



Colorado Clinical & Translational Sciences Institute

2024 CCTSI Pilot Grant Program Overview

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CCTSI Pilot Grant Program Director CO-Pilot Grant Program Director <u>TM-Pilot Grant Program Director</u>

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CCTSI Pilot Grant Award Eligibility



Faculty at CCTSI Partner Institutions

Graduate, undergraduate, postdoctoral students, fellows and PRAs are encouraged to participate in Non-Key Roles.

Underrepresented, female, and minority researchers are particularly urged to apply, as the CCTSI intends to contribute to the creation of a research workforce that is representative of the U.S. population.

vuchealth

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CU Anschutz Medical Campus CU Boulder CU Denver Colorado State University University of Colorado Hospital Children's Hospital Colorado National Jewish Hospital VA Eastern CO Health Care System Kaiser Permanente Colorado

https://cctsi.cuanschutz.edu/aboutus/affiliated-institutions

https://cctsi.cuanschutz.edu/funding/membership



What is new in 2024 Pilot Grant Cycle?

- We are in the new NCATS UM1 Cycle (2023-2029)
- We have increased \$\$ amount per Pilot Award!
- Under the new NCATS guidelines, a pilot project should address overcoming a barrier or roadblock in <u>translational</u> <u>science</u> as well as a research question
- No-cost extensions will <u>not</u> be allowed for the 2024 award cycle (all projects must be completed by 7/31/2025)



Exclusions/ Restrictions

- 1. An individual may apply in a Key Role on only one application between the CO-/ CMH-/ CE-Pilots. This restriction is not applicable to the TM-Pilots, nor to Non-Key Roles.
- 2. Key Role individuals on a no-cost extension (NCE) Pilot award are not allowed to apply for the new cycle.
- 3. Applications proposing to continue the work of a previously funded CCTSI Pilot Grant Project are not allowed.
- 4. CCTSI Pilot Grant Awards may not be used to support research conducted outside of the United States. However, proposals that use data or samples collected at international sites through other means may be considered for funding if the portion of the work conducted locally occurs at CCTSI Affiliate Institutions.
- 5. The CTS-Pilot Program **is not designed to** fund "translational research projects" (which are only focused on crossing a particular step of the translational process for a particular target or disease) that <u>do not also address</u> to some extent a generalizable translational roadblock in **translational science.**



2024 Pilot Grant Cycle Timeline

	CO-Pilots	CMH-Pilots	TM-Pilots			
RFA Announcement	11/1/2023	11/1/2023	11/8/2023			
Informational Call #1	11/13/2023	11/13/2023	11/21/2023			
Letter of Intent Due	12/4/2023	12/4/2023	12/11/2023			
Informational Call #2	12/20/2023	12/20/2023	01/03/2024			
Application Due Date	01/16/2024	01/16/2024	01/22/2023			
2024 Award Cycle	<u>08/01/2024 – 07/31/2025</u>					



Translational Methods (TM-Pilot) Grant Program

Speed the development and application of <u>novel</u> technologies, methods, or analytical assays for clinical and translational research that are presently lacking or not available to CCTSI members

Facilitate developing functioning and validated methodologies which are not yet available in Colorado, foster new collaborations, and disseminate new technologies across the CCTSI

Award Categories

Program Director Natalie Serkova, PhD

- Translational Methods
- Biostatistics & Bioinformatics
- Colorado State University (PI)



Translational Methods (TM-Pilot) Grant Program

Amount:\$30KDuration:1 year

Major goals

- Provide support for developing new technologies, assays, algorithms, animal models
- Support new collaborations between a "technology driven PI" and an "application PI"
- Facilitate dissemination of the newly developed technologies
 among CCTSI research community



Review Criteria TM-Pilot



CCTSI Review Panels will use the NIH 9-point scoring system and rate based on following criteria:

