

Application for Federal Assistance

ID: 2896227
Applicant Name: University of Tennessee at Chattanooga
Project Title: Recruiting, Acceleration, Mentorship, Productivity and Sustainability (RAMPS) for Chattanooga
Project Period: 01/01/2021 - 12/31/2023
Federal Funding Requested: \$1,315,440.00
Non-Federal Funding Requested: \$1,316,124.00
Fiscal Year of Funding Requested: 2020
Federal Application Receipt Date: 06/11/2020
Submitted for: FY 2020 Build to Scale Program
Notice of Funding Opportunity Number: EDA-HDQ-OIE-2020-2006455
CFDA Number: 11.020

Application Documents for Review

File Name	Description	Page
Form SF424_2_1-V2.1.pdf	SF-424 Application Cover Sheet from Grants.gov	2
Form SF424A-V1.0.pdf	Budget Information - Non-Construction Programs from Grants.gov	5
Form SF424B-V1.1.pdf	Assurances - Non-Construction Programs from Grants.gov	8
Form CD511-V1.1.pdf	Certification Regarding Lobbying from Grants.gov	10
AttachmentForm_1_2-ATT3-1237-UT Chattanooga FA 082016.pdf	Attachment from Grants.gov	11
Form ProjectNarrativeAttachments_1_2-V1.2.pdf	Attachment from Grants.gov	15
BudgetNarrativeAttachments_1_2-Attachments-1234-FINAL Budget Narrative 6.11.pdf	Attachment from Grants.gov	16
Form BudgetNarrativeAttachments_1_2-V1.2.pdf	Attachment from Grants.gov	32
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This Application Report has non-PDF or "PDF Catalog" embedded attachments. To print the entire application, each embedded attachment must be opened and printed separately.

This Application Report was produced by DoC Grants Online (<https://grantsonline.rdc.noaa.gov>) on 06/26/2020 04:58 PM EDT

Application for Federal Assistance SF-424

* 1. Type of Submission:

- ☐ Preapplication
☒ Application
☐ Changed/Corrected Application

* 2. Type of Application:

- ☒ New
☐ Continuation
☐ Revision

* If Revision, select appropriate letter(s):

* Other (Specify):

* 3. Date Received:

06/11/2020

4. Applicant Identifier:

5a. Federal Entity Identifier:

5b. Federal Award Identifier:

State Use Only:

6. Date Received by State:

7. State Application Identifier:

TENNESSEE

8. APPLICANT INFORMATION:

* a. Legal Name: University of Tennessee at Chattanooga

* b. Employer/Taxpayer Identification Number (EIN/TIN):

1626001636A3

* c. Organizational DUNS:

0035010950000

d. Address:

* Street1:

615 McCallie Ave.

Street2:

* City:

Chattanooga

County/Parish:

Hamilton

* State:

TN: Tennessee

Province:

* Country:

USA: UNITED STATES

* Zip / Postal Code:

37403-2598

e. Organizational Unit:

Department Name:

Division Name:

f. Name and contact information of person to be contacted on matters involving this application:

Prefix:

* First Name:

Meredith

Middle Name:

* Last Name:

Perry

Suffix:

Title: Exec. Director, Research & Sponsored Programs

Organizational Affiliation:

* Telephone Number:

423-425-2232

Fax Number:

* Email: meredith-perry@utc.edu

Application for Federal Assistance SF-424

* 9. Type of Applicant 1: Select Applicant Type:

H: Public/State Controlled Institution of Higher Education

Type of Applicant 2: Select Applicant Type:

Type of Applicant 3: Select Applicant Type:

* Other (specify):

* 10. Name of Federal Agency:

Department of Commerce

11. Catalog of Federal Domestic Assistance Number:

11.020

CFDA Title:

Cluster Grants

* 12. Funding Opportunity Number:

EDA-HDQ-OIE-2020-2006455

* Title:

2020 Build to Scale Program - Full Application

13. Competition Identification Number:

2877445

Title:

Venture Challenge

14. Areas Affected by Project (Cities, Counties, States, etc.):

Add Attachment

Delete Attachment

View Attachment

* 15. Descriptive Title of Applicant's Project:

Recruiting, Acceleration, Mentorship, Productivity and Sustainability (RAMPS) for Chattanooga

Attach supporting documents as specified in agency instructions.

Add Attachments

Delete Attachments

View Attachments

Application for Federal Assistance SF-424**16. Congressional Districts Of:*** a. Applicant * b. Program/Project

Attach an additional list of Program/Project Congressional Districts if needed.

Add Attachment

Delete Attachment

View Attachment

17. Proposed Project:* a. Start Date: * b. End Date: **18. Estimated Funding (\$):**

* a. Federal	<input type="text" value="1,315,440.00"/>
* b. Applicant	<input type="text" value="1,316,124.00"/>
* c. State	<input type="text" value="0.00"/>
* d. Local	<input type="text" value="0.00"/>
* e. Other	<input type="text" value="0.00"/>
* f. Program Income	<input type="text" value="0.00"/>
* g. TOTAL	<input type="text" value="2,631,564.00"/>

*** 19. Is Application Subject to Review By State Under Executive Order 12372 Process?**

- ☐ a. This application was made available to the State under the Executive Order 12372 Process for review on .
- ☐ b. Program is subject to E.O. 12372 but has not been selected by the State for review.
- ☒ c. Program is not covered by E.O. 12372.

*** 20. Is the Applicant Delinquent On Any Federal Debt? (If "Yes," provide explanation in attachment.)**☐ Yes ☒ No

If "Yes", provide explanation and attach

Add Attachment

Delete Attachment

View Attachment

21. *By signing this application, I certify (1) to the statements contained in the list of certifications and (2) that the statements herein are true, complete and accurate to the best of my knowledge. I also provide the required assurances** and agree to comply with any resulting terms if I accept an award. I am aware that any false, fictitious, or fraudulent statements or claims may subject me to criminal, civil, or administrative penalties. (U.S. Code, Title 218, Section 1001)**

☒ ** I AGREE

** The list of certifications and assurances, or an internet site where you may obtain this list, is contained in the announcement or agency specific instructions.

Authorized Representative:

Prefix: * First Name:

Middle Name:

* Last Name:

Suffix:

* Title: * Telephone Number: Fax Number: * Email: * Signature of Authorized Representative: * Date Signed:

BUDGET INFORMATION - Non-Construction Programs

OMB Number: 4040-0006
Expiration Date: 02/28/2022

SECTION A - BUDGET SUMMARY

Grant Program Function or Activity (a)	Catalog of Federal Domestic Assistance Number (b)	Estimated Unobligated Funds		New or Revised Budget		
		Federal (c)	Non-Federal (d)	Federal (e)	Non-Federal (f)	Total (g)
1. 2020 Build to Scale Program - Venture Challenge	11.020	\$	\$	\$ 1,315,440.00	\$ 1,316,124.00	\$ 2,631,564.00
2.						
3.						
4.						
5. Totals		\$	\$	\$ 1,315,440.00	\$ 1,316,124.00	\$ 2,631,564.00

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SECTION B - BUDGET CATEGORIES

6. Object Class Categories	GRANT PROGRAM, FUNCTION OR ACTIVITY				Total (5)
	(1)	(2)	(3)	(4)	
	2020 Build to Scale Program - Venture Challenge				
a. Personnel	\$ 239,448.00	\$	\$	\$	\$ 239,448.00
b. Fringe Benefits	49,791.00				49,791.00
c. Travel	0.00				0.00
d. Equipment	0.00				0.00
e. Supplies	6,000.00				6,000.00
f. Contractual	2,037,687.00				2,037,687.00
g. Construction	0.00				0.00
h. Other	72,039.00				72,039.00
i. Total Direct Charges (sum of 6a-6h)	2,404,965.00				\$ 2,404,965.00
j. Indirect Charges	226,598.00				\$ 226,598.00
k. TOTALS (sum of 6i and 6j)	\$ 2,631,563.00	\$	\$	\$	\$ 2,631,563.00
7. Program Income	\$	\$	\$	\$	\$

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SECTION C - NON-FEDERAL RESOURCES					
(a) Grant Program		(b) Applicant	(c) State	(d) Other Sources	(e)TOTALS
8.	2020 Build to Scale Program - Venture Challenge	\$ 1,316,124.00	\$ 0.00	\$ 0.00	\$ 1,316,124.00
9.					
10.					
11.					
12. TOTAL (sum of lines 8-11)		\$ 1,316,124.00	\$ 0.00	\$ 0.00	\$ 1,316,124.00

SECTION D - FORECASTED CASH NEEDS						
		Total for 1st Year	1st Quarter	2nd Quarter	3rd Quarter	4th Quarter
13. Federal		\$ 448,614.00	\$ 112,154.00	\$ 112,154.00	\$ 112,153.00	\$ 112,153.00
14. Non-Federal		\$ 430,329.00	107,583.00	107,582.00	107,582.00	107,582.00
15. TOTAL (sum of lines 13 and 14)		\$ 878,943.00	\$ 219,737.00	\$ 219,736.00	\$ 219,735.00	\$ 219,735.00

SECTION E - BUDGET ESTIMATES OF FEDERAL FUNDS NEEDED FOR BALANCE OF THE PROJECT					
(a) Grant Program		FUTURE FUNDING PERIODS (YEARS)			
		(b)First	(c) Second	(d) Third	(e) Fourth
16.	2020 Build to Scale Program - Venture Challenge	\$ 448,614.00	\$ 429,854.00	\$ 436,972.00	\$
17.					
18.					
19.					
20. TOTAL (sum of lines 16 - 19)		\$ 448,614.00	\$ 429,854.00	\$ 436,972.00	\$

SECTION F - OTHER BUDGET INFORMATION	
21. Direct Charges: 2404965	22. Indirect Charges: 226598
23. Remarks: UTC's Federally negotiated indirect rate is 36% of modified total direct costs. The most recent rate agreement is included in the additional documents section.	

ASSURANCES - NON-CONSTRUCTION PROGRAMS

Public reporting burden for this collection of information is estimated to average 15 minutes per response, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to the Office of Management and Budget, Paperwork Reduction Project (0348-0040), Washington, DC 20503.

PLEASE DO NOT RETURN YOUR COMPLETED FORM TO THE OFFICE OF MANAGEMENT AND BUDGET. SEND IT TO THE ADDRESS PROVIDED BY THE SPONSORING AGENCY.

NOTE: Certain of these assurances may not be applicable to your project or program. If you have questions, please contact the awarding agency. Further, certain Federal awarding agencies may require applicants to certify to additional assurances. If such is the case, you will be notified.

As the duly authorized representative of the applicant, I certify that the applicant:

1. Has the legal authority to apply for Federal assistance and the institutional, managerial and financial capability (including funds sufficient to pay the non-Federal share of project cost) to ensure proper planning, management and completion of the project described in this application.
2. Will give the awarding agency, the Comptroller General of the United States and, if appropriate, the State, through any authorized representative, access to and the right to examine all records, books, papers, or documents related to the award; and will establish a proper accounting system in accordance with generally accepted accounting standards or agency directives.
3. Will establish safeguards to prohibit employees from using their positions for a purpose that constitutes or presents the appearance of personal or organizational conflict of interest, or personal gain.
4. Will initiate and complete the work within the applicable time frame after receipt of approval of the awarding agency.
5. Will comply with the Intergovernmental Personnel Act of 1970 (42 U.S.C. §§4728-4763) relating to prescribed standards for merit systems for programs funded under one of the 19 statutes or regulations specified in Appendix A of OPM's Standards for a Merit System of Personnel Administration (5 C.F.R. 900, Subpart F).
6. Will comply with all Federal statutes relating to nondiscrimination. These include but are not limited to: (a) Title VI of the Civil Rights Act of 1964 (P.L. 88-352) which prohibits discrimination on the basis of race, color or national origin; (b) Title IX of the Education Amendments of 1972, as amended (20 U.S.C. §§1681-1683, and 1685-1686), which prohibits discrimination on the basis of sex; (c) Section 504 of the Rehabilitation Act of 1973, as amended (29 U.S.C. §794), which prohibits discrimination on the basis of handicaps; (d) the Age Discrimination Act of 1975, as amended (42 U.S.C. §§6101-6107), which prohibits discrimination on the basis of age; (e) the Drug Abuse Office and Treatment Act of 1972 (P.L. 92-255), as amended, relating to nondiscrimination on the basis of drug abuse; (f) the Comprehensive Alcohol Abuse and Alcoholism Prevention, Treatment and Rehabilitation Act of 1970 (P.L. 91-616), as amended, relating to nondiscrimination on the basis of alcohol abuse or alcoholism; (g) §§523 and 527 of the Public Health Service Act of 1912 (42 U.S.C. §§290 dd-3 and 290 ee- 3), as amended, relating to confidentiality of alcohol and drug abuse patient records; (h) Title VIII of the Civil Rights Act of 1968 (42 U.S.C. §3601 et seq.), as amended, relating to nondiscrimination in the sale, rental or financing of housing; (i) any other nondiscrimination provisions in the specific statute(s) under which application for Federal assistance is being made; and, (j) the requirements of any other nondiscrimination statute(s) which may apply to the application.
7. Will comply, or has already complied, with the requirements of Titles II and III of the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970 (P.L. 91-646) which provide for fair and equitable treatment of persons displaced or whose property is acquired as a result of Federal or federally-assisted programs. These requirements apply to all interests in real property acquired for project purposes regardless of Federal participation in purchases.
8. Will comply, as applicable, with provisions of the Hatch Act (5 U.S.C. §§1501-1508 and 7324-7328) which limit the political activities of employees whose principal employment activities are funded in whole or in part with Federal funds.

