approve the Interlocal Agreement. However, the City would lose the opportunity to coordinate governmental resources and functions to support public safety operations concerning storm water management and practices.

FISCAL IMPACT:

There is no City fiscal impact associated with this Interlocal Agreement.

SARA will provide 100% of the funding for the initial development of the flood modeling system and subject to budget approval, will provide the funding for the system's continued maintenance and operational status. Approval of this ordinance will authorize the City of San Antonio to issue task orders mutually agreed upon by the City and SARA providing upgrades or customizations to the predictive flood model. SARA agrees to complete the final work for each task order. Funding for system upgrades or customizations will be subject to budget approval.

RECOMMENDATION:

Staff recommends approval of this ordinance authorizing an Interlocal Agreement between the City of San Antonio and SARA for the development and use of a predictive flood modeling system.