- a. Innovation in proposed methods to be developed, approaches, and techniques.
- **b.** Approach/Scientific Merit based on rigor, transparency and <u>one-year feasibility</u> of the proposed study design.
- c. Principal Investigators' research qualification and collaborative potential of team
- **d.** Significance to the CCTSI Vision to "Accelerate and catalyze the translation of innovative science into improved health and patient care."
- e. Translational Science Roadblock: does the Pilot proposal address a <u>translational</u> <u>science roadblock</u> that could be generalizable to other research studies?
- f. Dissemination of the to-be-developed methods/ technology among CCTSI members
- g. Environment and institutional support to the PI and the proposal
- h. Health Equity and Diversity (Non-Scoring Criteria)



Tips for Success

Please make sure that your application includes all scientific sections:

- ABSTRACT: strict 250 words
 - State clearly the scientific problem, your working hypothesis, the proposed methods, and the expected results.
- SPECIFIC AIMS: ½ page
 - usually 2 specific aims,
 - with an additional third one being your Translational Science Roadblock
 - please do NOT copy and paste specific aims from a larger applications (such as yours, or your mentors, R01) – this is a PILOT grant
- Background, Significance and Innovation: 1 and ½ pages
 - here, you can include also your preliminary data (not required)
 - Clearly describes your translational science roadblock
- Approach: 3 pages
 - Experimental Design (don't forget anticipated challenges and alternative approaches)
 - Explain (2-3 sentences) how the rigor of your experimental design and data will address the translational science roadblock(s)
 - Don't forget (i) data analysis and statistics; (ii) shared resources; (iii) feasibility and timeline



Tips for Success

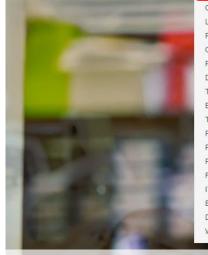
University of Colorado Anschutz Medical Campus

Webmail 🔒 | UCD Access 🔒 | Canvas 🔒 | Quick Links 🗸 | 🝳

Colorado Clinical and Translational Sciences Institute

Resources v

Training 🔻 Funding 👻 Community Engagement 👻 News and Events 💌 About Us 💌 Volunteer for a Study 🖄



Clinical and Translational Research Centers (CTRC) > Language For Your Grant Applications Protocol Submission Clinical Research Support Team (CReST) Regulatory Knowledge and Support DSMB Assistance Translational Informatics > Biostatistics, Epidemiology, and Research Design (BERD) Trial Innovation Network (TIN) Recruit Participants Research Ethics Research Studio Program Find a Researcher (PROFILES) > IT Campus Research Resources 🗹 Early Life Exposures Research Program (ELEP) Dissemination and Implementation What are you looking for?



ACCELERATING RESEARCH TO IMPROVE HEALTH

The CCTSI helps build research teams of the future, speed the development of new treatments and improve human health



CCTSI

Colorado Clinical and Translational Sciences Institute (CCTSI)

UNIVERSITY OF COLORADO DENVER | ANSCHUTZ MEDICAL CAMPUS

https://cctsi.cuanschutz.edu/resources





Colorado Clinical and Translational Sciences Institute (CCTSI)

UNIVERSITY OF COLORADO DENVER | ANSCHUTZ MEDICAL CAMPUS



Regulatory Knowledge and Support

The Regulatory Knowledge and Support Core (RKSC) of the CCTSI provides a support structure to deal with the complexities of research regulatory compliance.



Research Ethics

This free consultative service is sponsored by the CCTSI and is available to all biomedical and behavioral researchers at CU Anschutz, as well as its institutional partners and clinical affiliates, who seek advice about ethically complex aspects of their research.



Trial Innovation Network

The Trial Innovation Network is a new collaborative initiative within the CTSA Program and is composed of three key organizational partners – the CTSA Program Hubs, the Trial Innovation Centers (TICs) and the Recruitment Innovation Center (RIC).



