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Adjusted Allocation: 0.00

Remaining: -546,788.00
Please respond to the prompts or questions in the areas listed below in a narrative form.

A) APPLICANT INFORMATION - General Information

1. Project Title:
   Case-by-Case: Tailored Career Pathway Learning

2. Project Summary: Please limit your responses to no more than three sentences.
   Professional development and digital training materials for ~50 early and middle grade teachers using case-based learning.
   
   This is an ultra-concise description of the overall project. It should only include a brief description of the project and the goals it hopes to achieve.

3. Estimate of total students at each grade level to be directly impacted each year.

   This is the number of students that will receive services or other benefits as a direct result of implementing this project. This does not include students that may be impacted if the project is replicated or scaled up in the future. It excludes students who have merely a tangential or indirect benefit (such as students having use of improved facilities, equipment etc. for other uses than those intended as a part of the project). The Grant Year is the year in which funds are received from the Ohio Department of Education. Years 1 through 5 are the sustainability years during which the project must be fiscally and programmatically sustained.

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4. Explanation of any additional students to be impacted throughout the life of the project. This includes any students impacted or estimates of students who might be impacted through future scale-ups or replications that go beyond the scope of this project.

The district will endeavor to scale the case-based learning materials to all 5th-9th grade classroom teachers in future years, creating the potential of serving over 12,500 students each year.

5. Lead applicant primary contact: - Provide the following information:

First and last name of contact for lead applicant
Kara Shibiya
Organizational name of lead applicant
Cincinnati City Schools
Address of lead applicant
2651 Burnet Ave
Phone Number of lead applicant
513-363-0338
Email Address of lead applicant
shibiyk@cps-k12.org

Community School Applicants: After your application has been submitted and is in Authorized Representative Approved status an email will be sent to your sponsoring entity automatically informing the sponsor of your application.

6. Are you submitting your application as a consortium? - Select one checkbox below

☐ Yes
☐ No

If you are applying as consortium, please list all consortium members by name on the "Consortium Member" page by clicking on the link below. If an educational service center is applying as the lead applicant for a consortium, the first consortium member entered must be a client district of the educational service center.
Add Consortium Members

7. Are you partnering with anyone to plan, implement, or evaluate your project? - Select one checkbox below

☐ Yes
☐ No

If you are partnering with anyone, please list all partners (vendors, service providers, sponsors, management companies, schools, districts, ESCs, IHEs) by name on the "Partnering Member" page by clicking on the link below.
Add Partnering Members

B) PROJECT DESCRIPTION - Overall description of project and alignment with goals

8. Describe the innovative project: - Provide the following information

The response should provide a clear and concise description of the project and its major components. The following questions will address specific outcomes and measures of success.

a. The current state or problem to be solved; and

In the next decade, 80% of the jobs created in the U.S. will require high levels of competency in math and science. Ohio, in five years, will demand 257,800 jobs requiring science, technology, engineering and math skills, and 90% of those jobs will require postsecondary education, according to a study by the Georgetown Center on Education & the Workforce. In the words of President Obama, "We must educate our children to compete in an age where knowledge is capital, and the marketplace is global." Our current education system is not producing enough students with the skills necessary to fill the industry's high-paying jobs. The state of Ohio struggles to graduate enough students from college in STEM disciplines; only one half of all students who start college with a STEM major graduated with a STEM degree. While Ohio has seen some gains in graduating more students in some STEM disciplines, the results are uneven in urban school districts, especially among girls and minorities. The state is working on the problem, focusing on college and high school grades, but there is a growing awareness that a key leak in the STEM pipeline is occurring in elementary and middle schools. According to the National Center for STEM Elementary Education, one third of students lose interest in science by the 4th grade. By the 8th grade, almost 50% have lost interest. "At this point in the K-12 system, the STEM pipeline has narrowed to half. That means millions of students have tuned out or lack the confidence to believe they can do science." Research indicates that if students do not develop interest in STEM fields by 8th grade, it is unlikely they will follow a STEM career pathway. Few state initiatives focus on developing career pathway "hands on" simulations for 4th-9th grade students. A lack of resources, program isolation, and scalable professional development are the primary reasons for this lack of content programming.
b. The proposed innovation and how it relates to solving the problem or improving on the current state.