9. Will comply, as applicable, with the provisions of the Davis-Bacon Act (40 U.S.C. §§276a to 276a-7), the Copeland Act (40 U.S.C. §276c and 18 U.S.C. §874), and the Contract Work Hours and Safety Standards Act (40 U.S.C. §§327-333), regarding labor standards for federally-assisted construction subagreements.
10. Will comply, if applicable, with flood insurance purchase requirements of Section 102(a) of the Flood Disaster Protection Act of 1973 (P.L. 93-234) which requires recipients in a special flood hazard area to participate in the program and to purchase flood insurance if the total cost of insurable construction and acquisition is \$10,000 or more.
11. Will comply with environmental standards which may be prescribed pursuant to the following: (a) institution of environmental quality control measures under the National Environmental Policy Act of 1969 (P.L. 91-190) and Executive Order (EO) 11514; (b) notification of violating facilities pursuant to EO 11738; (c) protection of wetlands pursuant to EO 11990; (d) evaluation of flood hazards in floodplains in accordance with EO 11988; (e) assurance of project consistency with the approved State management program developed under the Coastal Zone Management Act of 1972 (16 U.S.C. §§1451 et seq.); (f) conformity of Federal actions to State (Clean Air) Implementation Plans under Section 176(c) of the Clean Air Act of 1955, as amended (42 U.S.C. §§7401 et seq.); (g) protection of underground sources of drinking water under the Safe Drinking Water Act of 1974, as amended (P.L. 93-523); and, (h) protection of endangered species under the Endangered Species Act of 1973, as amended (P.L. 93-205).
12. Will comply with the Wild and Scenic Rivers Act of 1968 (16 U.S.C. §§1271 et seq.) related to protecting components or potential components of the national wild and scenic rivers system.
13. Will assist the awarding agency in assuring compliance with Section 106 of the National Historic Preservation Act of 1966, as amended (16 U.S.C. §470), EO 11593 (identification and protection of historic properties), and the Archaeological and Historic Preservation Act of 1974 (16 U.S.C. §§469a-1 et seq.).
14. Will comply with P.L. 93-348 regarding the protection of human subjects involved in research, development, and related activities supported by this award of assistance.
15. Will comply with the Laboratory Animal Welfare Act of 1966 (P.L. 89-544, as amended, 7 U.S.C. §§2131 et seq.) pertaining to the care, handling, and treatment of warm blooded animals held for research, teaching, or other activities supported by this award of assistance.
16. Will comply with the Lead-Based Paint Poisoning Prevention Act (42 U.S.C. §§4801 et seq.) which prohibits the use of lead-based paint in construction or rehabilitation of residence structures.
17. Will cause to be performed the required financial and compliance audits in accordance with the Single Audit Act Amendments of 1996 and OMB Circular No. A-133, "Audits of States, Local Governments, and Non-Profit Organizations."
18. Will comply with all applicable requirements of all other Federal laws, executive orders, regulations, and policies governing this program.
19. Will comply with the requirements of Section 106(g) of the Trafficking Victims Protection Act (TVPA) of 2000, as amended (22 U.S.C. 7104) which prohibits grant award recipients or a sub-recipient from (1) Engaging in severe forms of trafficking in persons during the period of time that the award is in effect (2) Procuring a commercial sex act during the period of time that the award is in effect or (3) Using forced labor in the performance of the award or subawards under the award.

SIGNATURE OF AUTHORIZED CERTIFYING OFFICIAL	TITLE
Meredith G Perry	Exec. Director, Research & Sponsored Programs
APPLICANT ORGANIZATION	DATE SUBMITTED
University of Tennessee at Chattanooga	06/11/2020

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Applicants should also review the instructions for certification included in the regulations before completing this form. Signature on this form provides for compliance with certification requirements under 15 CFR Part 28, 'New Restrictions on Lobbying.' The certifications shall be treated as a material representation of fact upon which reliance will be placed when the Department of Commerce determines to award the covered transaction, grant, or cooperative agreement.

LOBBYING

As required by Section 1352, Title 31 of the U.S. Code, and implemented at 15 CFR Part 28, for persons entering into a grant, cooperative agreement or contract over \$100,000 or a loan or loan guarantee over \$150,000 as defined at 15 CFR Part 28, Sections 28.105 and 28.110, the applicant certifies that to the best of his or her knowledge and belief, that:

- (1) No Federal appropriated funds have been paid or will be paid, by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress in connection with the awarding of any Federal contract, the making of any Federal grant, the making of any Federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any Federal contract, grant, loan, or cooperative agreement.
- (2) If any funds other than Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a member of Congress in connection with this Federal contract, grant, loan, or cooperative agreement, the undersigned shall complete and submit Standard Form-LLL, 'Disclosure Form to Report Lobbying,' in accordance with its instructions.
- (3) The undersigned shall require that the language of this certification be included in the award documents for all subawards at all tiers (including subcontracts, subgrants, and contracts under grants, loans, and cooperative agreements) and that all subrecipients shall certify and disclose accordingly.

This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by section 1352, title 31, U.S. Code. Any person who fails to file the required certification shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure occurring on or before October 23, 1996, and of not less than \$11,000 and not more than \$110,000 for each such failure occurring after October 23, 1996.

As the duly authorized representative of the applicant, I hereby certify that the applicant will comply with the above applicable certification.

*** NAME OF APPLICANT**

University of Tennessee at Chattanooga

*** AWARD NUMBER**

na

*** PROJECT NAME**

RAMPS for Chattanooga

Prefix:*** First Name:**

Meredith

Middle Name:*** Last Name:**

Perry

Suffix:

*** Title:** Exec. Director, Research & Sponsored Programs

*** SIGNATURE:**

Meredith G Perry

*** DATE:**

06/11/2020

COLLEGES AND UNIVERSITIES RATE AGREEMENT

EIN: 1626001636A3

DATE:08/30/2016

ORGANIZATION:

FILING REF.: The preceding
agreement was dated
06/12/2012

University of Tennessee Chattanooga
709A Andy Holt Tower

Knoxville, TN 37996-0174

The rates approved in this agreement are for use on grants, contracts and other agreements with the Federal Government, subject to the conditions in Section III.

SECTION I: Facilities And Administrative Cost Rates

RATE TYPES: FIXED FINAL PROV. (PROVISIONAL) PRED. (PREDETERMINED)

EFFECTIVE PERIOD

<u>TYPE</u>	<u>FROM</u>	<u>TO</u>	<u>RATE (%)</u>	<u>LOCATION</u>	<u>APPLICABLE TO</u>
PRED.	07/01/2016	06/30/2017	51.00	On-Campus	All Programs (A)
PRED.	07/01/2017	06/30/2020	36.00	On-Campus	All Programs (B)
PRED.	07/01/2016	06/30/2017	16.00	Off-Campus	All Programs (A)
PRED.	07/01/2017	06/30/2020	13.00	Off-Campus	All Programs (B)
PROV.	07/01/2020	Until Amended			Use same rates and conditions as those cited for fiscal year ending June 30, 2020.

*BASE

ORGANIZATION: University of Tennessee Chattanooga

AGREEMENT DATE: 8/30/2016

(A) Direct salaries and wages including vacation, holiday, sick pay and other paid absences but excluding all other fringe benefits.

(B) Modified total direct costs, consisting of all direct salaries and wages, applicable fringe benefits, materials and supplies, services, travel and up to the first \$25,000 of each subaward (regardless of the period of performance of the subawards under the award). Modified total direct costs shall exclude equipment, capital expenditures, charges for patient care, rental costs, tuition remission, scholarships and fellowships, participant support costs and the portion of each subaward in excess of \$25,000. Other items may only be excluded when necessary to avoid a serious inequity in the distribution of indirect costs, and with the approval of the cognizant agency for indirect costs.

ORGANIZATION: University of Tennessee Chattanooga

AGREEMENT DATE: 8/30/2016

SECTION II: SPECIAL REMARKS

TREATMENT OF FRINGE BENEFITS:

The fringe benefits are specifically identified to each employee and are charged individually as direct costs. The directly claimed fringe benefits are listed below.

TREATMENT OF PAID ABSENCES

Vacation, holiday, sick leave pay and other paid absences are included in salaries and wages and are claimed on grants, contracts and other agreements as part of the normal cost for salaries and wages. Separate claims are not made for the cost of these paid absences.

OFF-CAMPUS DEFINITION: For all activities performed in facilities not owned by the institution and to which rent is directly allocated to the project(s) the off-campus rate will apply. Grants or contracts will not be subject to more than one F&A cost rate. If more than 50% of a project is performed off-campus, the off-campus rate will apply to the entire project.

Fringe Benefits Include: Retirement, FICA, Health Insurance, Life Insurance, Unemployment Insurance and Worker's Compensation.

Equipment Definition: Equipment means an article of non-expendable, tangible personal property having a useful life of more than one year and an acquisition cost of \$5,000 or more per unit.

The next indirect cost proposal based on actual costs for the fiscal year ending 06/30/2019, is due by 12/31/2019.

ORGANIZATION: University of Tennessee Chattanooga

AGREEMENT DATE: 8/30/2016

SECTION III: GENERAL

A. LIMITATIONS:

The rates in this Agreement are subject to any statutory or administrative limitations and apply to a given grant, contract or other agreement only to the extent that funds are available. Acceptance of the rates is subject to the following conditions: (1) Only costs incurred by the organization were included in its facilities and administrative cost pools as finally accepted; such costs are legal obligations of the organization and are allowable under the governing cost principles; (2) The same costs that have been treated as facilities and administrative costs are not claimed as direct costs; (3) Similar types of costs have been accorded consistent accounting treatment; and (4) The information provided by the organization which was used to establish the rates is not later found to be materially incomplete or inaccurate by the Federal Government. In such situations the rate(s) would be subject to renegotiation at the discretion of the Federal Government.

B. ACCOUNTING CHANGES:

This Agreement is based on the accounting system purported by the organization to be in effect during the Agreement period. Changes to the method of accounting for costs which affect the amount of reimbursement resulting from the use of this Agreement require prior approval of the authorized representative of the cognizant agency. Such changes include, but are not limited to, changes in the charging of a particular type of cost from facilities and administrative to direct. Failure to obtain approval may result in cost disallowances.

C. FIXED RATES:

If a fixed rate is in this Agreement, it is based on an estimate of the costs for the period covered by the rate. When the actual costs for this period are determined, an adjustment will be made to a rate of a future year(s) to compensate for the difference between the costs used to establish the fixed rate and actual costs.

D. USE BY OTHER FEDERAL AGENCIES:

The rates in this Agreement were approved in accordance with the authority in Title 2 of the Code of Federal Regulations, Part 200 (2 CFR 200), and should be applied to grants, contracts and other agreements covered by 2 CFR 200, subject to any limitations in A above. The organization may provide copies of the Agreement to other Federal Agencies to give them early notification of the Agreement.

E. OTHER:

If any Federal contract, grant or other agreement is reimbursing facilities and administrative costs by a means other than the approved rate(s) in this Agreement, the organization should (1) credit such costs to the affected programs, and (2) apply the approved rate(s) to the appropriate base to identify the proper amount of facilities and administrative costs allocable to these programs.

BY THE INSTITUTION:

University of Tennessee Chattanooga

(INSTITUTION)


(SIGNATURE)

James R. Maples

(NAME)

Interim Treasurer & CFO

(TITLE)

10/21/16

(DATE)

ON BEHALF OF THE FEDERAL GOVERNMENT:

DEPARTMENT OF HEALTH AND HUMAN SERVICES

(AGENCY)

Darryl W. Mayes -S

Digitally signed by Darryl W. Mayes -S
DN: c=US, o=U.S. Government, ou=HHS, ou=PSC,
ou=People, 0.9.2342.19200300.100.1.1=2000131669,
cn=Darryl W. Mayes -S
Date: 2016.09.16 09:19:01 -0400

(SIGNATURE)

Arif Karim

(NAME)

Director, Cost Allocation Services

(TITLE)

8/30/2016

(DATE) 9679

HHS REPRESENTATIVE: Ernest Kinneer

Telephone: (214) 767-3261

Project Narrative File(s)

*** Mandatory Project Narrative File Filename:**

To add more Project Narrative File attachments, please use the attachment buttons below.

