

**Columbus Consolidated Government Council Meeting  
Agenda Item**

<b>TO:</b>	Mayor and Councilors
<b>AGENDA SUBJECT:</b>	<b>Partnership in Innovation – Community Research Grant Application – Fire &amp; EMS</b>
<b>AGENDA SUMMARY:</b>	Approval is requested to apply for and accept, if awarded, a grant in the amount of \$10,000.00, or as otherwise awarded, from the Community Research Grant Program offered by the Partnership for Innovation. The funds will support the development of digital twin technology to enhance wildland fire research in Muscogee County, in partnership with the Georgia Institute of Technology. No matching funds are required.
<b>INITIATED BY:</b>	<b>Fire/EMS</b>

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**Recommendation:** Approval is requested to apply for and accept, if awarded, a grant in the amount of \$10,000.00, or as otherwise awarded, from the Community Research Grant Program offered by the Partnership for Innovation. The funds will support the development of digital twin technology to enhance wildland fire research in Muscogee County, in partnership with the Georgia Institute of Technology. No matching funds are required.

**Background:** Columbus Fire and Emergency Medical Services (CFEMS) is requesting funds from the Partnership for Innovation to support the development of digital twin technology that will advance wildland fire behavior modeling, research, and situational awareness within Muscogee County. This project builds upon CFEMS’s Digital Vanguard Initiative, which integrates robotics, data analytics, and AI-driven tools to improve public safety operations. The collaboration with the Georgia Institute of Technology will focus on creating a high-fidelity digital replica (“digital twin”) of local wildland-urban interface areas, enabling researchers and emergency responders to simulate wildfire spread, test response strategies, and strengthen predictive modeling for fire prevention and response. The outcome of this initiative will enhance operational readiness, reduce community risk, and provide a foundation for future research and applied technology in wildland fire management across the region.

**Analysis:** The proposed digital twin model will enable CFEMS and Georgia Tech to visualize fire behavior in real-time, integrate GIS and environmental datasets, and test mitigation strategies virtually—without exposing personnel or property to danger. This technology will significantly expand Muscogee County’s capacity for data-driven wildfire preparedness and align with regional and national efforts in predictive fire analytics.

**Financial Considerations:** The total amount requested is \$10,000.00, with no matching funds required. The funds will be used for data collection, modeling software, and technical support necessary to establish the digital twin prototype in collaboration with Georgia Tech.

**Legal Considerations:** The Consolidated Government of Columbus is eligible to receive these funds.

**Recommendation/Action:** Approval is requested for the application for and acceptance, if awarded, a grant request in the amount of \$10,000.00 through the Partnership for Innovation – Community Research Grant

Program to support the development of digital twin technology for wildland fire research, in partnership with Georgia Institute of Technology, with no matching funds required.

**A RESOLUTION  
NO.**

**A RESOLUTION AUTHORIZING THE MAYOR OR HIS DESIGNEE TO APPLY FOR AND ACCEPT, IF AWARDED, A GRANT FROM THE PARTNERSHIP FOR INNOVATION – COMMUNITY RESEARCH GRANT PROGRAM IN THE AMOUNT OF \$10,000.00, OR AS OTHERWISE AWARDED, TO SUPPORT THE DEVELOPMENT OF DIGITAL TWIN TECHNOLOGY FOR WILDLAND FIRE RESEARCH IN MUSCOGEE COUNTY, IN PARTNERSHIP WITH GEORGIA INSTITUTE OF TECHNOLOGY, WITH NO MATCHING FUNDS REQUIRED. THE MULTI-GOVERNMENTAL FUND WILL BE AMENDED BY THE AMOUNT OF THE AWARD.**

**WHEREAS**, the Columbus Fire and Emergency Medical Services Department (CFEMS) seeks to enhance wildland fire readiness and research through the creation of a digital twin model of Muscogee County’s wildland-urban interface areas; and,

**WHEREAS**, the project will be implemented in collaboration with the Georgia Institute of Technology, leveraging their technical expertise in data science and modeling; and,

**WHEREAS**, the grant funds will be used to support the development and application of digital twin technology for wildfire behavior modeling and community resilience planning; and

**WHEREAS**, this grant requires no matching funds.

**NOW, THEREFORE, THE COUNCIL OF COLUMBUS, GEORGIA HEREBY RESOLVES:**

- 1) That the Mayor or his designee is hereby authorized to approve the Partnership for Innovation – Community Research Grant Program application in the amount of \$10,000.00, or as otherwise awarded, to support the development of digital twin technology for wildland fire research in Muscogee County, in partnership with the Georgia Institute of Technology, with no matching funds required.
- 2) That the Multi-Governmental Fund will be amended by the amount of the award.

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Introduced at a regular meeting of the Council of Columbus, Georgia held on the \_\_\_\_\_ day of \_\_\_\_\_ 2025 and adopted at said meeting by the affirmative vote of \_\_\_\_\_ members of said Council.

Councilor Allen voting	_____.
Councilor Anker voting	_____.
Councilor Chambers voting	_____.
Councilor Cogle voting	_____.
Councilor Crabb voting	_____.
Councilor Davis voting	_____.
Councilor Garrett voting	_____.
Councilor Hickey voting	_____.
Councilor Huff voting	_____.
Councilor Tucker voting	_____.

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Lindsey G. McLemore, Clerk of Council

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B.H. “Skip” Henderson III, Mayor