Gov. Kasich called for renewed attention to introducing students to careers much earlier, stating "We want kids to have a connection to this [STEM] by the seventh grade," he told legislators. A special 2010 report to President Obama from the President's Council of Advisors on Science and Technology noted the lack of interest in STEM fields by students who described these fields as boring, too difficult or unwelcoming. "We must prepare all students, including girls and minorities... to be proficient in STEM subjects, and we must inspire all students to learn STEM, and in the process, motivate many of the to pursue STEM careers," the report notes. Case-by-Case will increase the number of students interested in STEM subjects by developing a robust professional development program preparing early and middle classroom educators to facilitate case-based learning through real-world opportunities with local business, nonprofit, and arts partners.

Effort will address both the preparation and inspiration of students interested in STEM careers in earlier grade levels. A case-based method approach to learning is one in which students are presented with an authentic case challenge and required to actively pursue a solution by applying content knowledge and critical thinking skills. Case-based learning engages the students in an active, decision-making role while instructors serve as a facilitator and guide. Although the case method approach can be used for instruction in a variety of content areas, the focus of this particular project is increasing student mastery of content in Science, Technology, Engineering, and Mathematics (STEM).

Initiatives for Science & Math Education (IISME). Both organizations are members of the organization, 100Kin10, which features the top 200 best-in-class STEM organizations pledging to increase the number of high quality STEM educators to 100,000 in the next ten years. State initiatives, private Foundation, business organizations and Chambers of Commerce fund each simulation program.

9. Select which (up to four) of the goals your project will address. For each of the selected goals, please provide the requested information to demonstrate your innovative project. - (Check all that apply)

- **a. Student achievement**
  - i. List the desired outcomes.
    - *Examples: fewer students retained at 3rd grade, increase in graduation rate, increased proficiency rate in a content area, etc.*

    | Our proposal seeks to organize existing local resources and create new efforts that increase both the number of students interested in STEM fields and the number who are proficient in STEM skills. In this way, the proposal will deepen the pool of future high school students who are motivated and prepared to successfully pursue STEM degrees and careers. Desired outcomes for this work include the following: |...|
    | 1) Greater number of students electing to pursue STEM fields. 2) Greater numbers of girls and minorities electing to pursue STEM fields. 3) Increased STEM academic achievement in the relevant content areas taught using “hands on” inquiry-based content. 4) Projected increase in ACT student scores using problem-solving, critical thinking methods taught in the simulation, inquiry-based training. 5) Projected increase in classroom attendance, serving as a key indicator in heightening academic achievement. 6) Creation of new educator training materials to improve cross-functional and facilitative skills development for educators, offering better student instruction and career pathway authenticity. |...|

- ii. What assumptions must be true for this outcome to be realized?
  - *Examples: early diagnosis and intervention are needed to support all children learning to read on grade level; project-based learning results in higher levels of student engagement and learning, etc.*

    | This proposal responds to a bipartisan call for earlier career exploration for younger students, and an acknowledgement that K-12 education must not only engage the heads of students to nurture their interested in STEM fields but also their hearts. In order to succeed, we will need the full support of teachers and administrators, a conducive learning environment in the classroom, expert project personnel, full support of the school community and its partners, student and school baseline data, digital resources in the classroom for both the student and teacher, and engaging and relevant curriculum. |...|

- iii. Describe any early efforts you have made to test these assumptions (pilot implementation, etc), or how these are well-supported by the literature.