Staffing Plan - Recruiting, Acceleration, Mentorship, Productivity and Sustainability (RAMPS) for Chattanooga

Name/Title	Annual Salary	Total Amount Charged to Project Year 1	Total Amount Charged to Project Year 2	Total Amount Charged to Project Year 3	Percentage of Dedicated Time	Total Federal Share	Total Non-Federal Share (Matching)
UTC Personnel							
Dr. Thomas Lyons	\$180,000	\$22,500	\$22,500	\$22,500	12.5%	\$0	\$67,500
Elizabeth Santin	\$81,600	\$10,200	\$10,200	\$10,200	12.5%	\$0	\$30,600
Dr. Mina Sartipi	\$174,219	\$8,842	\$8,976	\$9,115	5%	\$13,066	\$13,066
Dr. Reinhold Mann	\$198,900	\$11,138	\$11,138	\$11,138	5.5%	\$0	\$33,415
Graduate Assistant CIE	\$15,000	\$15,000	\$15,000	\$15,000	100%	\$45,000	\$0
Graduate Assistant CUIP	\$12,000	\$12,000	\$12,000	\$12,000	100%	\$36,000	\$0
Sub-Awardee Personnel							
CO.LAB Personnel							
Marcus Shaw, CEO	\$150,000	\$22,500	\$23,175	\$23,870	15%	\$34,773	\$34,773
Katie Hendrix, Chief of Staff	\$100,000	\$25,000	\$25,750	\$26,523	25%	\$38,636	\$38,636
Kirk Burton, Director of Programs	\$100,000	\$50,000	\$51,500	\$53,045	50%	\$77,273	\$77,273
TBH- Program Manager	\$60,000	\$60,000	\$61,800	\$63,654	100%	\$92,727	\$92,727
TBH - GIGTANK EIR	\$30,000	\$30,000	\$30,900	\$31,827	100%	\$46,364	\$46,364
The Enterprise Center Personnel							
Deb Socia President & CEO	\$172,000	\$8,600	8,858	9,142	5%	0	\$26,600
Geoff Millener Sr Pro & Op Officer	\$57,288	\$6,300	\$6,489	\$6,684	10%	0	\$19,473
Kevin Love Comm & Ext. Relation Manager	\$50,000	\$7,500	\$7,725	\$7,957	15%	\$23,182	\$0
Nancy Tucker, Coordinator	\$67,000	\$6,700	\$6,901	\$7,108	10%	\$0	\$20,709
Mary Helen Montgomery Marketing & Comms Dir	\$59,150	\$5,915	\$6,092	\$6,275	10%	\$18,283	\$0
EPB Personnel							
Lilian Bruce, Sr Director Strategic Research	\$181,000	\$2,001	\$2,436	\$2,436	1%	\$3,437	\$3,437
TBD- Panelists	Varies*	\$1,383	\$1,424	\$1,466	0.2%	\$2,137	\$2,137
TBD - Mentors	Varies*	\$31,744	\$30,255	\$31,236	3.1%	\$46,618	\$46,618
TBD – Legal & Admin	Varies*	\$1,416	\$683	\$703	0.3%	\$1,401	\$1,401
Recruiter	Varies*	\$520	\$536	\$552	0.4%	\$804	\$804
Operations Installers	Varies*	\$1,478	\$0	\$0	0.1%	\$739	\$739

*Due to the nature of work at EPB, they will not be assigning specific individuals to these roles unless/until the project is awarded. Therefore, the budget request numbers are estimated based on the average salaries of the employee category.

Budget Narrative - University of Tennessee Chattanooga

	Y1		Y2		Y3		Total	
Category	Request	Match	Request	Match	Request	Match	Request	Match
Personnel	\$31,486	\$48,194	\$31,621	\$48,194	\$31,759	\$48,194	\$94,866	\$144,582
Fringe	\$3,552	\$13,012	\$3,585	\$13,012	\$3,620	\$13,012	\$10,757	\$39,035
Travel	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Equip.	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Supplies	\$2,000	\$0	\$2,000	\$0	\$2,000	\$0	\$6,000	\$0
Contract	\$332,384	\$331,538	\$339,696	\$339,188	\$345,858	\$349,023	\$1,017,938	\$1,019,749
Other	\$23,307	\$0	\$24,006	\$0	\$24,726	\$0	\$72,039	\$0
Total Direct	\$392,728	\$392,744	\$400,908	\$400,394	\$407,963	\$410,229	\$1,201,600	\$1,203,366
Indirect	\$55,886	\$37,586	\$28,946	\$37,586	\$29,009	\$37,586	\$113,840	\$112,758
Total Project Costs	\$448,614	\$430,329	\$429,854	\$437,980	\$436,972	\$447,815	\$1,315,440	\$1,316,124

Personnel

o Year 1: \$79,680

o Year 2: \$79,815

o Year 3: \$79,953

Federal share: \$94,866

Matching Share: \$144,582 – See UTC Letter of Match Commitment

PI

Dr. Thomas Lyons – Clarence E. Harris Chair of Excellence in Entrepreneurship, Professor of Marketing and Entrepreneurship – Dr. Lyons will oversee the project; assist with RISE assessment and coaching training for mentors; and co-develop entrepreneur development and commercialization programming.

- **Total amount of annual salary dedicated to this project:** \$67,500
- **Federal Share:** \$0; **Matching Non-Federal Share:** \$67,500

Co-PIs

Elizabeth Santin – Director of the Center for Innovation and Entrepreneurship – Ms. Santin will assist with recruiting entrepreneurs, ideas and mentors; assist with RISE assessment and coaching training for mentors; co-develop and deliver entrepreneur development and commercialization programming; and liaise with the UTC Commercialization Counselor in supporting UTC inventors/entrepreneurs.

- **Total amount of annual salary dedicated to this project:** \$30,600
- **Federal Share:** \$0; **Matching Non-Federal Share:** \$30,600

Dr. Mina Sartipi – Founding Director of the Center for Urban Informatics and Progress – Dr. Sartipi will facilitate idea and entrepreneur recruitment and assist in making connections with CUIP resources and talent.

- **Total amount of annual salary dedicated to this project:** \$26,933
- **Federal Share:** \$13,866; **Matching Non-Federal Share:** \$13,066

Dr. Reinhold Mann- UTC Deputy Vice Chancellor for Research, Outreach and National Lab Liaison and Chattanooga Smart Community Collaborative Lead Scientist– Dr. Mann will ensure availability of committed UTC resources and assist with idea and entrepreneur recruitment.

- **Total amount of annual salary dedicated to this project:** \$33,415
- **Federal Share:** \$0; **Matching Non-Federal Share:** \$33,415

Other Personnel

TBH - Graduate Assistants – Two Graduate assistants will be hired to assist Dr. Lyons and Ms. Santin with their project-related duties including data collection and analysis at the Center for Innovation and Entrepreneurship and Dr. Sartipi at the Center for Urban Informatics and Progress.

- **Total amount of annual salary dedicated to this project:** \$81,000
- **Federal Share:** \$81,000; **Matching Non-Federal Share:** \$0

Fringe Benefits

o Year 1: \$16,563

o Year 2: \$16,597

o Year 3: \$16,631

Federal share: \$10,757

Matching Share: \$39,035 – See UTC Letter of Match Commitment

Fringe benefits at UTC are charged at the actual cost of benefits, which includes social security, unemployment insurance, workers compensation, retirement, and all discretionary benefits for which each employee is enrolled. Fringes are estimated at 23% for Dr. Lyons, 38% for Ms. Santin, 27% for Dr. Sartipi, 20% for Dr. Mann, and 9% for students.

Travel

No travel is being requested by UTC.

Equipment

No equipment is being requested for this project.

Supplies

o Year 1: \$2,000

o Year 2: \$2,000

o Year 3: \$2,000

Federal share: \$6,000

Matching Share: \$0

Supplies include 4 laptops for use by mentors in the Center for Innovation and Entrepreneurship as well as standard office supplies such as paper, printing, note pads, pens, folders, staplers and staples, etc. that will be used exclusively for the project and participants.

Contractual

o Year 1: \$663,992

o Year 2: \$678,884

o Year 3: \$694,881

Federal share: \$1,017,938

Matching Share: \$1,019,749 – See Co Lab, The Enterprise Center, and EPB Letters of Match Commitment

Consultant – Jennifer Skjellum (UTC Commercialization Coordinator) – Total project cost: \$259,200 – Federal Share: \$129,600 Matching Share: \$129,600 - Contractual expenses include recruiting faculty and graduate student inventors from engineering, computer science, data analytics and health sciences, among other fields and coordinating support for the development of their products and businesses from the University and the larger community in the forms of assistance with preparing proposals to the NSF’s SBIR program, liaising with the University of Tennessee Research Foundation and I-Corps South at Georgia Tech University, developing and delivering workshops on IT protection, customer discovery, etc. and making connections with Chattanooga entrepreneurial ecosystem partners.

Subaward to CO.LAB – Total project cost: \$1,092,823– Federal Share: \$546,411 Matching Share: \$546,411 - Contractual expenses include accelerator programming delivery, including GIGTANK 2.0; other business and entrepreneur skill development programming; connections to equity and debt capital sources; connections to regional businesses and institutions; and impact data collection, evaluation and reporting. Please see below for CO.LAB’s budget narrative detail.

Subaward to The Enterprise Center - Total project cost: \$437,039– Federal Share: \$217,614 Matching Share: \$219,425 - Contractual expenses include entrepreneur recruiting, ecosystem path identification and network strengthening, mentor recruitment and support, data collection and analysis, and outputs/outcomes reporting. Please see below for The Enterprise Center’s budget narrative detail.

Subaward to EPB - Total project cost: \$248,626 – Federal Share: \$124,313 Matching Share: \$124,313 - Contractual expenses include providing entrepreneurship mentoring, recruiting ideas and entrepreneurs from industry, and panel and competition judging support to accelerator activities. Please see below for EPB’s budget narrative detail.

Other

o Year 1: \$23,307

o Year 2: \$24,006

o Year 3: \$24,726

Federal share: \$72,039

Matching Share: \$0

Graduate Assistant Tuition – Tuition including fees and course differentials total \$5,657 per semester for full time students (9 credit hours for each academic semester.) Support for 2 graduate assistants for 2 academic semesters each in each year of the project is requested. A 3% increase is included annually for planned tuition increase.

Total Direct Charges

o Year 1: \$785,472

o Year 2: \$801,302

o Year 3: \$818,192

Federal share: \$1,201,600

Matching Share: \$1,203,366

Indirect Charges

o Year 1: \$93,472

o Year 2: \$66,532

o Year 3: \$66,594

Federal share: \$113,840

Matching Share: \$112,758

UTC's federally negotiated indirect rate is 36% of modified total direct costs. The MTDC base of \$629,439 excludes tuition, equipment, and all but the first \$25,000 of each sub award. The Indirect Cost Rate Agreement is attached.

Totals

o Year 1: \$878,943

o Year 2: \$867,834

o Year 3: \$884,787

Federal share: \$1,315,440

Matching Share: \$1,316,124

Sub award - Budget Narrative - CO.LAB

	Y1		Y2		Y3		Total	
Category	Request	Match	Request	Match	Request	Match	Request	Match
<i>Personnel</i>	\$93,750	\$93,750	\$96,563	\$96,563	\$99,459	\$99,459	\$289,772	\$289,772
<i>Fringe Benefits</i>	\$14,063	\$14,063	\$14,484	\$14,484	\$14,919	\$14,919	\$43,466	\$43,466
<i>Travel</i>	\$10,000	\$10,000	\$10,000	\$10,000	\$10,000	\$10,000	\$30,000	\$30,000
<i>Equipment</i>	0	0	0	0	0	0	0	0
<i>Supplies</i>	\$25,000	\$25,000	\$25,000	\$25,000	\$25,000	\$25,000	\$75,000	\$75,000
<i>Contractual</i>	\$15,000	\$15,000	\$15,000	\$15,000	\$15,000	\$15,000	\$45,000	\$45,000
<i>Other</i>	\$4,500	\$4,500	\$4,500	\$4,500	\$4,500	\$4,500	\$13,500	\$13,500
<i>Total Direct Charges</i>	\$162,313	\$162,313	\$165,547	\$165,547	\$168,878	\$168,878	\$496,738	\$496,738
<i>Indirect Charges</i>	\$16,231	\$16,231	\$16,555	\$16,555	\$16,888	\$16,888	\$49,674	\$49,674
Total Project Costs	\$178,544	\$178,544	\$182,102	\$182,102	\$185,766	\$185,766	\$546,411	\$546,411

Personnel

o Year 1: \$187,500

o Year 2: \$193,125

o Year 3: \$198,919

Federal share: \$289,772

Matching Share: \$289,772 – See CO.LAB Letter of Match Commitment

Description:

Marcus Shaw (maximum annual salary: \$150,000) **Chief Executive Officer, CO.LAB** -Marcus will dedicate approximately 15% of his effort each year to the RAMPS project. Marcus will oversee and manage all of CO.LAB's RAMPS programing and continue to develop partnerships in collaboration with UTC to ensure sustainability of programs. Marcus will manage the budget for CO.LAB's contribution to the RAMPS program. Refer to match commitment letter from CO.LAB.

