Template updated 4.4.2025

Arnold Ventures Grant Proposal Template

Instructions to applicant: Arnold Ventures is a philanthropy dedicated to tackling some of the most pressing problems in the United States. Our mission is to improve lives by investing in evidence-based solutions that maximize opportunity and minimize injustice. Our team administers all of our philanthropy as Arnold Ventures; however, funding for approved proposals may come from one or more entities. As part of our due diligence, we will work to identify the most legally appropriate funding entity (or entities) for this project. Please complete the following template in developing your proposal:

I. Administrative Details

A. Organization
   a. Legal name of the organization that is requesting grant funding: Georgetown University
   b. Tax Identification number of the organization that is requesting grant funding: 53-0196603
   c. Organization type (select one):
      ☒501(c)(3) public charity (current or pending)
      ☐501(c)(4) social welfare organization
      ☐Government Instrumentality
      ☐Other, please describe (*e.g.,* S-corp, LLC, etc.):

B. Project Name: **SNAP PER Reduction: Design, Implementation and Impact**

C. Project Purpose. Describe the core purpose of the project in 1-3 sentences: **This project aims to work with multiple state partners to understand drivers of SNAP Payment Error Rates (PER), then design, test, and implement tools for reducing SNAP Payment Error Rates, and finally communicate best practices and tools to other state human service agencies.**

D. Funding Request and Term
   a. Total amount requested: **$900k**
   b. Desired start date (please note the start date may ultimately depend on Board approval): **December 1, 2025**
   c. Length of project (e.g., 6 months, 2 years): **12 months**

E. Project Type:
   ☐ Unrestricted (to support overall organization and core operations)
      - If selected, <u>you do not need to complete Section II below</u>, but instead may provide any previously developed documentation that outlines your key operations.
      - Please submit the "**General Operating Support**" budget template provided by your AV contact along with the financial and legal documents requested within the template.

   ☒ Restricted (to support a specific initiative/program or defined aspect of work)
      - If selected, <u>please complete Section II</u>.

- Please submit the "**Project-Specific**" or "**Program Support**" budget template provided by your AV contact along with the financial and legal documents requested within the template.

II. Project Details

A. Project Description: Please briefly explain the project you propose, how it will have an impact, how you will accomplish it (including all key activities that you plan to undertake), the work product that you plan to produce, and any dissemination plans and additional steps, if any, you would need to pursue in order for your project to achieve its greatest impact (*i.e.*, is this the first phase of a larger initiative).

I. Overview:

- As a result of the recent One Big Beautiful Bill Act, state human service agencies face an urgent need to reduce SNAP Payment Error Rates and improve overall program integrity to avoid losing federal program funding. To address this challenge, this project will partner with multiple states to assess drives of SNAP payment error rates. Initial assessments generally indicate the difficulties digesting complicated rules, manual data entry errors, inadequate income verification, and child-related eligibility issues are key drivers of payment error rates. While it is difficult to address child-related eligibility issues without legislation to change program rules, it may be possible to improve overall program integrity and address issues related to hard-to-understand program rules, manual data entry and improved income verification.
- This project will partner with states to design strategies and tools to reduce SNAP payment error rates. After designing and testing these tools with pilot state partners, the project will aim to implement these tools state-wide and provide the tools to other states in the future.
- The project is seeking critical resources to move these efforts to reduce state payment error rates forward. The funding will be used to achieve the following objectives:
    - 1. Funding will support dedicated staff time to analyze the root causes of payment error rates, collect and provide relevant program documentation, create positions to host data science fellows internally, provide access to essential project data on SNAP applications, payment error rates, and income used for verification, and engage case workers and other relevant state and local stakeholders. The project is seeking $150,000 per state for 3 state partners.
    - 2. Funding will be used for hiring a data science and engineering team to build accessible technical program documentation and tools for minimizing manual data entry and improving income verification.
    - 3. Funding will be used to consult with former USDA/FNS experts on SNAP payment error rate reduction strategies.
- If necessary, the project could reduce costs by (a) only working with 2 state partners or (b) reducing the number of data scientists to 2. However, this cost reduction strategies may have negative impacts on overall success of the project. Specifically, if the project only works with 2 state partners, this could reduce costs, but the project may build tools that are less likely to be relevant to other states. Also, if the project only works with 2 data scientists, this could reduce costs, but this may make it less likely that the tools are designed, tested, and implemented with the state partners in the proposed timeframe.