    | The case-based method offers educators another tool in their educational tool kit to reach students of all abilities. The academic effectiveness of an experiential, case-based teaching method are well-known and are easily replicable in the classroom, with the promise of great academic achievement results. Paired with a career pathway simulation, students can identify their emerging talents, apply new 21st century skill sets and mimic the life of a STEM executive or entrepreneur. The Career Pathway STEM Learning Project was developed by the Partnership for Innovation in Education (PIE) and piloted as an enrichment program during the 2012-13 school year at Kilgour Elementary School, a Cincinnati Public School. In 2013-14, the Case-Based STEM Learning Project was further developed as a demonstration project among 18 schools within the Cincinnati Public Schools and Milford Exempted Village Schools districts. Our proposal has built on the district's previous work in the FY14 Straight A Fund project and a previous pilot in targeted elementary schools. According to the ODE Straight A Evaluation Assessment by Dr. Julie Morrison, University of Cincinnati, the benefits of the case method include: Increased academic achievement across the pertinent ODE subject standards, increased attendance, increased educator engagement with contextual content flexibility, and greater "hands on" relevance for students thinking of possible career pathways. As the original Straight A Fund initiative showed, learning using open-inquiry methods leads to greater career and college readiness, as students define a problem, research the situation, compare and contrast multiple solutions, and develop a solution as a team, based on fact, analysis and content discovery. These career ready skills are easily assessed. Education researchers equate case method teaching to active "deeper" learning, which appeals to students because they are motivated to engage with challenging materials, and where students... |...|
learn the material more deeply and work with it at a higher level. "Students retain more of the material they do than material they simply read, hear or see," say the authors of a Science Education Resource Center (SERC) brief on case method teaching. SERC agrees in its research indicating that cases provide context-allowing learners to work with "real world problems that are complicated and messy, and those problems force them to develop skills to find and weigh evidence and make choices about what is relevant." The Harvard Business School (HBS) has adopted and advanced the case method of teaching, so much so that Harvard Business School faculty writes about 80 percent of cases sold through the world. *Pioneered by HBS faculty and one of the highlights of the HBS experience, the case method is a profound educational innovation that presents the greatest challenges confronting leading companies, nonprofits, and governmental organizations - complete with the constraints and incomplete information found in real business issues - and places the students in the role of the decision maker," notes the Harvard Business School. "Simply put, we believe the case method is the best way to prepare students for the challenges of leadership."

iv. List the specific indicators that you will use to measure progress toward your desired outcome.

*These should be measurable changes, not merely the accomplishment of tasks. Example: Teachers will each implement one new project using new collaborative instructional skills, (indicates a change in the classroom) NOT; teachers will be trained in collaborative instruction (which may or may not result in change).*

We envision our teachers having an increased capacity to support relevant learning for their students through a case-based learning model, and envision our schools developing strong relationships with industry/business partners, higher education partners, and community agencies in order to support young students’ interest and exploration in STEM careers. Ultimately, we aim for our young learners to demonstrate increased academic achievement, social/emotional learning, and proactive engagement in their learning and future career pathways by participating in real-world “cases” facilitated in partnership with their classroom teacher and local business partner. Indicators to measure student progress towards outcomes include: 1) increases in attendance, 2) increases in student science and technology literacy, 3) increases in students STEM subject engagement, 4) increases in student noncognitive skill development, 5) increases in student understanding of 21st century careers, and 6) increases in student knowledge/ability to problem-solve. Indicators to measure student progress towards outcomes include: 1) increases in the implementation of case-based learning in classrooms, 2) increases in educator engagement and interest in using case-based learning in their classroom, and 3) increases in educator belief that case-based learning is replicable and invaluable tool in their classroom.

v. List and describe pertinent data points that you will use to measure student achievement, providing baseline data to be used for future comparison.

Educators will nominate themselves to be members of this learning and professional development opportunity and will participate in monthly meetings, joining each other via digital or phone conferencing coordinated by the Project or Educator-Manager. Each educator’s experiences will be monitored using both face-to-face and in-classroom monitoring, in addition to research and evaluation via a digital portal. There will be both an in-house Educator liaison and the overall project manager responsible for implementing, facilitating and evaluating the program. To measure student achievement, we will look at a variety of data points including the following: 1) The number of students in grades 4-9 participating in case-based learning activities. Baseline data for 2014-15 is 3,998. 2) The number of teachers completing professional development training in facilitating case-based learning. We have no baseline data on this data point, as professional development has not previously been offered. 3) The number of students expressing interest in pursuing STEM career fields post-graduation and 4) Student academic achievement in STEM content areas. For many of these outcomes our baseline data is not available, as these services or activities have not been implemented. For the targeted students selected to participate in the grant year implementation, as well as for the increased number of students to be served as the program grows, we will identify personalized student academic data to use in comparison to a larger cohort of students, as well as to use as our baseline data moving forward.

vi. How are you prepared to alter the course of your project if assumptions prove false or outcomes are not realized?

In a perfect world, outcomes would be perfectly achieved without any challenges; however, there is great value in learning from and adapting to challenges. Should our previous assumptions prove false or for some reason not turn out how we expect, we will adjust our course. The Case-by-Case strategy team will meet monthly to discuss project implementation, successes, challenges, and future goals/dreams. We will use this time to closely monitor the activities and outcomes presented in this proposal, and should we begin to experience unexpected roadblocks, our strategy team will analyze best practices, adjust our strategies, and continue to monitor the outcomes and data supporting the long-term vision that we seek. We will create a tracking table describing proposed activities in a "who/what/where/when" format - assigning measures and timelines to each activity. Data from this table will be used to prepare bi-annual reports for the evaluation committee. These reports will compare actual accomplishments to projected targets with the tracking measures attached as evidence. The evaluation committee will review the reports to determine if program goals are being met and make recommendations for adjustments. If measured progress is insufficient to meet program objectives, we will reassess each component of the plan and adjust as necessary.

b. Spending reductions in the 5 year forecast

i. List the desired outcomes.