- **Total amount of annual salary dedicated to this project:** \$69,545
- **Federal Share:** \$34,773; **Matching Non-Federal Share:** \$34,773

Katie Hendrix (maximum annual salary: \$100,000) **Chief of Staff, CO.LAB** - Katie will dedicate approximately 25% of her effort each year to the RAMPS project. Katie will lead CO.LAB's mentor network and community outreach efforts and manage and train CO.LAB staff working on the RAMP programming. Katie will also provide connections to mentors, and investors. Refer to match commitment letter from CO.LAB

- **Total amount of annual salary dedicated to this project:** \$77,273
- **Federal Share:** \$38,636; **Matching Non-Federal Share:** \$38,636

Kirk Burton (maximum annual salary: \$100,000) **Director of Programs, CO.LAB** - Kirk will dedicate approximately 50% of his effort each year to the RAMPS project. Kirk will work with Marcus to

oversee and manage all of CO.LAB's GIGTANK 2.0 programming. He will provide leadership for the curricular elements of the programs; spearhead entrepreneurial activities; manage the Program Manager and EIR. He will work also with CO.LAB alumni ventures in target sectors to manage market opportunities, including customers/pilot partners and investors. Kirk will also help ventures build capacity; schedule and promote SBIR workshops; and work with commercialization opportunities. Refer to match commitment letter from the CO.LAB.

- **Total amount of annual salary dedicated to this project:** \$154,545
- **Federal Share:** \$77,273; **Matching Non-Federal Share:** \$77,273

GIGTANK 2.0 Program Manager, To Be Hired (maximum annual salary: \$60,000) - It is anticipated that the GIGTANK Program Manager (to be hired) will dedicate approximately 100% of her/his effort to the GIGTANK 2.0 project. This position will focus on recruiting mentors to engage with startups, recruiting companies to apply to programming, recruiting partners from organizations and corporations, and working with participants to ensure engagement and completion of programs. The Program Manager will also manage data and CRM related responsibilities. Refer to match commitment letter from the CO.LAB.

- **Total amount of annual salary dedicated to this project:** \$185,454
- **Federal Share:** \$92,727; **Matching Non-Federal Share:** \$92,727

GIGTANK 2.0 Entrepreneur-In-Residence, To Be Hired (maximum annual salary: \$30,000) - The GIGTANK 2.0 Entrepreneur-In-Residence (EIR) provide GIGTANK 2.0 participants with industry relevant mentorship during the program. EIRs complement the administrative responsibilities of the Program Manager, primarily serving as an industry liaison and mentor for GIGTANK 2.0 companies. See match commitment letter from CO.LAB.

- **Total Project Cost:** \$92,727
- **Federal Share:** \$46,364; **Matching Non-Federal Share:** \$46,364

Fringe Benefits

o Year 1: \$28,125

o Year 2: \$28,969

o Year 3: \$29,838

Federal share: \$43,466

Matching Share: \$43,466 - See CO.LAB Letter of Match Commitment

Description:

Fringe benefits are charged based on the cost of benefits applicable to CO.LAB staff, which include medical, dental and vision plan options.

Travel

o Year 1: \$20,000

o Year 2: \$20,000

o Year 3: \$20,000

Federal share: \$30,000

Matching Share: \$30,000 - See CO.LAB Letter of Match Commitment

Description:

Travel is requested for participants coming to Chattanooga for GIGTANK 2.0 each of the three years of the grant period as well as costs related to the recruiting of entrepreneurs and startups for the programs. It also includes expected cost related to the travel for guest speakers and conferences that support development of companies in the health, transportation, energy cluster. The budget reflects 30 trips at average cost per trip of \$2,000 (covering airfare, hotel, and food per diem). Refer to match commitment letter from CO.LAB.

Supplies

o Year 1: \$50,000

o Year 2: \$50,000

o Year 3: \$50,000

Federal share: \$75,000

Matching Share: \$75,000 - See CO.LAB Letter of Match Commitment

Description:

Funds are requested to purchase materials/supplies for GIGTANK 2.0 materials for mentoring, pitch, and networking events. Materials for mentoring, pitch, and networking events include marketing materials, digital assets, and logistics supplies needed to produce high-quality events. See match commitment letter from CO.LAB.

Contractual

o Year 1: \$30,000

o Year 2: \$30,000

o Year 3: \$30,000

Federal share: \$45,000

Matching Share: \$45,000 - See CO.LAB Letter of Match Commitment

Description:

Contractual expenses include educational and external programming that provide GIGTANK 2.0 companies access to virtual programming, coaching, and pre-assessments from Fluent.

Other

o Year 1: \$9,000

o Year 2: \$9,000

o Year 3: \$9,000

Federal share: \$13,000

Matching Share: \$13,000 - See CO.LAB Letter of Match Commitment

Description:

10 licenses to the Affinity CRM product at \$75/mo./user. Affinity will be used to monitor the project's progress towards meeting the outputs and outcomes defined in the proposal.

Total Direct Charges (sum of all above)

o Year 1: \$324,625

o Year 2: \$331,094

o Year 3: \$337,757

Federal share: \$496,738

Matching Share: \$496,738 - See CO.LAB Letter of Match Commitment

Indirect Charges

o Year 1: \$32,463

o Year 2: \$33,109

o Year 3: \$33,776

Federal share: \$49,674

Matching Share: \$49,674

Description:

CO.LAB does not have an ICR Agreement (federally negotiated indirect rate); it has never received an ICR; and it is electing to charge the de minimus rate (10% of modified total direct costs) per 2 C.F.R. Sec. 200.414(f).

Totals (sum of Total Direct Costs and Indirect Costs)

o Year 1: \$357,088

o Year 2: \$364,203

o Year 3: \$371,532

Federal share: \$546,411

Matching Share: \$546,411

Sub Award - Budget Narrative - The Enterprise Center

	Y1		Y2		Y3		Total	
Category	Request	Match	Request	Match	Request	Match	Request	Match
<i>Personnel</i>	13,415	21,600	13,817	22,248	14,232	22,934	41,464	66,782
<i>Fringe Benefits</i>	3,354	5,400	3,454	5,562	3,558	5,734	10,366	16,696
<i>Travel</i>	3,000	0	2,000	0	2,000	0	7,000	0
<i>Equipment</i>	0	0	0	0	0	0	0	0
<i>Supplies</i>	0	8,000	0	7,000	1,000	11,000	1,000	26,000
<i>Contractual</i>	46,000	0	46,000	0	46,000	0	138,000	0
<i>Other</i>	0	30,000	0	30,000	0	30,000	0	90,000
<i>Total Direct Charges</i>	65,769	65,000	65,272	64,810	66,790	69,668	197,831	199,478
<i>Indirect Charges</i>	6,577	6,500	6,527	6,481	6,679	6,967	19,783	19,948
Total Project Costs	72,346	71,500	71,799	71,291	73,469	76,634	217,614	219,425

Personnel

o Year 1: \$35,015

o Year 2: \$36,065

o Year 3: \$37,166

Federal share: \$41,464

Matching Share: \$66,782 - See TEC Letter of Match Commitment

Total: \$108,246

Deb Socia, President and CEO, will be a participant in the steering committee, specifically to guide the community engagement efforts. She will supervise The Enterprise Center (TEC) staff, manage outreach and collaboration with partners, and provide budget oversight.

- **Total amount of annual salary dedicated to this project:** \$26,600
- **Federal Share:** \$0; **Matching Non-Federal Share:** \$26,600

Geoff Millener, Senior Operation and Programs Manager, will oversee strategy as well as provide moderation and facilitation within our team's community engagement effort. He will assist with planning, ensure compliance, and oversee performance metrics.

- **Total amount of annual salary dedicated to this project:** \$19,473
- **Federal Share:** \$0; **Matching Non-Federal Share:** \$19,473

Kevin Love, Community and External Relationship Manager, will be our in-house community manager. As such, he will participate in all aspects of the planning and management of the community engagement aspects of the project. In particular, he will be deeply engaged in harnessing his vast network of community connections to ensure diverse representation in our work. He will attend community meetings, will oversee the consultants, and will provide moderation for local conversations.

- **Total amount of annual salary dedicated to this project:** \$23,182
- **Federal Share:** \$23,182; **Matching Non-Federal Share:** \$0

Nancy Tucker, Coordinator, will manage all coordination for purchasing, contract negotiation and completion, MOUs, meeting and event coordination, and grant reporting.

- **Total amount of annual salary dedicated to this project: \$20,709**
- **Federal Share: \$0; Matching Non-Federal Share: \$20,709**

Mary Helen Montgomery, Marketing and Communications Director, will write, supervise, and direct all videos created as well as provide expert communications assistance, including social media support as well as press and media outreach – locally and nationally.

- **Total amount of annual salary dedicated to this project: \$18,283**
- **Federal Share: \$18,283; Matching Non-Federal Share: \$0**

Fringe Benefits

Year 1: \$8,754

Year 2: \$9,016

Year 3: \$9,291

Total: \$27,062

Federal share: \$10,366

Matching Share: \$16,696- See TEC Letter of Match Commitment

We determine fringe benefits based on 25% of salary. This includes medical, dental, vision and life insurance options, FICA, retirement 403b/403k, parking, cell phone support, short-term disability.

Travel

o Year 1: \$3,000

o Year 2: \$2,000

o Year 3: \$2,000

Federal share: \$7,000

Matching Share: \$0

Travel will include three trips for two individuals in year one at an average cost of \$500 per trip, to include airfare, hotel, conference costs, and airfare or mileage stipend. In year one, we plan to visit two nearby cities and attend one conference, in an effort to learn how other cities have better diversified those who participate in entrepreneurial ecosystem and to seek replicable successful practices. In years two and three, travel will include two trips for two individual per year at an average cost of \$500 per trip, to include airfare, hotel, conference costs, and airfare or mileage stipend. In years two and three, we will be traveling to nearby cities and attending one conference per year. This effort will include learning opportunities that can identify successful community engagement strategies, as well as meetings with industry partners to share best practices.

Equipment

No Equipment is being requested

Supplies

o Year 1: \$8,000

o Year 2: \$7,000

o Year 3: \$12,000

Federal share: \$1,000

Matching Share: \$27,000- See TEC Letter of Match Commitment

The costs associated with this grant will include standard office supplies (to include printing, paper, binders, poster paper, lamination) that will be used exclusively for the project and participants and 12 laptops (purchase 4 per year) for the use of our community ambassadors.

Publication costs: \$1,000 in funds to cover the cost of publication in an academic journal to disseminate results is requested.

Contractual

o Year 1: \$46,000

o Year 2: \$46,000

o Year 3: \$46,000

Federal share: \$138,000

Matching Share: \$0

Project Coordination: This contractor will organize all external programing for community engagement, will provide strategy coordination, will create and implement modules for community engagement, will support outreach to partners in the entrepreneurial ecosystem, and will provide case management to those who are interested in the project. (3,000/month - 36,000/yr.)

Community Ambassadors: These contractors (4 per year) will work with the Project Coordinator and with the Community and External Relationship Manager to ensure community members are engaged throughout the grant period. They will be the conduit to the community regarding ecosystem opportunities available and will engage with local entrepreneurs or those who are interested in entrepreneurship to work as a direct connection to the project. (2,500/coordinator for 10,000/yr.)

Other

o Year 1: 30,000

o Year 2: \$30,000

o Year 3: \$30,000

Federal share: \$0

Matching Share: \$90,000- See TEC Letter of Match Commitment

Conference space with desks, gig symmetrical access, and conference phone line will be made available to all participants in the program, as well as smaller conference space for participant meetings – 8 hr./day, 5 days/week for the duration of the project.

Total Direct Charges (sum of all above)

o Year 1: \$130,769

o Year 2: \$130,082

o Year 3: \$136,457

Federal share: \$197,831

Matching Share: \$199,478

Indirect Charges

o Year 1: \$13,077

o Year 2: \$13,008

o Year 3: \$13,646

Federal share: \$19,783

Matching Share: \$19,948

The Enterprise Center does not have an ICR Agreement; it has never received an ICR; and it is electing to charge the de minimis rate.

Totals (sum of Total Direct Costs and Indirect Costs)

o Year 1: \$143,846

o Year 2: \$143,090

o Year 3: \$150,103

Federal share: \$217,614

Matching Share: \$219,425

Sub award - Budget Narrative – EPB

	Y1		Y2		Y3		Total	
Category	Request	Match	Request	Match	Request	Match	Request	Match
<i>Personnel</i>	\$19,271	\$19,271	\$17,667	\$17,667	\$18,197	\$18,197	\$55,134	\$55,134
<i>Fringe Benefits</i>	\$10,830	\$10,830	\$9,929	\$9,929	\$10,226	\$10,226	\$30,985	\$30,985
<i>Travel</i>	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<i>Equipment</i>	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<i>Supplies</i>	\$693	\$693	\$0	\$0	\$0	\$0	\$693	\$693
<i>Contractual</i>	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
<i>Other</i>	\$7,500	\$7,500	\$15,000	\$15,000	\$15,000	\$15,000	\$37,500	\$37,500
<i>Total Direct Charges</i>	\$38,294	\$38,294	\$42,596	\$42,596	\$43,423	\$43,423	\$124,313	\$124,313
<i>Indirect Charges</i>	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total Project Costs	\$38,294	\$38,294	\$42,596	\$42,596	\$43,423	\$43,423	\$124,313	\$124,313

All matching funds are in-kind.