II. Determining the Drivers of SNAP Payment Error Rates

- The project will work with state partners to access recent historical data on all SNAP cases and cases that have been selected for payment error review (audit). The project will analyze audit data to

understand the drivers of payment error rates. Specifically, the analysis will examine sources of errors that emerge at the application stage and sources of errors that emerge after applications are submitted and approved. Errors at the application stage can emerge from issues such as cases having insufficient documentation to verify income or household composition at the time of application, having incorrect data entry on applications, or having individuals claimed on multiple or duplicated applications. Errors after applications have been submitted and approved can result from issues such as children being claimed on subsequent benefit applications, receiving updated administrative income documentation that is at odds with or inconsistent with income information submitted at the time of application.

- The project will aim to assess the most common sources of errors across state partners and errors that can realistically be addressed within the timeframe before cuts in federal funding to penalize high error rates would take effect (i.e. errors that could be addressed by the end of 2026).

III. Strategies and Tools to Reduce SNAP Payment Error Rates

- The project will consider different strategies and tools to address different sources of SNAP payment errors:
- 1. Having insufficient documentation to verify income or household documentation at the time of application: case workers training and searchable documentation assistance.
    - The project will work with former USDA consultants and state SNAP program leadership and case workers to design trainings for verifying documentation prior to submitting documentation.
    - In addition to relatively general training on best practices, the project will aim to create accessible tools that provide case workers with real-time answers of whether documentation is sufficient or what rules to apply to determine eligibility. This type of tool would be designed based on recent historical audit data, technical Quality Control documentation issued by USDA, guidance from former USDA SNAP experts, and experiences from case workers. Importantly, this tool would capture current program rules to better enable case workers to work off of current rules rather than out-of-date policy guidance or out-of-date policy engine tools. The tools for case worker assistance would be tested using in-sample and out-of-sample examples designed by former USDA and state SNAP experts. Once initial testing is completed, the project would proceed to field testing with case workers, refinement, and then design trainings to use the tools prior to making the tools more widely available to case workers.
    - The process to build searchable documentation or an AI-powered case worker assistance tool will amount to training a large language model on internal historical audit data, large quantities of technical documentation, and insights from subject matter experts. These data are not available publicly, so it will be essential to work with state partners. Additionally, states may differ in their in-house AI capabilities, so it will be essential to assess what tools can be built internally and what tools might need to be built externally. Ultimately, the tools could take the form of an AI-powered chatbot assistance and/or plain language documentation that could be used as a stand-alone PDF. The goal will be having tools that multiple states could use within their own computing environments.
- 2. Incorrect data entry at the time of application
    - The project will work with state partners to create a tool for internal consistency checks prior to submission. The tool could scrape data from populated application forms, submitted documentation, and data systems to identify potential data entry inconsistencies prior to submission. These tools are common in the income tax landscape to verify that income from W-2s is transcribed correctly and that total income is summed correctly across W-2 forms.
- 3. Receiving administrative wage income information
    - The project will work with state partners to access administrative quarterly wage date and create tools to query this information in a timely way to verify income. State partners may very

in data access and lag times for this quarterly wage information. The project oin work with state partners to design data sharing agreements and build a wage query tool where possible. However, this strategy may face barriers to reach a data sharing agreement within the desired project timeframe or receive necessary date in time (ie without a lag) to still be relevant for payment error calculations. Even with the potential barriers or limitations of this strategy, the project expects overall success since other strategies and tools are not likely to face these some obstacles.

IV. Impact

- Success will be assessed based on how well the tools help reduce payment error rates. An intermediate step of the project is assessing payment accuracy in terms of how well newly trained case workers or an AI-powered assistance tool would predict outcomes from historical audit data. This intermediate success metric would essentially compare how well case workers and the AI-powered assistance tool would perform on artificial case studies to assess eligibility and payment determination. The project will not focus on a full randomized controlled trial to test if case workers equipped with new tools and training are less likely to have payment errors; instead, the project will focus on small sample testing to ensure that tools are operating as expected and that anecdotal evidence indicates intended impacts. As part of this accuracy assessment, the project will examine how past payment errors could have been reduced and what the savings (reductions in overall SNAP benefit expenditures) from reducing these past errors could have been from applying current strategies and tools to recent historical data.
- An ultimate goal of the project is helping states improve overall program integrity and reduce payment error rates going forward. In addition to assessing potential savings based on past data, the project will also monitor payment error rates going forward and create systems to update and improve computational tools and trainings.
- In the future, Professor Manoli will also seek to work with state partners to evaluate impacts of changes in SNAP on beneficiaries' outcomes. This work will focus on changes in SNAP beyond just reductions in payment error rates, so it may go beyond the scope of the current project.