*Examples: lowered facility cost as a result of transition to more efficient systems of heating and lighting, etc.; or cost savings due to transition from textbook to digital resources for teaching.*

ii. What assumptions must be true for this outcome to be realized?

*Example: transition to “green energy” solutions produce financial efficiencies, etc.; or available digital resources are equivalent to or better than previously purchased textbooks.*

iii. Describe any early efforts you have made to test these assumptions (pilot implementation, etc), or how these are well-supported by the literature.

iv. List the specific indicators that you will use to monitor progress toward your desired outcome.
These should be specific dollar savings amounts. THESE MUST MATCH THE COST SAVINGS AS PROJECTED IN THE FINANCIAL IMPACT TABLE (FIT).

v. List and describe pertinent data points that you will use to measure spending reductions, providing baseline data to be used for future comparison.

vi. How are you prepared to alter the course of your project if assumptions prove false or outcomes are not realized?

c. Utilization of a greater share of resources in the classroom

i. List the desired outcomes.
   *Example: change the ratio of leadership time spent in response to discipline issues to the time available for curricular leadership.*

ii. What assumptions must be true for this outcome to be realized?
   *Examples: improvements to school and classroom climate will result in fewer disciplinary instances allowing leadership to devote more time to curricular oversight.*

iii. Describe any early efforts you have made to test these assumptions (pilot implementation, etc), or how these are well-supported by the literature.

iv. Please provide the most recent instructional spending percentage (from the annual Ohio School Report Card) and discuss any impact you anticipate as a result of this project.
   *Note: this is the preferred indicator for this goal.*

v. List any additional indicators that you will use to monitor progress toward your desired outcome. Provide baseline data if available.
   *These should be specific outcomes, not just the accomplishment of tasks. Example: fewer instances of playground fighting.*

vi. How are you prepared to alter the course of your project if assumptions prove false or outcomes are not realized?

d. Implementing a shared services delivery model

i. List the desired outcomes.
   *Examples: increase in quality and quantity of employment applications to districts; greater efficiency in delivery of transportation services, etc.*

ii. What assumptions must be true for this outcome to be realized?
   *Example: neighboring districts have overlapping needs in administrative areas that can be combined to create efficiencies.*

iii. Describe any early efforts you have made to test these assumptions (pilot implementation, data analysis etc), or how these are well-supported by the literature.

iv. List the specific indicators that you will use to monitor progress toward your desired outcomes.
   *These should be measurable changes, not the accomplishment of tasks.
   *Example: consolidation of transportation services between two districts.*

v. List and describe pertinent data points that you will use to evaluate the success of your efforts, providing baseline data to be used for future comparison.
   *Example: change in the number of school buses or miles travelled.*

vi. How are you prepared to alter the course of your project if assumptions prove false or outcomes are not realized?

10. Which of the following best describes the proposed project? - (Select one)
a. New - Never before implemented
b. Existing - Never implemented in your community school or school district but proven successful in other educational environments
c. Replication - Expansion or new implementation of a previous Straight A Project
d. Mixed Concept - Incorporates new and existing elements
e. Established - Elevating or expanding an effective program that is already implemented in your district, school or consortia partnership

C) BUDGET AND SUSTAINABILITY

11. Financial Information: - All applicants must enter or upload the following supporting information. The information in these documents must correspond to your responses in questions 12-19.

a. Enter a project budget in CCIP (by clicking the link below)

Enter Budget

b. If applicable, upload the Consortium Budget Worksheet (by clicking the Upload Documents link below)

Upload Documents

The project budget is entered directly in CCIP. For consortia, this project budget must reflect the information provided by the applicant in the Consortium Budget Worksheet. Directions for the Financial Impact Table are located on the first tab of the workbook. Applicants must submit one Financial Impact Table with each application. For consortium applications, please add additional sheets instead of submitting separate Financial Impact Tables.

546,788.00 12. What is the amount of this grant request?