Personnel

- Year 1: \$38,542
- Year 2: \$35,334
- Year 3: \$36,393

Federal share: \$55,134

Matching Share: \$55,134

Description:

Lilian Bruce - Sr. Director Strategic Research - Ms. Bruce will oversee the EPB portion of the project. She will assist with recruiting mentors and competition judges from EPB for the RAMPS project. She will also recruit ideas and entrepreneurs using her local industry contacts.

- **Total amount of annual salary dedicated to this project:** \$6,874
- **Federal Share:** \$3,437; **Matching Non-Federal Share:** \$3,437

Panelists: Panelist and speakers will participate and support GigTank 2.0 events and will include various member of EPB's executive staff as they are available.

- **Total amount of annual salary dedicated to this project:** \$4,273
- **Federal Share:** \$2,137; **Matching Non-Federal Share:** \$2,137

Mentors: EPB is budgeting for seven mentors to participate in the RAMPs efforts. Mentors represent a broad category of EPB personnel and will be selected from leaders from departments including Information Security, Fiber Design, Sales, Community and Environment Stewardship, Smart Grid Development and Network Operations. They participate in training and work with assigned entrepreneurs over the three-year period.

- **Total amount of annual salary dedicated to this project:** \$93,235

- **Federal Share:** \$46,618; **Matching Non-Federal Share:** \$46,618

Legal & Administrative: Legal and Administrative personnel will support contractual and financial related aspects of the project.

- **Total amount of annual salary dedicated to this project:** \$2,802
- **Federal Share:** \$1,401; **Matching Non-Federal Share:** \$1,401

Recruitment: Recruitment personnel will provide a supporting role to the collaborative in advisement and potential outreach with entrepreneurs.

- **Total amount of annual salary dedicated to this project:** \$1,608
- **Federal Share:** \$804; **Matching Non-Federal Share:** \$804

Operations Installers: Operations Installers will be responsible for design, on site preparation and installation of Optical Network Termination points and ensuring switches and fiber availability for GigTank events and entrepreneurial use.

- **Total amount of annual salary dedicated to this project:** \$1,478
- **Federal Share:** \$739; **Matching Non-Federal Share:** \$739

Fringe Benefits

- Year 1: \$21,661
- Year 2: \$19,857
- Year 3: \$20,453

Federal share: \$30,985

Matching Share: \$30,985

Fringe benefits for this project include non-productive time (all the various leaves such as annual leave, holidays, etc.) and insurance costs (health insurance, pension, etc.).

Travel

No travel is being requested

Equipment

No equipment is being requested

Supplies

- Year 1: \$1,386
- Year 2: \$ 0
- Year 3: \$ 0

Federal share: \$693

Matching Share: \$693

Supplies in year one include Optical Network Terminating Unit and fiber drop supplies needed for access to internet connectivity in event meeting spaces.

Contractual

No contractual funds are being requested

Other

- Year 1: \$15,000
- Year 2: \$30,000
- Year 3: \$30,000

Federal share: \$37,500

Matching Share: \$37,500

Description:

Other expenses include monthly access to a gigabit VLAN for two points (locations). This communications access support entrepreneurial engagement and the GIGTANK events.

Total Direct Charges (sum of all above)

- Year 1: \$76,589
- Year 2: \$85,191
- Year 3: \$86,846

Federal share: \$124,313

Matching Share: \$124,313

Indirect Charges

EPB does not have a federally negotiated indirect rate and does not choose to elect the de minimus rate.

Totals (sum of Total Direct Costs and Indirect Costs)

- Year 1: \$76,589
- Year 2: \$85,191
- Year 3: \$86,846

Federal share: \$124,313

Matching Share: \$124,313

Budget Narrative File(s)

* **Mandatory Budget Narrative Filename:**

Add Mandatory Budget Narrative

Delete Mandatory Budget Narrative

View Mandatory Budget Narrative

To add more Budget Narrative attachments, please use the attachment buttons below.

Add Optional Budget Narrative

Delete Optional Budget Narrative

View Optional Budget Narrative

ATTACHMENTS FORM

Instructions: On this form, you will attach the various files that make up your grant application. Please consult with the appropriate Agency Guidelines for more information about each needed file. Please remember that any files you attach must be in the document format and named as specified in the Guidelines.

Important: Please attach your files in the proper sequence. See the appropriate Agency Guidelines for details.

1) Please attach Attachment 1	1235-Combined match letters.p	Add Attachment	Delete Attachment	View Attachment
2) Please attach Attachment 2	1236-Local Government support	Add Attachment	Delete Attachment	View Attachment
3) Please attach Attachment 3	1237-UT Chattanooga FA 082016	Add Attachment	Delete Attachment	View Attachment
4) Please attach Attachment 4		Add Attachment	Delete Attachment	View Attachment
5) Please attach Attachment 5		Add Attachment	Delete Attachment	View Attachment
6) Please attach Attachment 6		Add Attachment	Delete Attachment	View Attachment
7) Please attach Attachment 7		Add Attachment	Delete Attachment	View Attachment
8) Please attach Attachment 8		Add Attachment	Delete Attachment	View Attachment
9) Please attach Attachment 9		Add Attachment	Delete Attachment	View Attachment
10) Please attach Attachment 10		Add Attachment	Delete Attachment	View Attachment
11) Please attach Attachment 11		Add Attachment	Delete Attachment	View Attachment
12) Please attach Attachment 12		Add Attachment	Delete Attachment	View Attachment
13) Please attach Attachment 13		Add Attachment	Delete Attachment	View Attachment
14) Please attach Attachment 14		Add Attachment	Delete Attachment	View Attachment
15) Please attach Attachment 15		Add Attachment	Delete Attachment	View Attachment

Executive Summary

The RAMPS (Recruiting, Acceleration, Mentorship, Productivity and Sustainability) project, submitted to the **Venture Challenge/Scale**, is an undertaking of the Chattanooga Smart Community Collaborative, with the University of Tennessee at Chattanooga, a founding member, taking the lead. RAMPS adds a proactive entry portal and a skills-based coaching/mentoring system to Chattanooga's already robust entrepreneurial ecosystem in order to strengthen the latter's capacity to recruit a diverse pool of prospective high-growth entrepreneurs and work with them to develop their entrepreneurship skills, their business ideas, and their enterprises to scale, with the purpose of creating and managing a pipeline of entrepreneurs and enterprises in the Energy, Health, and Transportation and Mobility sectors that will ensure sustained economic growth in our community and region in the long run. RAMPS will facilitate this by: (1) strengthening and diversifying the recruiting pipeline for new high-tech, high-growth startups; (2) scaling access to wayfinding, incubation and acceleration through pathways; and (3) increasing productivity via commercialization, company growth and capital investment through the continued development of robust public and private sector partnerships. Our entrepreneurial ecosystem, and the culture of collaboration that drives it, is part of Chattanooga's heritage and identity. The new components of this entrepreneurial infrastructure will be installed, tested and refined during the three-year award period. Post-award, we will leverage our success to demonstrate to local industry and the investment community that there is clear value to them in investing in the pipeline. Their support will help us to expand, fortify and sustain that pipeline.

Location and Region

Primary Service Area and Description of Communities/Regions Served

There was a point in the not-too-distant past when Chattanooga and Hamilton County (FIPS 47065) were better known for the Choo Choo than as an entrepreneurial dynamo; once named on national television as the "dirtiest city in America" by Walter Cronkite, our community has been defined by its reversal and renaissance since that broadcast. A mid-sized city of about 180,000 amidst a county of nearly 370,000, Chattanooga has, in the last decade, launched the first fiber-optic network in North America capable of delivering 1-gig (and now 10-gig) speeds to any home or business, as well as the first Innovation District in a city of its size.

The beating heart of a vibrant, sixteen-county, tri-state region of just over 1 million residents, encompassing both rural and urban areas in Alabama, Georgia and Tennessee, Chattanooga has seen a 9.8% growth in population since the 2010 census. The region itself has experienced an overall GDP growth of 11% between 2014 and 2018, to \$23.2B in Hamilton County and \$27.3B across the MSA. The census estimates a city population approximately 56.6% white, 32.6% black and 6.1% Latino (with a county breakdown of 71.0%, 19.4% and 5.9%, respectively), illustrating the diverse communities which call this region home. A rail and logistics hub, Chattanooga and Hamilton County's centrality puts the nexus of our primary service area within two hours of four other major southern cities and markets: Atlanta, Birmingham, Knoxville and Nashville.

The telling of our region's history often seems to begin the moment Cronkite uttered his line in the 1960s. The growth of the last half-century isn't the whole story, however; it's a history marked by dichotomy and steeped in challenges around equity and opportunity still facing our city, and cities like ours across the country. Chattanooga was a trading post and center for commerce amongst many of the indigenous peoples who inhabited the Southeast; it was also the origin of the Trail of Tears. Chattanooga became home to units of black Union soldiers during the Civil War, as well as many formerly enslaved Americans. When Chattanooga became a hub for disassembling the weapons of that war, opportunities arose for the city's growing population of black residents, former soldiers and the previously enslaved alike: Hardware stores were a mainstay of a vibrant black-owned business community for generations.

Since the 1800s, Chattanooga has been a hub of innovation and entrepreneurship in the Southeast. The Coca-Cola Bottling Company was established here in 1899 for a dollar, creating wealth which endowed philanthropic institutions that continue to invest in next-generation ideas and businesses. Chattanooga has a robust history of entrepreneurial success stories: Sanofi, founded as the Chattanooga Medicine Company in 1879, now produces 22 global brands; Unum, an international insurance company, opened in 1887 as Provident Life and Accident Insurance Company. And today, nationally-recognized innovators such as Branch Technologies, Bellhop and FreightWaves are on the forefront of a tech-driven wave of growth.

Chattanooga is also home to an increasing number of venture investment funds, which have raised approximately \$60 million for their portfolios and related investments in the Chattanooga area since 2010. Chattanooga's infrastructure and entrepreneurial legacy have attracted the attention of several national partners and ecosystem builders. In 2016 the Kauffman Foundation published *Little Town, Layered Ecosystem: A Case Study of Chattanooga*¹ highlighting an entrepreneurial ecosystem galvanized by multi-stakeholder partnerships and community collaboration and a myriad of organizations, and the work has continued unabated.

Community Needs and Opportunities:

This region has perhaps never been better poised for explosive growth, with a Chattanooga Smart Community Collaborative-supported ecosystem in place to support broader, more equitable entrepreneurial economic impact - but needs additional support to further activate that potential, expanding pathways for diverse participation in entrepreneurship, increasing mentorship and better connecting activities to regional talent-bases and market potential. Three areas in particular offer unique, regional opportunities to spur high-growth entrepreneurship - (1) Energy, (2) Health and (3) Mobility and Transportation - with data from the Chattanooga Chamber of Commerce indicating that 14% of all private-sector jobs within the region fall into those three areas.

Energy: In 2008, EPB started constructing America's largest community-wide, 100% fiber optic network, ubiquitously linking all of the Chattanooga area's electrical infrastructure to the more than 170,000 homes and businesses across EPB's 600 square mile service territory. A study by the University of Tennessee at Chattanooga estimates that EPB's infrastructure has contributed to the creation of as many as 5,200 local jobs during the first five years, and more than a \$1B in economic impact over that same time period. EPB's Gig Network and Smart Grid have also made Chattanooga a real-world laboratory for testing new technologies, developing real-world applications and analyzing power usage data. Through U.S. Department of Energy research programs, for example, EPB is working with Oak Ridge National Laboratory (ORNL) and nearly 20 other research institutions to develop best practices for modernizing the power grid across the United States. The presence of the Tennessee Valley Authority and its more than 3,400 local employees further illustrates the depth of the talent pool and breadth of potential markets.

Health: Chattanooga's rapidly growing healthcare industry plays a crucial role in driving the region's economy and has fueled an equally explosive startup sector. Chamber data notes that six of the region's largest employers, accounting for nearly 20,000 full-time jobs, are within the healthcare industry, including Erlanger Health System, the 10th largest public hospital system in the country and a University of Tennessee teaching hospital; BlueCross BlueShield of Tennessee, the state's largest insurer; and Unum, the world's largest disability insurer. CO.LAB's HealthTech Accelerator, a crucial part of the ecosystem, focuses on advancing innovation in the healthcare industry by connecting promising startups with these leading legacy healthcare organizations in the Chattanooga region.

¹ https://www.kauffman.org/-/media/kauffman_org/research-reports-and-covers/2016/chattanooga_entrepreneurship_ecosystem_study.pdf

Transportation and Mobility: Located at the very heart of the United States’ southeastern “freight alley,” Chattanooga has been called “The Silicon Valley of Trucking.” An estimated 40% of local industry is logistics dependent, with national carriers like US Express, Coyote and FreightWaves, and supply chain VC firm Dynamo Ventures, headquartered locally. In addition to a strong logistics sector, Chattanooga boasts unique assets for mobility research and commercialization. EPB partnered with the Center of Urban Informatics and Progress (CUIP) at the University of Tennessee at Chattanooga to establish an Autonomous Vehicle Test Corridor - utilizing a camera system and a variety of speed, audio and air quality sensors - along Downtown Chattanooga’s Martin Luther King Boulevard, creating a test-bed for innovative mobility solutions.