Clinical Research Support Team

Provides a pool of experienced study coordinators and regulatory staff to assist with clinical research study start-up, implementation and closeout.



Biostatistics, Epidemiology and Research Design (BERD)

Providing statistical collaboration and resources to CCTSI investigators and trainees. We facilitate clinical and translational research through statistical consultation, improved statistical ilteracy, through seminars and short courses, and advanced tools.



Recruit Participants

Access the many resources necessary for successful recruitment of participants for clinical research studies. Learn how to develop and implement a well-planned strategy.



Funding

Each year, the CCTSI awards more than \$2 million in pilot grants, microgrants and pre-doctoral and post-doctoral research scholar awards



Language for Grant Applications

CCTSI resources and other support details for your grant applications.



Protocol Submission

The Research Submission Portal process will ensure that your human subject research is ready for IRB submission.



Find a Researcher

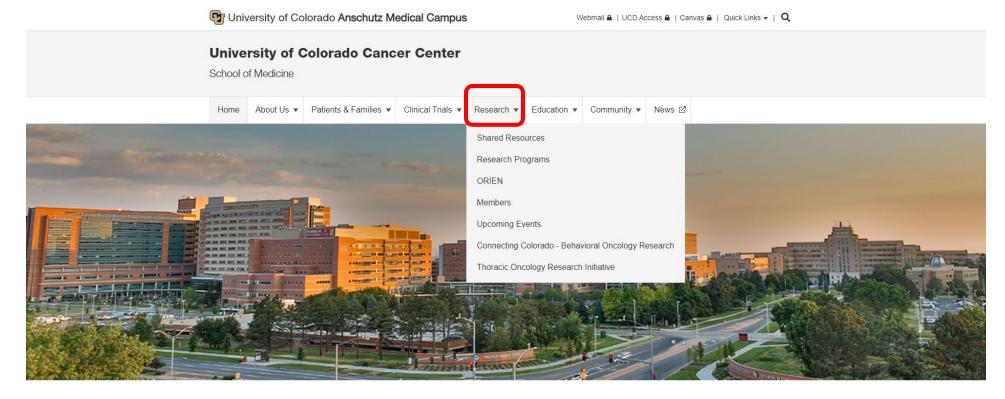
The Colorado PROFILES search engine and social networking platform for biomedical researchers provides tools to help investigators and students find experts, potential collaborators or mentors.



CCTSI Research Studio Program







The CU Cancer Center supports a variety of state-of-the-art technological shared resources – *their incorporation into* <u>**CO/CMH/TM-Pilot**</u> proposals is encouraged!

Animal Imaging – Biostatistics and Bioinformatics – Cell Technologies – Drug Discovery and Development – Flow Cytometry – Functional Genomics – Genomics – Human Immune Monitoring – Mass Spectrometry – Population Health – Structural Biology – Pathology

https://medschool.cuanschutz.edu/colorado-cancer-center#CUMain



HOME FAQ CONTACT

Research Core Labs



One of the defining features of a top-tier research university is the availability of core facilities that provide a spectrum of contemporary analytic tools that can be shared across the campus. Ideally these cores provide both technical and consultative services at modest cost and, as a result, elevate the quality of the overall research enterprise. It is appropriate that the core landscape evolves as new technologies emerge and others become obsolete.

Below is a list to the current operational research cores supported by the School of Medicine and the research leadership on the Anschutz Medical Campus.