13. Provide a brief narrative explanation of the overall budget. Responses should provide a rationale and evidence for each of the budget items and associated costs outlined in the project budget. In no case should the total projected expenses in the budget narrative exceed the total project costs in the budget grid.

Instruction: Salaries and Fringe - $255,000 in contracted services to PIE to provide technical assistance, instruction, communications, marketing for project, including: $180,000 to plan and help teachers implement case-based lessons in 24 schools and $40,000 to develop educator and engineering/manufacturing initiative program with Industry Initiatives for Science and Math Education (IISME), Honda of America Manufacturing Inc., Lockheed Martin Space Systems Company and Cincinnati USA Regional Chamber of Commerce CPS partners, and $35,000 to serve as in-house liaison and part-time manager; Governance: 5% of direct costs to cover grant administration and financial oversight. Professional Development: Purchased Services - $72,000 to support stipends of $3,000 each to teachers in 24 public school buildings to offset costs to implement case-based teaching methods for STEM learning, including extra costs for planning and educator development. $100,000 to support Educator Professional Development, Evaluation & Training: $75,000 for Harvard University and PIE to create written professional development PIE manual and facilitate 3 digital webinars to CPS Educators, and $25,000 to design, administer, and analyze an evaluation instrument to educators and students in classrooms of 24 schools. Supplies - $93,750 for marketing, video and digital materials for 24 schools ($3,906.25) to chronicle how case-based work simulations follow Ohio’s 16 career pathways allowing students “hands on” access to real work challenges, career mentors, documenting on-site and “embedding” experiences and opportunities to share digitally best-in-class methods across Ohio business, educator and workforce partner networks.

14. Please provide an estimate of the total costs associated with maintaining this program through each of the five years following the initial grant implementation year (sustainability costs). This is the sum of expenditures from Section A of the Financial Impact Table.

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15. Please provide a narrative explanation of sustainability costs. Sustainability costs include any ongoing spending related to the grant project after June 30, 2017. Examples of sustainability costs include annual professional development, staffing costs, equipment maintenance, and software license agreements. To every extent possible, rationale for the specific amounts given should be outlined. The costs outlined in this narrative section should be consistent and verified by the financial documentation submitted and explained in the Financial Impact Table. If the project does not have sustainability costs, applicants should explain why.

The grant funds will be used primarily to create a flexible and collaborative suite of training materials for educators in case-based learning. A partnership with local nonprofit, Partnership for Innovation in Education, will provide leadership in the development of professional training materials, in tandem with working with district administration, selected educators, business “champions”, and professional development providers including Harvard University. Costs to maintain the facilitation of STEM cases in future years will be covered by in-kind partnerships and will not incur the district any sustainability costs.

100 16. What percentage of these costs will be met through cost savings achieved through implementation of the program?
### D) IMPLEMENTATION

20. Please provide a brief description of the team or individuals responsible for the implementation of this project, including other consortium members or partners.

This response should include a list of qualifications for the applicant and others associated with the grant. Please list key personnel only. If the application is for a consortium or a partnership, the lead should provide information on its ability to manage the grant in an effective and efficient manner. Include the partner/consortium members' qualifications, skills and experience with innovative project implementation and projects of similar scope.

Enter Implementation Key Personnel information by clicking the link below:

Add Implementation - Key Personnel

For Questions 21-23 please describe each phase of your project including its timeline, and scope of work.

A complete response to these questions will demonstrate awareness of the context in which the project will be implemented and the time it will take to implement the project with fidelity. A strong plan for implementing, communicating and coordinating the project should be apparent, including coordination and communication in and amongst members of the consortium or partnership (if applicable). Not every specific action step need be included, but the outline of the major steps should demonstrate a thoughtful plan for achieving the goals of the project. The timeline should reflect significant and important milestones in an appropriate time frame.

#### 21. Planning

- **Date Range:** February - July, 2016

- **Scope of activities:** Include all specific completion benchmarks.

  - Development of training materials in collaboration with PIE and Harvard University by July, 2016.
  - Identification of classroom educators to participate in case-based training by July, 2016.
  - Identification of business, community and arts nonprofit partners to link with classroom educators to implement "cases" during the 2016-17 school year by July, 2016.