Description of the Proposed Project

The Challenge and the Opportunity

Unlike large metropolitan areas, small to mid-sized communities such as Chattanooga do not have the luxury of a large pool of proven serial entrepreneurs from which to draw in order to take promising high-growth, high-tech ideas to market. We must *develop* our entrepreneurial pool, oftentimes from scratch. This requires building a mechanism that supports entrepreneurs in developing the skills they need to successfully move their ventures through the stages of the business lifecycle toward growth and sustainability. We think of this as our “pipeline of entrepreneurs and enterprises.” Maintaining this pipeline allows us to manage its volume and flow; that is, both the number of enterprises and the quality of the entrepreneurs (as measured by their skill levels) and of their enterprises (as indicated by their stage in the business lifecycle). We can “map” and monitor these indicators, permitting us to adjust our strategies and tactics as we scale our efforts.

All of this is important because, while ideas and inventions are essential to the entrepreneurship-based economic development process, preparing entrepreneurs capable of innovation – getting these ideas to the markets that need them – is paramount. As venture capitalists often assert, they would rather work with a strong entrepreneur or entrepreneurial team with a weak idea than a weak entrepreneur/team with a strong idea. Yet, these same VCs often approach finding this entrepreneurial talent as an exercise in trying to accurately pick winners from an existing pool, when they would arguably be better served by investing in the development of the talent pipeline, what we call pursuing a ‘developmental’ strategy. Such an approach to fostering high-growth entrepreneurship has several advantages: (1) it places the focus on the entrepreneur, who drives the business; (2) it makes entrepreneurship a ‘big tent’ activity, providing support to all who are properly motivated, thereby diversifying the entrepreneurial pool; (3) it delivers the sustained support essential to entrepreneur development, which takes time if it is to be done well; (4) it prepares entrepreneurs to effectively use the resources of the ecosystem, insuring they are getting assistance that is tailored to their skill level; and (5) it permits the measurement and tracking of process outputs and outcomes – changes in skill level and movement in the business lifecycle – that are the stepping stones to economic outcomes and impact.

Two crucial elements of a developmental entrepreneurship strategy are a strong entrepreneurial ecosystem and robust local industry partnerships. Chattanooga’s ecosystem is particularly robust, encompassing, among other attributes, three core incubators; several national accelerator programs; a pipeline of neighborhood- and population-focused non-profits offering entrepreneurial programming and support; VC funds, local Kiva crowdfunding and a philanthropic pivot towards small business investment; extensive K-12 and higher education entrepreneurship opportunities; a vibrant Startup Week (now in its 6th year); and more informal, distributed networks through numerous events and meetups, with many of these partners and activities clustered within our downtown Innovation District. Add to this collaboration with **Energy** stalwarts EPB, Oak Ridge National Laboratory (ORNL) and the Tennessee Valley Authority (TVA); major **Health** industry players like Blue Cross-Blue Shield of Tennessee, Erlanger Health Systems, and Unum; and **Transportation and Mobility** entities that include CARTA, Covenant Transport, FreightWaves, U.S. Express and Volkswagen, and we have all of the ingredients for scaling high-growth, high-tech entrepreneurship as a means to expand and sustain a vibrant economy. While these ingredients are essential, the key to success is effectively organizing them to maximize the volume and flow of the region’s pipeline of entrepreneurs and enterprises.

Proposed Solution

Recruiting, Acceleration, Mentorship, Productivity and Sustainability (RAMPS) is a project being undertaken by the Chattanooga Smart Community Collaborative (CSCC), with the University of Tennessee at Chattanooga (UTC), a founding partner, taking the lead. CSCC works to cultivate an ecosystem of academia, industry and community to develop and apply innovative solutions to authentic challenges in Chattanooga while leveraging our community assets in order to thrive in the new economy; our vision is for Chattanooga and the region to reach its full potential as a community of the future, providing workers with advanced workplaces, students with a full array of learning opportunities and the community as a whole with smart city services and a high quality of life.

RAMPS facilitates the achievement of this mission and vision by scaling a **three-stage strategy** with our community's vibrant entrepreneurial ecosystem at its core, with a focus on startups within the three key sectors of the regional economy: Energy, Health, and Transportation and Mobility. We seek to support the development of the community's entrepreneurs, as opposed to "picking winners," by implementing mentoring mechanisms that support the advancement of their skills so that they can more effectively build and scale their companies. RAMPS will facilitate this by: (1) strengthening and diversifying the recruiting pipeline for new high-tech, high-growth startups; (2) scaling access to wayfinding, incubation and acceleration through pathways, which include CSCC partner CO.LAB's GIGTANK 2.0; and (3) increasing productivity via commercialization, company growth and capital investment through the continued development of robust public and private sector partnerships.

(1) Strengthening & diversifying the pipeline

RAMPS will build and manage a complete pipeline of entrepreneurs and their enterprises, in the targeted economic sectors, that activates talent and accelerates growth. The focus is on the entrepreneur and helping her or him to develop the skills needed to move from idea to successful venture. This process begins with the active recruitment of entrepreneurs and commercializable ideas by leveraging relevant industry partnerships with local roots, with the help of CSCC and industry partners, such as EPB. Industry drives idea creation through its innovation efforts, and many of these ideas are ripe for further development outside the company where they originate. Recruitment can also be achieved by tapping academic creativity and talent through UTC and its Center for Urban Informatics and Progress (CUIP) and its Center for Innovation and Entrepreneurship (CIE), and in coordination with such local assets as the Global Center for Digital Fabrication at Chattanooga State Community College.

UTC has recently created the position of Commercialization Counselor, which is housed in the CIE and reports to the Vice-Chancellor for Research. This position recruits faculty and graduate student inventors from engineering, computer science, data analytics and health sciences, among other fields and coordinates support for the development of their products and businesses from the University and the larger community in the forms of assistance with preparing proposals to the NSF's SBIR program, liaising with I-Corps South at Georgia Tech University, workshops on IP protection, customer discovery, etc. and connections with Chattanooga entrepreneurial ecosystem partners. Another UTC-based source of idea identification and product development support is the Center for Urban Informatics and Progress (CUIP), which has expertise in and linkages to the health and mobility sectors of the economy. UTC's growing relationship with the Oak Ridge National Laboratory (ORNL) is vital to our commercializable idea identification effort as well. In this way, UTC can help RAMPS to identify both high-growth ideas in Energy, Health, and Transportation and Mobility and a wide network of entrepreneurs with long-term potential for success.

Our **outreach and engagement plan**, then, will be led by UTC, drawing upon the networks and expertise of CUIP, CIE and the Commercialization Coordinator. UTC will reach across its campus and into the community for promising business ideas and prospective entrepreneurs. CO.LAB's and The Enterprise Center (TEC)'s strong institutional partnerships

throughout the region will also provide networks for recruiting and engaging entrepreneurs. EPB will assist with recruiting efforts among local industries.

(2) Scaling access to wayfinding, incubation and acceleration

Once entrepreneurs are recruited and matched with strong ideas, if they are not bringing their own, their entrepreneurship skills will be assessed, using a tested, Web-based tool, co-created by a UTC professor, called the Readiness Inventory for Successful Entrepreneurship (RISE). The RISE permits a clinical assessment of skill weaknesses and strengths for 30 essential skills of successful entrepreneurship.² The results of the assessment can be employed to create an action plan for addressing skill weaknesses and leveraging strengths, which can be used to inform mentorship and map the entrepreneur's path through the ecosystem. The first RISE assessment acts as a skills baseline to which periodic future assessments can be compared to determine the entrepreneur's progress in building her or his skills, to facilitate mentorship pivots as necessary, and to make strategic matches to assistance providers in the entrepreneurial ecosystem. The RISE assessments are taken in collaboration with a mentor, who works with the entrepreneur throughout their development period in the ecosystem. Mentors are experts drawn from local industry, academia and entrepreneurship support organizations (such as the local TSBDC and SCORE, among others).

Strategic access to the ecosystem is afforded through wayfinding resources and ecosystem-mapping tools provided by partner organizations that include essential partners CO.LAB and The Enterprise Centers well as collaborators such as the Chattanooga Area Chamber of Commerce's INCubator. These mechanisms will help entrepreneurs to orient themselves and find collaborators, at any stage in the development of their idea/venture. They are also useful tools for the mentors, as they guide the development of their entrepreneurs' skills and ideas.

(3) Increasing productivity via growth and capital investment

Some entrepreneurs will develop their skills and grow their ventures faster than others, but all entrepreneurs in the RAMPS pipeline are moving toward the same place – where they are ready to accelerate their venture's growth. In the acceleration phase of RAMPS, yearly accelerator programs and CO.LAB's GIGTANK 2.0 will work with those who are ready to move to market and scale faster. In support of this work, RAMPS provides access to capital via a breadth of industry partnerships and local venture capital funds.

GIGTANK, CO.LAB's technology focused startup accelerator was launched in 2012. For years, the focus of GIGTANK was to support startups who needed access to a high-speed low-latency network to validate technology solutions and grow their business. As the only U.S. city with a Gig speed (1,000 Mbps) fiber network, Chattanooga offered B2B and B2C startups a unique opportunity to validate and refine business models and technology using the most advanced network in the nation. During its brief history, GIGTANK has attracted startups from across the U.S., Europe, and Asia to spend time in Chattanooga to launch or scale their businesses. In 2020, CO.LAB will launch GIGTANK 2.0 using technology and collaboration tools to deliver education, mentoring, networking, and access to technical and functional experts in both live (as it makes sense) and virtual formats. Recruiting will focus on high-tech high-growth startups that complement the region's strengths in the energy, health, and transportation/ mobility sectors. Additional efforts will be devoted to educating participants on the SBIR/STTR programs with emphasis on identifying and responding to relevant topics. Chattanooga's Gig speed fiber network is stronger and faster than ever (now offering 10 gigabit speeds), and the entrepreneurial infrastructure has matured to include multiple incubators, accelerators, and support organizations working not as competitors but as a broad coalition of entities focused on leveraging their strengths to contribute to the

² [More detailed information on the RISE can be found in Lyons, Lyons, & Jolley (2019). The Readiness Inventory for Successful Entrepreneurship (RISE): A tool for university engagement in entrepreneurial learning. *Journal of Economic Development in Higher Education*, 7 (July): 1-7].

common goal of building a smart, connected, community of the future. GIGTANK 2.0 will leverage Chattanooga's technology leaders and infrastructure to improve the strength and resilience of participating startups.

Formerly a traditional 12-week accelerator program, GIGTANK helped to advance high-tech startups from myriad sectors. The program achieved success by leveraging industry expertise from regional partners and national supporters. The GIGTANK 2.0 program is designed as a 6-week program incorporating virtual and on-site engagement. GIGTANK 2.0 will build upon the success of the legacy platform by leveraging the collective resources of the CSCC and additional regional partners including TVA, Oak Ridge National Laboratory and local freight and logistics leaders. Each week, participants will be exposed to both industry specific and startup focused workshops, coaching sessions, and the ability to meet with functional mentors to discuss specific issues related to accounting, legal, and intellectual property concerns. The program's focus on startups operating in sectors that reflect the region's competitive strengths (health, transportation, and energy) best position us for positive economic development outcomes. The vision for GIGTANK 2.0 is to attract high-tech entrepreneurs and provide access to programs, networks, and resources that will enable them to create and commercialize advanced solutions at scale and promote both direct and indirect economic value to the region.

A large part of the success of CO.LAB and the growth of the region's entrepreneurial ecosystem is strong, early support from community partners. In recent years, however, a level of investor fatigue has set in among local investors. As a companion initiative to the RAMPS program, CO.LAB will submit an EDA Capital Challenge grant proposal to support the development and launch of the Chattanooga Regional Catalyst Fund (CRCF), a \$5M evergreen fund to support investment in GIGTANK 2.0 companies and other regional startups in the Health, Transportation, and Energy sectors.

Underlying, and crucial to, all of this activity is the **network of mentors** who will work with entrepreneurs to assess and develop their skills, refine their ideas, and successfully navigate the ecosystem on the way to scaling their ventures. They are the thread that runs through the entire RAMPS tapestry. As noted above, mentors will be recruited from the community. A core group of mentors will also be provided by CSCC partner EPB. They will be individuals with strong backgrounds in business coaching, entrepreneurship, business management and/or leadership. Their role will be that of *coach* to the entrepreneurs in the RAMPS pipeline. This means that they will not serve as expert advisors, although they may make referrals to such advisors in the ecosystem. Instead, they will ask insightful questions that force entrepreneurs to reflect on their practice and modify it appropriately as well as seek out additional knowledge. They will assign "homework" that encourages entrepreneurs to think through and solve problems for themselves. They will connect their coachees to networks that facilitate access to information and resources they require for success. They will also help their coachees to make sense of and successfully navigate the complexities of the Chattanooga entrepreneurial ecosystem. The RISE will be the tool that they use to assess their coachee's skill development needs and to co-create a dynamic plan for addressing skill weaknesses. Once recruited, RAMPS mentors will be trained in the use of the RISE and in RISE-based coaching by the team at UTC's Center for Innovation and Entrepreneurship.