Search our Core Labs

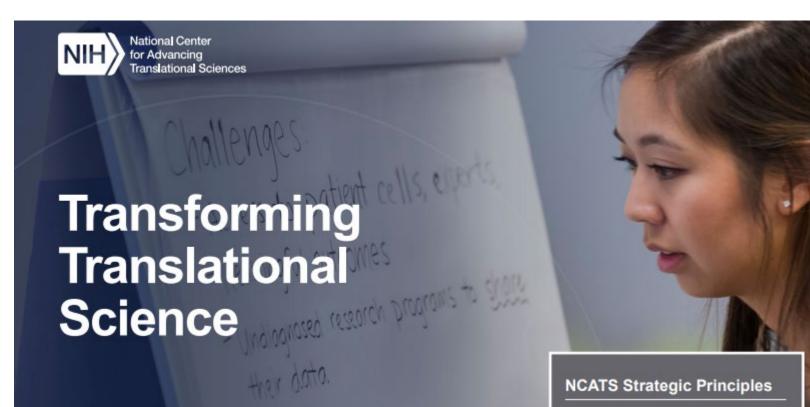
Keyword or Phrase

Q

e.g., biomarker, data analysis, flow cytometry, genetic screen, proteomics

https://researchcores.cuanschutz.edu/





Whereas "translational research" focuses on crossing a particular step of the translational process for a particular target or disease, <u>translational science</u> is focused on the general case that applies to any/multiple targets or diseases.

A key tenet of <u>translational science</u> is to understand common causes of inefficiency and failure to complete translational research projects in a timely fashion, which may present a common barrier across various research targets, diseases, and therapeutic areas.



Examples of Translational Science Roadblocks

In the application, the PI must state clearly what is your "<u>translational</u> <u>science roadblock</u>" that you will be addressing in your proposal:

- improved study design by improving rigor and transparency in major generalizable areas of translational discovery
- technical execution of complex mechanistic studies in humans or animal models
- challenges to data acquisition, integrity and analysis
- translational barrier from animal models to human trials; or between adult and pediatric patient populations
- timely participant recruitment and retention
- enhanced recruitments and engagement of underserved populations

Spanning the Full Spectrum of Translation

NCATS' programs, initiatives and other resources span the entire spectrum of translational science.





- Discovering new therapeutic targets and molecular pathways which play crucial roles across carious therapeutic areas
- Developing or testing models that better predict a person's response to treatment
- Using novel methods to translate findings from the laboratory, clinic, or community into treatments and interventions
- Developing data acquisition methods or post-processing that will facilitate use of complex technologies and datasets in clinical research
- Novel use of informatics or big data to answer important clinical questions
- Developing or testing novel methods in early stage (Phase 1-2) clinical trials to make the trial more efficient
- Developing or testing novel methods, processes or study designs to address health disparities
- Enhancing the design and conduct of clinical trials so the results more accurately reflect the patient population generally affected by a disease (to enhance clinical relevance)
- Developing and testing new tools for engagement of underserved populations
- Developing or testing processes to improve enrollment of diverse populations in a hypothesis-driven research pilot study
- Validating natural animal models of human disease in companion animals

Spanning the Full Spectrum of Translation

NCATS' programs, initiatives and other resources span the entire spectrum of translational science.



<u>How to Address</u> <u>Translational Science Roadblocks?</u>



Some Examples of Translational Science Pilot Focus

Establishing Molecular Mechanisms of Polymorphism of Cytochrome P450: This study will be performed in vitro using Tg and KO epithelial and hepatic cells using novel immunosuppressive drug (CU AMC Drug Discovery Core). CYP450 polymorphism is a very generalized problem, and its understanding will help to establish pharmacokinetic properties of over 75% of existing therapeutic agents (CSU Drug Discovery Core). The pilot addresses the barrier of rigor and transparency in major generalizable areas of translational discovery.

Advanced Bulimia Treatment in Adolescent Girls: Efforts will be made to enroll young female participants from diverse geo-economic and racial background to address eating and behavioral disorders. fMRI at a 3 Tesla MRI (CU AMC Brain Imaging Core) will provide pharmacodynamics readouts. Addresses enhanced recruitments and engagement of underserved populations

Spanning the Full Spectrum of Translation

NCATS' programs, initiatives and other resources span the entire spectrum of translational science.