#### 22. Implementation (grant funded start-up activities)

- **Date Range:** August, 2016 - June, 2017

- **Scope of activities:** Include all specific completion benchmarks

  - Monthly implementation meetings begin by August, 2016.
  - Case-based learning materials are distributed to participating educators by September, 2016.
  - Educators are linked with business/community partner by September, 2016.
  - Facilitation training begins by September, 2016.
  - Webinar #1 available for viewing by October, 2016.
  - Educators begin to implement cases by October, 2016.
  - Monthly educator conference calls begin by October, 2016.
  - Site visit #1 completed by November, 2016.
  - Mid-year evaluation completed by December, 2016.
  - Site visit #2 completed by February, 2017.
  - Company matching for educator summer intensive completed by March, 2017.
  - Webinar #3 available for viewing by April, 2017.
  - Wrap up activities completed by May, 2017.
  - Conference call for educators electing the summer intensive completed by May, 2017.
  - Summer intensive experiences for educators completed by June, 2017.
  - Feedback forms distributed to educators and business partners by June, 2017.

#### 23. Programmatic Sustainability (years following implementation, including institutionalization of program, evaluation and communication of program outcomes)

- **Date Range:** July, 2017 - June, 2022

- **Scope of activities:** Include all specific completion benchmarks

  - Final evaluation data collected by July, 2017.
  - Final evaluation report presented by September, 2017.
E) SUBSTANTIAL IMPACT AND LASTING VALUE

24. Describe the expected changes to the instructional and/or organizational practices in your institution.

The response should illustrate the critical instructional and/or organizational changes that will result from implementation of the grant and the impact of these changes. These changes can include permanent changes to current district processes, new processes that will be incorporated or the removal of redundant processes. The response may also outline the expected change in behaviors of individuals (changes to classroom practice, collaboration across district boundaries, changes to a typical work day for specific staff members, etc.). The expected changes should be realistic and significant in moving the institution forward.

Please enter your response below:

A Straight A Fund grant will allow us to develop relevant professional development for classroom teachers around using case-based learning to engage students in real-life STEM experiences, developing the infrastructure needed to expand our teachers’ access to and engagement with local business partners. Partnerships with PIE, Harvard University, the Business Education Connectivity Council through the regional Chamber of Commerce, our local higher education institutions (University of Cincinnati, Miami University) and community college institutions (Cincinnati State Technical and Community College), and our school-based community partners will help develop and implement this vision. Increasing our implementation of case-based learning will increase our student engagement levels, content interest, learning "ownership", and non-cognitive skill development (e.g., perseverance, self-reliance, problem-solving, grit). Our educators with business experience will be more readily able to translate abstract concepts (algebra, science concepts, etc.) to real life applications, making it easier for students to learn and apply skills required for the 21st century workplace. Our students, who experience a range of careers using authentic “real life” case simulations, will have a greater opportunity to make more informed career path choices, by discovering and assessing their range of skills and talents, enabling them to make better decisions toward their future career. Our younger students will learn to collaborate and serve effectively in teams, supporting more productive academic relationships in high school. Finally, by using the case-based model, girls and minorities will excel in STEM fields, primarily because they find the content to be inclusive, empowering and engaging.

25. Please provide the name and contact information for the person and/or organization who will oversee the evaluation of this project.

Projects may be evaluated either internally or externally. However, evaluation must be ongoing throughout the entire period of sustainability and have the capacity to provide the Ohio Department of Education with clear metrics related to each selected goal.

Please enter your response below:

Julie Q. Morrison, Ph. D., Associate Professor, University of Cincinnati, College of Education, Criminal Justice, and Human Services, 513-478-3517, Julie.Morrison@uc.edu

26. Describe the overall plan for evaluation, including plans for data collection, underlying research rationale, measurement timelines and methods of analysis.

This plan should include the methodology for measuring all of the project outcomes. Applicants should make sure to outline quantitative approaches to assess progress and measure the overall impact of the project proposal. The response should provide a clear outline of the methods, process, timelines and data requirements for the final analysis of the project's progress, success or shortfall. The applicant should provide information on how the lessons learned from the project can and will be shared with other education providers in Ohio. Note: A complete and comprehensive version of the evaluation plan must be submitted to ODE by all selected projects.