V. State Partnerships

- The project will consider multiple criteria to select ideal state partners as pilot cases. Most importantly, state partners will be selected based on their internal motivations to focus on reducing SNAP payment error rates and improve program integrity. Without necessary internal motivation from state leadership and staff, it will be difficult to create a successful partnership. This criterion is likely to focus state partnerships on states that have stable, motivated leaders and states that have high payment error rates that could lead to penalty reductions in federal funding if they are not addressed. Additionally, this criterion is likely to focus on states that are motivated to continue their SNAP programs even with cuts to federal funding. Given the focus on data analysis and development of computational tools, the project will select state partners that have well-functioning data systems and are interested in pursuing solutions related to incorporating civic technologies into their systems and processes. This criterion may lead to selecting state partners that are more technologically advanced or motivated than others.
- Professor Manoli. has already established informal agreements with human service agencies in Maryland and Minnesota.
- While the project will seek to create tools that multiple states could adopt, these criteria for selecting state partners highlight potential reasons that the tools may not be adopted by other states. For example, multiple states with relatively low error rates may not have the capacity or interest to focus on reducing their payment error rates. Similarly, multiple states may lack the technological infrastructure or interest in adopting computational tools for reducing payment error rates. Overall, once tools are

available from the initial pilot states the project will aim to partner with multi-state organizations such as the American Public Human Services Association (APHSA) to help facilitate adoption.

B. Team:
   a. Project Lead(s) Name and Title: **Day Manoli, Associate Professor, McCourt School of Public Policy, Georgetown University**
   b. This project requires a team with diverse skills. First, the project requires state partners who can provide access to necessary data and case workers. State human service agencies are the only entities that have access to detailed data on SNAP cases. Furthermore, it is essential to have case worker insights and connections since they are the front-line workers who complete and submit application data that feeds into payment error calculations, and they have deep, first-hand insight into the issues that come up in the field. Second, it is critical to have insights from the federal USDA perspective since payment error data from states is ultimately sent to the federal level for final review, and the rules and technical documentation for Quality Control are written by federal staff. However, because of recent federal government layoffs, many of these experts are now former USDA staff who are operating as private individual SNAP expert consultants. Third, it is essential to have data science and software engineering talent that can partner with all of these subject matter experts and design useable tools. Finally, Professor Manoli and the Georgetown Massive Data Institute have the necessary expertise to make this project successful. Professor Manoli has extensive experience studying state social safety net programs including SNAP specifically, analyzing administrative data for research evaluations, partnering with state government agency staff, and working with data scientists and software engineers. These skills will enable Professor Manoli to partner with state agencies and technologists to design, test, and implement tools to reduce SNAP PERs and improve overall program integrity.

C. Risk:
   a. Potential risks to the success of this project include data access limitations and hiring concerns. To mitigate these risks, Professor Manoli has been working with states to establish pathways for data access and plans for hiring data scientists. These initial conversations suggest that multiple state partners are already interested in partnering with Professor Manoli and are willing to ensure data access to facilitate the partnership. Professor Manoli has also hired data scientists in the past, so these prior experiences make it likely that he will be able to successfully partner with data scientists for this project.
   b. It is not possible for state government agency partners to provide letters of support in time for this proposal submission. However, Professor Manoli has established informal agreements with the Departments of Human Services in Maryland and Minnesota, and he is working to secure an agreement from a third state partner soon after submitting this grant. Professor Manoli will inform AV staff of any changes in partnership status and collaborate with them to establish further partnerships if possible.

IV. Appendices: Please include the following information as attachments:

- ❑ Budget template provided by your AV contact: **Attached**
- ❑ Applicable legal documents based on grantee entity type: **These have been provided to AV within the last year.**
- ❑ *Only for restricted proposals:* **Milestone template included below:**

Proposed Milestones
Milestone 1: By January 31, 2026, grantee will secure 2 to 3 state partnerships and provide AV confirmation that these partnerships have been established.
Milestone 2: By April 30, 2026, grantee will work with former USDA consultants and state SNAP experts to draft a policy options memo that will explore best practices for reducing SNAP payment error rates and share with AV for review and feedback. Grantee will work with USDA consultants and state SNAP experts to disseminate the memo after reviewing with AV.
Milestone 3: By July 1, 2026, grantee will have started to work with at least 2 state partners and data scientists to build and test tools and strategies to reduce SNAP payment error rates.
Milestone 4: By September 1, 2026, grantee will work with state partners to implement strategies and tools that were effective in reducing SNAP payment errors during testing. Grantee will also work with former USDA consultants to disseminate tools to other states and provide a memo on the effective tools.