Some Examples of Translational Science Pilot Focus

Validating Natural Animal Translational Disease Models: Many diseases of dogs, cats, horses and other animals are more similar to diseases in people than induced diseases in traditional rodent models. For example, osteosarcoma in dogs is genetically similar to the same tumor in people and responds to similar therapies. Idiopathic epilepsy in dogs has many symptoms that mimic childhood epilepsies. Accordingly, validating the molecular, diagnostic, and therapeutic features of these diseases in veterinary clinical trials (so called "T0.5") is a mechanism for improving translational science, <u>addressing translational barrier from animal models to human trials.</u>

Retrospective Analysis on Multi-Institutional CU-CSU Omics Data: These pilots could leverage the pilot to address the issue of performing team science across institutions and data harmonization and transfer between institutions, etc. Address challenges in data acquisition, integrity and analysis

Spanning the Full Spectrum of Translation

NCATS' programs, initiatives and other resources span the entire spectrum of translational science.







Application Process

Kristen House CCTSI Pilot Program Administrator



How to Apply



University of Colorado Anschutz Medical Campus Webmail 🏔 | UCD Access 🕰 | Canvas 🚔 | Quick Links 🗸 | 🔍 **Colorado Clinical and Translational Sciences Institute** Funding ▼ Community Engagement ▼ News and Events ▼ About Us ▼ Volunteer for a Study 🖄 Resources
Training TL1 Pre and Post Doctoral Program KL2 Mentored Career Development Award CCTSI COVID-19-Related Research Pilot CO-Pilot Grants Child and Maternal Health Pilot Grant (CMH-Pilot) Community Engagement Pilot Grant (CE-Pilot) Translational Methods Pilot Grant (TM-Pilot) CTRC MicroGrants CCTSI Membership **Funding Opportunities** Each year, the CCTSI awards more than \$2 million in pilot grants, microgrants, and pre-doctoral and post-doctoral research scholar awards. You can find more information on each grant and how to apply below

https://cctsi.cuanschutz.edu/funding



https://cctsi.cuanschutz.edu/funding/copilot https://cctsi.cuanschutz.edu/funding/cmh https://cctsi.cuanschutz.edu/funding/tm

https://cctsi.cuanschutz.edu/funding/cepilot

Request for Applications (RFA)

The RFA describes eligibility, award categories and application requirements.

The window for sending a letter of intent has ended. Please check back in November 202



Information & Resources



2024-CCTSI-CO-CMH-InformationalCall#2 (pdf) Download (2165 KB)

2024 CCTSI Pilot Grant Applicant Checklist (xlsx) XL 8X Download (19 KB)

2024 CCTSI Pilot Grant Applicant Checklist (pdf) PDF Download (120 KB)

2024-CCTSI-CO-CMH-InformationalCall (pdf) POF Download (2705 KB)

2024 Sample Budget and Justification (pdf) POF Download (215 KB)

2024 Required Budget Template (pdf) POF Download (98 KB)

2024 Required Budget Template (xlsx) XL 8X Download (13 KB)



APPLICATION CH	AECKLIST					
This checklist is for informational purposes only. All applicants must comply with the requirement	nts of the official R	equest for Fundinc	J Appliactions ((RFA) posted on the C	CTSI website.	
Intent to Apply Form (LOI)		(
	All Applicants	Mentored	Junior	CU-CSU Award	TM-Pilot	CSU Faculty
1 Select CCTSI Pilot Grant Program	Required					
2 Select Pilot Award Category	Required					
3 Certify this project meets RFA Eligiblity & Exlcusion critera	Required					
4 Does this study involve collaboration with non-CCTSI Affiliated Institution(s)?	Required					
5 Are any investigators involved with this project associated with Colorado State University?	Required					
6 Project Title	Required					
7 Translational Science Roadblock	Required					
8 Contact Information: Principal Investigator	Required					
9 Contact Information: Co-Principal Investigator				Required	Optional	
10 Contact Information: Co-Investigator(s)	If Applicable					
11 Contact Information: Primary Mentor (or two Co-Mentors)		Required				
12 Contact Information: Requested Reviewer(s)	Optional					
13 Research Topics (Used to pair applications with reviewers)	Optional					