Implementing a wide-scale rollout of case-based learning requires a culture of collaboration, innovation and continuous evaluation. Continuous Quality Improvement will prove vital in guiding and expanding this work, as well as ensuring that students are engaged and exploring relevant career-based learning along a K-12 spectrum. The district will establish an evaluation committee representing internal and external stakeholders who will meet regularly throughout the grant year to review the project's progress and determine if the set goals/outcomes are being implemented in the agreed upon timeline and according to the consortium’s strategic plan. The evaluation design will be a combination of quantitative and qualitative gauges and based on a logic model with four major categories: 1) INPUTS - ODE Straight A Fund grant, in-kind contributions, and partnerships; 2) ACTIVITIES - professional development geared towards case-based learning for elementary and middle grade teachers; collaborations with business and community partners; and implementation of career "cases" in partnership with business and community partners; 3) SHORT TERM OUTCOMES - implementation of new teaching methods (case-based learning) that engage and motivate students; and increased student access to relevant career exploration through STEM experiences; 4) LONG TERM OUTCOMES - increased college/career readiness; and increased number of students electing to pursue STEM career fields.

The evaluation plan consists of the following: 1) Administering a survey to students and educators in participating districts on their interest in and acumen in STEM subject both pre- and post- project. The goal is to determine whether the activities undertaken in the project have changed both their interest and perception of their skills in STEM subjects, and the program's effect on teaching "real world" innovation and creativity. 2) Questionnaires of project participants to determine the fidelity of the project plan to outcomes and results. 3) Surveys to teachers and students participating in the case-based learning programs in participating schools to determine what effect the programs had on their learning. Evaluation following summer of 2017 will follow a two-phase format. Phase I will monitor ongoing activities from August through May of each school year. The evaluation committee meetings will be bi-annual and formative in nature with the intent to assess progress and provide information to monitor and improve the project in the five years following initial grant funding. The committee will review ongoing classroom activities and professional development activities, and evaluate their effectiveness towards the previously mentioned performance goals. The district will share outcome information with a variety of parties, including the school board, parents, teachers, funders, the community, and our partner agencies.

27. Please describe the likelihood that this project, if successful, can be scaled-up, expanded and/or replicated. Include a description of potential replications both within the district or collaborative group, as well as an estimation of the probability that this solution will prove useful to others. Discuss the possibility of publications, etc., to make others aware of what has been learned in this project.

The response should provide an explanation of the time and effort it would take to implement the project in another district, as well as any plans to...
Developing case-based learning in our district is highly replicable. It has already duplicated itself as educators move across the state or across the world and have requested basic teaching materials for their new classrooms. Building upon the long-standing use and development of the Socratic Case-Based model in graduate and undergraduate programs, this pedagogy has never been introduced into the K-12 classroom. PIE was the first to pilot this learning method with Harvard University and Cincinnati Public Schools in 2012. The project’s aim is to introduce its experiential and academic achievement applications with all Ohio business, community and arts partners. This project builds on strong Chamber of Commerce ties with businesses and arts organizations representing the primary 16 career pathways identified by the ODE. Moreover, it models an educator “embedded” fellowship program currently used in California’s Silicon Valley (IISME), offering new links to Ohio industries with entrepreneurial technology, aerospace, engineering, and information science leaders including faculty from the Stanford University’s Institute of Design. We believe that the replication and adaptation of this program has global potential. In fact, in November 2015, PIE programs attracted a school visit from a US Department of State eight-nation delegation of education leaders with an interest in deploying PIE programs using case-based learning strategies, especially in driving STEM career interest in girls and women. Using storytelling, social media, learning exchanges and civic outreach, this program has the capacity to change student outcomes and reveal new career pathways for every student and educator exposed to its “real life” learning experiences. Simply put, developing transformational learning partnerships with leading Ohio companies (e.g., The Kroger Co., Honda of America Manufacturing Inc., The 3M Company, Procter & Gamble Co., General Electric Co., etc.) will be the key to Ohio’s economic and educational success. In order for our efforts to succeed, we cannot operate within a silo, nor would we want to. We understand our challenges are not unique to Cincinnati Public Schools-school districts across the state and country are facing similar challenges in the times and resources necessary to provide meaningful transition planning and supports for students. We envision great outcomes for our students, and look forward to scaling our efforts to increase case-based learning in our classrooms. Outside of our district, we look forward to sharing our results with key stakeholders in both the education and business partner realms. Because of our unique blend of partners, we aim to publish our results and best practices for other districts to implement in their schools. We also will seek out local, state and national conferences and speaking opportunities to share the exciting work of this initiative, and relay the transformational impact we’re seeing in our students’ lives. The Ohio Department of Education’s Straight A Fund will serve as a lynchpin partner in this initiative, and we look forward to working with the Straight A Fund committee on additional ways of sharing the good news with those in our region and throughout the country.