To summarize, the RAMPS project proposes to leverage the assets and networks of our already strong entrepreneurial ecosystem to scale our region's economic development. We will do this by focusing on the development of entrepreneurs and their businesses in the Energy, Health, and Transportation and Mobility sectors of our economy. We will intentionally identify and recruit motivated entrepreneurs, with an eye to maximizing diversity in this pool. Some will come with their own business ideas, while others will be matched with promising ideas curated from academia and industry. We will create a mentoring system to guide these entrepreneurs as they work to build their skills and grow their companies, through skills assessment and tracking, coaching, and wayfinding through the ecosystem. When

entrepreneurs are ready, we will assist them with the business acceleration support and access to financing they will need to scale their enterprises and collectively contribute to the sustained economic growth of our community and region. The following table provides a full accounting of the RAMPS applicant (UTC)'s key personnel and that of the essential partners, their roles and their contributions to the project.

Applicant's and Essential Partners' Key Personnel

UTC Center for Innovation and Entrepreneurship	Thomas S. Lyons, Ph.D. – Clarence E. Harris Chair of Excellence in Entrepreneurship. Dr. Lyons will serve as the Project P.I.; assist with RISE and RISE coaching training for mentors; and co-develop entrepreneur development and commercialization programming.
	Libby Santin - Director of CIE. Ms. Santin will assist with recruiting; assist with RISE and RISE coaching training for mentors; co-develop and deliver entrepreneur development and commercialization programming; and liaise with the UTC Commercialization Counselor in supporting UTC inventor/entrepreneurs.
UTC Center for Urban Informatics and Progress	Mina Sartipi, Ph.D. - Founding Director of CUIP, UTC Professor, & Lead Scientist of CSCC. Dr. Sartipi will facilitate idea and entrepreneur recruitment and assist in making connections with CUIP resources and talent.
UTC Research	Reinhold Mann, Ph.D. - UTC Deputy Vice Chancellor for Research – Outreach and National Lab Liaison and CSCC Lead Scientist. Dr. Mann will ensure availability of committed UT and UTC resources and assist with idea and entrepreneur recruitment.
	Jennifer Skjellum – UTC Commercialization Counselor. Ms. Skjellum will recruit faculty and graduate student inventors from engineering, computer science, data analytics and health sciences, among other fields and coordinate support for the development of their products and businesses from the University and the larger community in the forms of assistance with preparing proposals to the NSF's SBIR program, liaising with UTRF and I-Corps South at Georgia Tech University, workshops on IP protection, customer discovery, etc. and connections with Chattanooga entrepreneurial ecosystem partners.
CO.LAB	Marcus Shaw – CEO of CO.LAB. Mr. Shaw will coordinate with the CO.LAB team to ensure the successful implementation of RAMPS-related acceleration activities and services, including GIGTANK 2.0; oversee evaluation and reporting; liaise with regional businesses and institutions.
The Enterprise Center	Debra Socia – Director of The Enterprise Center. Ms. Socia will oversee the work of the four-member TEC team in its entrepreneur recruiting, ecosystem path identification and network strengthening, mentor recruitment and support, data collection and analysis, and outputs/outcomes reporting activities.
EPB	Lilian Bruce – Senior Director of Strategic Planning at EPB. Ms. Bruce will supervise the work of EPB's RAMPS mentors, efforts to recruit ideas and entrepreneurs to the project from industry, and panel and competition judging support to CO.LAB.

Scope of Work

Recruiting

- Outreach through industry channels, Years 1-3 (CUIP, TEC, UTC Commercialization Counselor, UTC VCR, EPB)
- Outreach through academic channels, Years 1-3 (UTC Commercialization Counselor, CUIP, CIE)
- Outreach through community/institutional channels, Years 1-3 (CO.LAB, TEC)

Access and Acceleration

- RISE skills assessment of each participating entrepreneur, Years 1-3 (CIE)
- Matching entrepreneurs to ideas, if needed, Years 1-3 (CO.LAB)
- Matching entrepreneurs to mentors, Years 1-3 (CIE, CO.LAB, TEC)
- Entrepreneurial Ecosystem wayfinding and path identification, Year 1 (CO.LAB, TEC)
- Strengthening Entrepreneurial Ecosystem networks, Years 1-2 (CO.LAB, TEC)
- Developing and strengthening industry-specific incubator programs, Years 1-2 (CO.LAB, TEC)
- Developing and launching GIGTANK 2.0, Year 1 (CO.LAB)
- Panels, judges in support of GIGTANK 2.0 (EPB)

Productivity, Commercialization and Growth

- Delivery of commercialization support programs and activities, Years 1-3 (UTC Commercialization Counselor, CUIP, CIE)
- Delivery of SBIR workshops, Years 1-3 (CO.LAB, UTC)
- Delivery of investor pitch events and VC meetings, Years 1-3 (CIE, CO.LAB)
- Delivery of GIGTANK 2.0, Years 1-3 (CO.LAB)
- Staging industry showcases, Years 2-3 (EPB, CO.LAB, TEC)

Mentorship

- Mentor recruitment, Year 1 (and ongoing, as needed) (CIE, CO.LAB, EPB, TEC)
- Building an Industry Mentor Network, Year 1 (CO.LAB, CIE, EPB, UTC Commercialization Counselor)
- RISE skills assessment training, Years 1-3 (CIE)
- RISE coaching training, Years 1-3 (CIE)
- Mentor oversight, Years 1-3 (CIE, CO.LAB)
- Mentor support, Years 1-3 (CIE, CO.LAB, TEC)

Process and Outcomes Evaluation and Reporting

- Purchase and install data and client management system, Year 1 (CO.LAB, CIE)
- Data collection and analysis of entrepreneurship skills development using the RISE software, Years 1-3 (CIE)
- Data collection and analysis of other output and outcomes measures, Years 1-3 (CO.LAB, CIE, TEC)
- Process and outcomes report preparation and delivery, Years 1-3 (CO.LAB, CIE, TEC)

Project Timeline

The RAMPS project will run from October 1, 2020 to September 30, 2023; however, all of the programs and support activities will continue beyond the grant period. An accounting of the expected start and project completion dates, with major milestones over the course of the project are presented below:

Date	Major Milestones
10/1/2020	Expected project start date
	Organizational meeting of RAMPS Team
11/1/2020	Entrepreneur and idea recruiting process begins (ongoing)
	Mentor recruiting process begins (ongoing)
12/1/2020	Data and client management system acquired and installed (completed 1/1/2021)
	RISE assessment and coaching training for mentors begins (ongoing)
1/15/2021	Mentors begin work with entrepreneurs (ongoing)

2/1/2021	Commercialization and growth support activities begin (ongoing)
	Wayfinding and path identification work begins (ongoing)
	Ecosystem network strengthening work begins (ongoing)
	Industry-specific incubator work begins (ongoing)
6/1/2021	GIGTANK 2.0 is first launched in RAMPS (6-week duration; annual)
9/30/2021	First-year annual report delivered
9/30/2022	Second-year annual report delivered
9/30/2023	Final RAMPS report delivered
	Expected project completion date

Anticipated Impacts

Program Activities	Three-Year Metrics/Tracking Mechanism
Outputs	300 prospective entrepreneurs recruited (Affinity) 72 industry-specific incubator participants (Affinity) 24 companies accelerated through GIGTANK 2.0 (Affinity) 150 qualified mentors trained and added to network (Affinity) 100 workshops and training sessions delivered (Affinity) Over 200,000 hours of mentoring delivered (Affinity)
Outcomes	Over 90% of participating entrepreneurs experience a skill-level increase (RISE) \$5 million in investment capital raised (Affinity) \$4 million of capital raised through loans, and grants (including SBIR/STTR) through GIGTANK 2.0 (Affinity) 300 jobs created or retained (Affinity) 35 new Chattanooga based high-growth startups (Affinity) 48 meetings with potential investors, high-revenue clients or SBIR/STTR program managers through GIGTANK 2.0 (Affinity) 8 SBIR/STTR award applications supported through GIGTANK 2.0

Data & Client Management

The Affinity software platform is a secure data and client management tool that provides the RAMPS Team with an AI enabled capability to capture data and improve interaction with stakeholders throughout the ecosystem. By using Affinity, team members can capture information and gain insights on every person and entity touched by the project. The tool will reduce administrative tasks, allowing the team to automate workflows such as capturing contact information and gathering business intelligence. Affinity also automatically tracks each interaction with program

participants and delivers relationship intelligence to enhance interaction with prospects, mentors, trainers, investors, and partners. Finally, Affinity allows users to set reminders and triggers to encourage proactive outreach and interaction to improve recruiting and relationship management. The RISE software (see p. 5) will be used to track skill-level changes in participating entrepreneurs.

Sustainability Plan

There are several risks inherent in this project. The key is to manage these risks, to make taking them possible, while mitigating the potential for failure. Each identified risk follows, with a plan for managing it:

- **Risk 1:** With scale comes an increased responsibility for recruitment, access through wayfinding tools and events, incubator and accelerator activities, mentorship network growth and supports and consequently impact on long-term resource adequacy. While the CSCC will be able to share some of this risk, additional resources and increased capacity will nonetheless be asked of UTC and partners like CO.LAB.
Management: This proposal represents **the next phase of evolution of our current ecosystem** – we are scaling on existing success. Sustainability involves long-term investment, and **Chattanooga’s very identity remains tied to precisely that commitment.**
- **Risk 2:** Capacity-building within a working pipeline can cause unintended ruptures, or divert its course. Supporting and managing a critical mass within the ecosystem while energizing new activity requires balance.
Management: By encompassing both **short- and long-term strategies** – recruiting high-growth startup ideas while developing entrepreneurial capacity in those on the cusp – we are **betting not on a single lottery ticket, but the overall growth of the ecosystem.**
- **Risk 3:** For Chattanooga, the **potential loss of entrepreneurs and their enterprises to larger markets** post-incubation (with Atlanta, Nashville, Birmingham, and Knoxville all within a two-hour drive) remains a risk.
Management: Robust infrastructure, mentorship and guidance from industry on high potential growth ideas and testbed infrastructure, as well as access to the assets of the CSCC, can answer the question, “Why Chattanooga?”
- **Overall:** Our proposal focuses on **developing ongoing relationships** rather than a series of events. While outcomes are both possible and intended from the latter, it is the former which builds a strong, resilient foundation for sustained and sustainable growth.

Forecast of Post-award Period Operations: At its essence, the RAMPS project is adding a proactive entry portal and a skills-based mentor/coaching system to the existing ecosystem. The purpose is to strengthen the latter’s capacity to recruit a diverse pool of prospective high-growth entrepreneurs and work with them to develop their entrepreneurship skills, their business ideas, and their enterprises to scale. This will allow for creating and managing a pipeline of entrepreneurs and enterprises in the Energy, Health, and Transportation and Mobility sectors that will ensure sustained economic growth in our community and region in the long run. Our entrepreneurial ecosystem, and the culture of collaboration that drives it, is part of Chattanooga’s heritage and identity. It is not going away. The new parts of this entrepreneurial infrastructure will be installed, tested and refined during the three-year award period. Post-award, we will leverage our success to demonstrate to local industry and the investment community that there is clear value to them in investing in the pipeline. Their support will help us to expand, fortify and sustain that pipeline into the future.

Vice Chancellor for Research

Dept 4905
615 McCallie Avenue
Chattanooga, TN 37403
Phone: (423) 425-4431
Fax: (423) 425-4052

June 9, 2020

Dear members of the U.S. EDA Grant review team:

I wish to express my support for the grant proposal entitled, “Recruiting, Acceleration, Mentorship, Productivity and Sustainability (RAMPS) for Chattanooga”, which is designed to scale the growth of a regional network of entrepreneurs, resulting in a robust increase in high growth, high-tech entrepreneurship activity that will drive significant economic growth and development.

As Vice Chancellor for Research at the University of Tennessee at Chattanooga (UTC), my mission is to promote research, creative activities, and engagement through comprehensive support to faculty and staff in the pursuit of partnerships and innovation for the Chattanooga region and surrounding areas. The RAMPS project directly aligns with my office's mission and UTC's strategic plan for research investments. I strongly support this program and have invested significant cost-share commitments to ensure its success. UTC will support the RAMPS program by reassigning the effort of the PI, Dr. Thomas Lyons and Co-PIs Libby Santin, Dr. Reinhold Mann, and Dr. Mina Sartipi as described in the project's budget narrative. In addition to personnel effort (salary, associated fringes, and associated indirect costs), matching funds will also be allocated to provide half of the effort of Commercialization Consultant, Jennifer Skjellum.