Application Checklist (Excel) or (PDF)



1	Ap	plication Form						
2			All Applicants	Mentored	Junior	CU-CSU Award	TM-Pilot	CSU Faculty
	1	Confirm all contact informaiton from LOI is accurate. Combine all documentation required in						
3		the RFA and combine into a single PDF to upload with you online Application Form.	Required					
	2	Project Overview (2-3 sentences)						
4		List all investigator names, titles, institutions before the Project Overview	Required					
5	3	Abstract (strict 250 word limit)	Required					
6	4	Specific Aims (1/2 page), including a Translational Science Roadblock	Required					
.7	5	Background, Significance and Innovation (1 and 1/2 pages), including the description of the translational science roadblock	Required					
	6	Approach (3 page limits), including Experimental Design, Translational Science Roadblock,	Required					
8		Data and Statistical Analysis, Feasibility, Shared Resources, Timeline						
_		References (no page limit)	Required					
30		Multiple PI Plan (1 page limit)				Required	Optional	
	9	Mentor Letter of Support (no page limit)						
		If there are two co-Mentors, a combined letter or two separate letters will be accepted as a		Required				
1		single PDF.						
		Career Development Plan (1 page)		Required				
	11	Letters of Support (no page limit)						
		May include department chairs, consultants, foundations, commercial sources,	Optional					
3		manufacturers, etc. Budget (1 page limit, vertical alignment only)						
	12		Required					
4	10	Please use the CCTSI Budget Template (available on the CCTSI website)	Desuined					
_		Budget Justification (1 page limit) Biosketches (no page limit)	Required					
_		CSU OSP Proposal Transmission Letter (no page limit)	Required			-		
7	15	Contact Jessica Hunter (jessica.hunter@colostate.edu) for details.				Required		Required
-	16	Cost Share Budget (1 page limit)	See RFA, Check					
	10	Applications may include collaboration with non-CCTSI Affiliated organizations. Refer to RFA	with Kristen					
8		for specific instructions.	House					
_	17	Other: Institutional Prior Approval (no page limit)	nouse					
		Applicants based at CCTSI Affiliated Institutions are strongly encouraged to work with the						
		sponsored programs office at their institution to meet all pre-application requirements	Check with					
		specific to their organization, including applications for federal and non-federal (internally	institution					
9		funded) seed grant programs.						

Application Checklist (Excel) or (PDF)