In total, the University of Tennessee Chattanooga plans to contribute \$425,974 as cost-share to the RAMPS program. The matching funds aforementioned will be committed to the project for the period of performance, will not be conditioned or encumbered in any way that may preclude their use consistent with the requirements of EDA investment assistance, and will be available as needed.

I again offer my enthusiastic support for the efforts outlined in the RAMPS Proposal. Thank you for your consideration.

Regards,



Joanne G. Romagni, Vice Chancellor for Research

June 11, 2020

Dr. Tom S. Lyons
Clarence E. Harris Chair of Excellence in Entrepreneurship
University of Tennessee at Chattanooga
615 McCallie Avenue Chattanooga, TN 37403

Dear Dr. Lyons:

As the CEO of The Company Lab (CO.LAB), I greatly appreciate the opportunity to collaborate with the University of Tennessee at Chattanooga (UTC). Under the Chancellor's and your leadership, we have established a valuable partnership with UTC, specifically the Rollins College of Business and the College of Engineering. We are now better able to leverage the fresh talent, ideas and entrepreneurial spirit of the next generation of researchers and business owners in the Tennessee Valley.

In recent years, along with the City of Chattanooga, Hamilton County and its major allies such as The Enterprise Center (TEC) and Launch TN, CO.LAB has put forth tremendous energy and movement toward nurturing and strengthening the entrepreneurial ecosystem in the Scenic City. CO.LAB is not alone and is highly supported in its mission to increase the capacity and viability of startups in the Chattanooga region by connecting entrepreneurs with expertise, resources and community. It is in this spirit of partnership and Chattanooga "Can-Do" that we are entering the Build-to-Scale Venture Challenge along with UTC, EPB, and The Enterprise Center, to further drive impact in the innovation ecosystem.

The RAMPS program as described in the Venture Challenge application is the perfect opportunity for enhanced collaboration and new partnership programs for CO.LAB and UTC. For this reason, CO.LAB will partner with UTC on this grant to provide commercialization opportunities, mentorship, and entrepreneurial programming, as outlined in the grant proposal, through our GIGTANK 2.0 program.

In total, the CO.LAB plans to contribute a total of \$546,411 as cost-share to the RAMPS program. The matching funds aforementioned will be committed to the project for the period of performance, will not be conditioned or encumbered in any way that may preclude its use consistent with the requirements of EDA investment assistance, and will be available as needed.

We look forward to enhancing our collaboration with UTC and to furthering the success of commercialization and entrepreneurship in the Chattanooga region.

Thank you,



Marcus Shaw
Chief Executive Officer



June 8, 2020

Dr. Thomas Lyons
Clarence E. Harris Chair of Excellence in Entrepreneurship
Gary W. Rollins College of Business, UTC
615 McCallie Avenue
Chattanooga, TN 37403

Dear Dr. Lyons:

We have been very fortunate to have the Chancellor's and your leadership at the University of Tennessee at Chattanooga (UTC) in helping to grow our innovation ecosystem. Since he assumed leadership in 2013 and joined the board of directors at The Enterprise Center (TEC), UTC's engagement in the community has significantly increased, and we could not be more enthusiastic of our support for this collaborative Venture Challenge proposal through EDA's Office of Innovation and Entrepreneurship.

The Enterprise Center, a non-profit economic development partner to the City of Chattanooga and Hamilton County region, unites people, organizations and technology to build an advanced and inclusive future for our community, with a focus on equity, collaboration, economic mobility and Smart City innovation. Chattanooga's Innovation District, supported by TEC and located in the heart of downtown, offers dense, heavily-resourced collision space where prospective entrepreneurs can come together to create and collaborate. And, as the front door of the Innovation District, The Edney Innovation Center offers a hub for Chattanooga's entrepreneurs to further access resources, grow and connect within the Innovation District.

The Enterprise Center, through its work with the Chattanooga Smart Community Collaborative, also focuses on research and development to build a smarter and more connected community. In leveraging the gig and other emerging technologies to improve civic life and grow our local economy - including in the healthcare, energy and transportation sectors - numerous avenues for innovative, high-growth entrepreneurship continue to emerge.

The RAMPS program, as described in UTC's application, is the perfect opportunity to accelerate and scale support for a diverse community of entrepreneurs, as well as significantly contribute to the region's economic growth in these three key areas. TEC is excited to partner on this proposal, and will dedicate considerable staff time and resources (as outlined in the application) to the project's success. TEC will continue to convene meetings and networking events with community partners, mentors, investors and business leaders to ensure the collaborative has access to the people and infrastructure they need to make this project successful. and in order to further grow a thriving economy centered around entrepreneurship and innovation.

In total, The Enterprise Center plans to contribute a total of \$219,425 as cost-share to the RAMPS program. The matching funds aforementioned will be committed to the project for the period of performance, will not be conditioned or encumbered in any way that may preclude its use consistent with the requirements of EDA investment assistance, and will be available as needed.

Sincerely,

Deb Socia

Deb Socia
President and CEO

June 9, 2020



Energy, Connectivity & Community

Thomas S. Lyons, Ph.D.
Clarence E. Harris Chair of Excellence in Entrepreneurship and
Professor of Marketing & Entrepreneurship
University of Tennessee Chattanooga
615 McCallie Ave
Chattanooga, TN 37403

**Re: EDA 2020 Build to Scale Program Funding Opportunity - Helping Entrepreneurs Scale:
Recruiting, Acceleration, Mentorship, Productivity and Sustainability (RAMPS)**

Dear Mr Lyons:

Established as an independent board of the City of Chattanooga in 1935, EPB is a municipally-owned utility that provides energy and fiber optic communications services as a means of promoting economic development and enhancing quality of life across the local area. EPB serves more than 170,000 homes and businesses in a 600 square-mile area that includes greater Chattanooga, as well as parts of nine surrounding counties in Tennessee and areas of Georgia.

EPB built a ubiquitous fiber optic network in order to support the most advanced and highly automated electric distribution system in the nation. Additionally, the fiber network provides the community 10 Gbps of symmetrical broadband access and supports the research and entrepreneurial ecosystem. In recognition of EPB's groundbreaking infrastructure, the Department of Energy, and Oak Ridge National Laboratory are utilizing EPB's smart grid as a testbed for national model research and development of best practices.

EPB recognizes the value of researchers having the opportunity to test their ideas in a true civic setting using the advanced communications infrastructure. In total, EPB plans to contribute a total of \$124,313 as cost-share to the RAMPS program. The matching aforementioned funds will be committed to the project for the period of performance, will not be conditioned or encumbered in any way that may preclude its use consistent with the requirements of EDA investment assistance, and will be available as needed.

On behalf of EPB and our active role in the Chattanooga Smart Community Collaborative, I look forward to having the opportunity to support the RAMPS program.

Sincerely,

A handwritten signature in black ink, appearing to read 'D. Wade'.

James David Wade
President and CEO, EPB

PO Box 182255
Chattanooga, Tennessee

37422-7255



City of Chattanooga

Mayor Andy Berke

June 5, 2020

Thomas S. Lyons, Ph.D.
Clarence E. Harris Chair of Excellence in Entrepreneurship and
Professor of Marketing and Entrepreneurship
Gary W. Rollins College of Business
University of Tennessee at Chattanooga
615 McCallie Avenue
Chattanooga, TN 37403-2598

Dear Dr. Lyons:

Chattanooga has been very fortunate to have Chancellor Angle's leadership at the University of Tennessee at Chattanooga (UTC) in growing our innovation ecosystem. Since he assumed his role in 2013, UTC has expanded its capacity in the smart cities space, won NSF grant awards in smart cities research, expanded its entrepreneurship education and support capability, created the position of University Commercialization Counselor and further integrated departments across disciplines, while reaching out beyond the University to collaborate on projects with the greater community. The opening this summer of UTC's Center for Innovation and Entrepreneurship's new facility and UTC-Downtown in the Edney Center for Innovation, both within the City's Downtown Innovation District, will serve to further the University's strong support of our ecosystem. I am delighted to support this next phase of work toward increasing the strength and effectiveness of the ecosystem in scaling the high-growth, high-technology entrepreneurship that the RAMPS project would catalyze as part of the U.S. Economic Development Administration's Build to Scale grant program.

We designated Chattanooga's Innovation District in 2015 and it remains the section of our city where entrepreneurs, students, and tech-savvy innovators can creatively collide and collaborate to conceive and implement new ideas. The past several years has seen transformative impacts related to startups and attracting new talent as a direct result of the District, and my staff and I were personally very involved in implementing the 2018 Innovation District Framework Plan, which has furthered the entrepreneurial and research culture that has emerged in the heart of our Downtown.

As the City continues to prioritize smart cities initiatives for our citizens and to build a thriving economy centered on innovation, we look forward to continued collaboration with UTC and the Chattanooga Smart Cities Collaborative.

Sincerely,

Mayor Andy Berke
City of Chattanooga



HAMILTON COUNTY, TENNESSEE
OFFICE OF THE COUNTY MAYOR
JIM M. COPPINGER

June 5, 2020

Thomas S. Lyons, Ph.D.

Clarence E. Harris Chair of Excellence in Entrepreneurship and

Professor of Marketing and Entrepreneurship

Gary W. Rollins College of Business

University of Tennessee at Chattanooga

615 McCallie Avenue

Chattanooga, TN 37403

Dear Dr. Lyons:

Hamilton County supports economic development in Chattanooga and the greater County area through close partnerships and a supportive environment for entrepreneurship. As a participant in the Smart Community Collaborative, our team is thrilled to support the University of Tennessee at Chattanooga (UTC)'s proposed RAMPS project in the U.S. Economic Development Administration's Build to Scale grant program.

The Chancellor's leadership in growing smart cities research and entrepreneurship capacity and capability at UTC has already demonstrated the new opportunities that have resulted in improving our civic services and growing our innovation economy, and the RAMPS project's initiatives will further the momentum you have worked to create over the past several years.

In addition to participating in the Collaborative, I am active as a member of the board of The Enterprise Center. I appreciate small and large opportunities to help students and entrepreneurs, whether it is connecting people for opportunities or helping to generate grant funding for our Innovation District.

As we look to our community's future, Hamilton County is very invested in our students becoming ready for the fast-changing, tech-centered economy; therefore, the County funds and participates in workforce development efforts to ensure that our students and budding entrepreneurs have the skills resources that they need to continue their work locally. RAMPS emphasis on entrepreneurship skill building will support our efforts well.

Again, the County and I are committed to supporting the innovation economy, and the RAMPS project would be an ideal fit in our ecosystem.

Sincerely,

A handwritten signature in blue ink, reading "Jim Coppinger". The signature is fluid and cursive, with the first name "Jim" and last name "Coppinger" clearly legible.

Jim Coppinger

Mayor, Hamilton County

DISCLOSURE OF LOBBYING ACTIVITIES

Complete this form to disclose lobbying activities pursuant to 31 U.S.C.1352

OMB Number: 4040-0013

Expiration Date: 02/28/2022

1. * Type of Federal Action: <input type="checkbox"/> a. contract <input checked="" type="checkbox"/> b. grant <input type="checkbox"/> c. cooperative agreement <input type="checkbox"/> d. loan <input type="checkbox"/> e. loan guarantee <input type="checkbox"/> f. loan insurance	2. * Status of Federal Action: <input checked="" type="checkbox"/> a. bid/offer/application <input type="checkbox"/> b. initial award <input type="checkbox"/> c. post-award	3. * Report Type: <input checked="" type="checkbox"/> a. initial filing <input type="checkbox"/> b. material change
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4. Name and Address of Reporting Entity:
☒ Prime ☐ SubAwardee
 * Name
 * Street 1
 * City
 Congressional District, if known:

5. If Reporting Entity in No.4 is Subawardee, Enter Name and Address of Prime:

6. * Federal Department/Agency: <input style="width: 350px;" type="text" value="U.S. Economic Development Administration"/>	7. * Federal Program Name/Description: <input style="width: 350px;" type="text" value="Cluster Grants"/> CFDA Number, if applicable: <input style="width: 50px;" type="text" value="11.020"/>
8. Federal Action Number, if known: <input style="width: 350px;" type="text"/>	9. Award Amount, if known: \$ <input style="width: 100px;" type="text"/>

10. a. Name and Address of Lobbying Registrant:
 Prefix * First Name Middle Name
 * Last Name Suffix
 * Street 1 Street 2
 * City State Zip

b. Individual Performing Services (including address if different from No. 10a)
 Prefix * First Name Middle Name
 * Last Name Suffix
 * Street 1 Street 2
 * City State Zip

11. Information requested through this form is authorized by title 31 U.S.C. section 1352. This disclosure of lobbying activities is a material representation of fact upon which reliance was placed by the tier above when the transaction was made or entered into. This disclosure is required pursuant to 31 U.S.C. 1352. This information will be reported to the Congress semi-annually and will be available for public inspection. Any person who fails to file the required disclosure shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure.

*** Signature:**
*** Name:** Prefix * First Name Middle Name
 * Last Name Suffix

Title: **Telephone No.:** **Date:**

Embedded Non-PDF File

Filename: GrantApplication.xml

Description: Application Data Fields in XML Format from Grants.gov

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