CCTSI Pilot Grant Award Budget

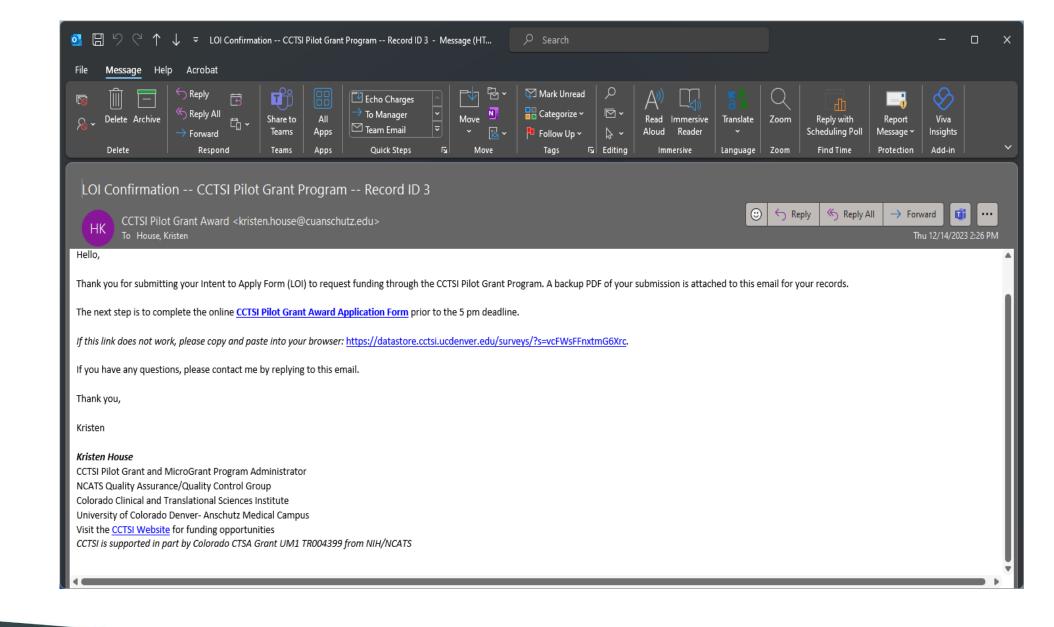
Budget and Active Award Period: August 1, 2024 to July 31, 2025						
	Indicate Budget for Each Location					
CATEGORY & ITEM(S)	CU AMC	csu	CU Boulder	снсо	Other Institution (Specify Location)	Total Amount
Key Personnel Salary & Fringe Benefits						\$ -
						<u> </u>
Other Personnel						\$-
Fee for Service (including Core Services)						\$-
Supplies	1	I	1		1	\$-
Equipment						\$ -
						Ŷ
Animals						\$-

Applicants should customize these Categories



Budget Template (Excel) and (PDF)

Use the link in this email to access the REDCap application form





You can click "Save and Return Later" if you need more time to complete this form.

You can email yourself a unique link to this partially completed form.

Only click "Submit" when you are done and have no additional edits. Once you hit "Submit", the application is final. Make sure you hit "Submit" before the deadline!

General Proposal Information

1) Final Proposal Title

This title may be modified slightly on the Application Form; however, CCTSI strongly recommends the fuding application title match study title on all IRB/IACUC documentation.

Title on Intent to Apply Form (LOI): Test

Test Expand 2) Abstract Text only (no special characters or bullet points). Firm 250 word limit. 250 words remaining Expand 3) Upload a single PDF of all documentation required in the RFA. You may check the CCTSI website (link) for this Program's Application Checklist (recommended). Omission of any document(s) may adversely affect the Review Panel's overall score for this project, or lead to application disgualification. House (CO-J--3) ▲ Upload file **Regulatory Approvals** 1) Please indicate PI name and Institution for anticipated regulatory approvals. Example: Dr. X will obtain IACUC from CSU.

Example: Dr. X Will obtain IACUC from CSU. Example: COIMIRB Protocol 20-123 (PI Dr. Y)



2024 TM Application Cycle Dates

2024 Key Dates

RFA Posted

November 8, 2023

Intent to Apply Form Due December 11, 2023 at 5:00 pm MT

Informational Call #1 November 21, 2023 from 1:00 - 2:00 pm via Zoom

CCTSI Pilot Grant Program Overview

Informational Call #2 January 3, 2024 from 1:00 - 2:00 pm via Zoom

Application Due January 22, 2024, 5:00 pm MT

Scientific Merit Review April 2024

Start of Award August 1, 2024

Award Expiration Date July 31, 2025

November 8, 2023

Request for Funding Announcement (RFA)

November 21, 2023 December 11, 2023 January 3, 2024 January 22, 2024 TM Informational Call #1 (Zoom) TM-Pilot Intent-to-Apply Form due - 5 pm TM Informational Call #2 (Zoom) **TM-Pilot Application Form due - 5 pm**

April – 2024 June – 2024 August 1, 2024 CCTSI Review Panels Notice of Selection Active Funding Period Begins



CCTSI Pilot Grant Contacts

https://cctsi.cuanschutz.edu/funding

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Dr. Christopher Baker

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Dr. Sue VandeWoude

CSU Pilot Program Director sue.vandewoude@colostate.edu