By virtue of applying for the Straight A Fund, all applicants agree to participate in the overall evaluation of the Straight A Fund for the duration of the evaluation time frame. The Governing Board of the Straight A Fund reserves the right to conduct an evaluation of the project and request additional information in the form of data, surveys, interviews, focus groups and other related data on behalf of the General Assembly, Governor and other interested parties for an overall evaluation of the Straight A Fund.

PROGRAM ASSURANCES: I agree, on behalf of this applicant, and any or all identified consortium members or partners, that all supporting documents contain information approved by a relevant executive board or its equivalent and to abide by all assurances outlined in the Straight A Assurances (available in the document library section of the CCIP).

[AGREE]
No consortium contacts added yet. Please add a new consortium contact using the form below.
<table>
<thead>
<tr>
<th>First Name</th>
<th>Last Name</th>
<th>Telephone Number</th>
<th>Email Address</th>
<th>Organization Name</th>
<th>IRN</th>
<th>Address</th>
<th>Delete Contact</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mary</td>
<td>Schlueter</td>
<td>513-871-9569</td>
<td><a href="mailto:mary@piemedia.org">mary@piemedia.org</a></td>
<td>Partnership for Innovation in Education</td>
<td>015450</td>
<td>PO Box 8722, Cincinnati, OH, 45208-0722</td>
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## Implementation Team

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<thead>
<tr>
<th>First Name</th>
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<th>Title</th>
<th>Responsibilities</th>
<th>Qualifications</th>
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<tbody>
<tr>
<td>Jill</td>
<td>Hollander</td>
<td>Career-Based Learning District Administrator</td>
<td>Dr. Hollander will serve on the Case-by-Case strategy and implementation team representing CPS. She also will serve as the Project Director and primary leader for this work.</td>
<td>In her current role with CPS, Dr. Hollander oversees all career-based learning for the district. She writes curriculum for K-12 career-based learning, recruits partners and volunteers, plans BECC-CPS career-based learning events, researches career-based learning opportunities and implements innovative career-based learning practices.</td>
<td>Prior to CPS, Dr. Hollander was the District-Wide Literacy Administrator working with CTE and College and Career Readiness Initiatives for Valley View School District in Illinois.</td>
<td>She holds a Doctorate in Education from Rockford University.</td>
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<tr>
<td>Julie</td>
<td>Morrison</td>
<td>Associate Professor, University of Cincinnati</td>
<td>Dr. Morrison will serve on the Case-by-Case strategy and implementation team as lead evaluator.</td>
<td>Dr. Morrison is an Associate Professor in the School Psychology Program at the University of Cincinnati, College of Education, Criminal Justice, and Human Services. She has over 20 years of experience in research and evaluation in education and the social sciences.</td>
<td>Dr. Morrison's previous and current clients include the Ohio Department of Education (State Personnel Development Grant, Ohio Resident Educator Program, Student Growth Measures Mini-Grant); Michigan Integrated Behavior and Learning Supports Initiative; Xavier University (Department of Education: Initiative for Catholic Schools); Cincinnati Public Schools (Office of Research, Evaluation and Test Administration; Department of Student Services; Superintendent's Office); Mayerson Academy (Cincinnati-based Vermont Mathematics Initiative, Learning Teams, Positive School Culture, Orton-Gillingham, LETRS, Kagan Cooperative Learning), St. Bernard-Elmwood Place Schools (School-Based Health Center, 21st Century Community Learning Centers); Dayton View Academy (Reading First Program); and the Literacy Network of Greater Cincinnati (Cincinnati Reads, Children's Basic Reading Program, Tutoring Seal of Approval).</td>
<td>Dr. Morrison holds a B.S. from St. Louis University, a M.A. from Xavier University, and M.A. and Doctorate from University of Cincinnati.</td>
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</tr>
<tr>
<td>Mary</td>
<td>Schlueter</td>
<td>CEO, PIE</td>
<td>Mary will serve will serve on the Case-by-Case strategy and implementation</td>
<td>In 2009, Mary Welsh Schlueter created the Partnership for Innovation in Education (PIE), a 501</td>
<td>Mary is a published author on education policy, economic development and entrepreneurship. She has worked in the U.S. House of Aumna of Allegheny College, Harvard University.</td>
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Mary represents PIE, a 3 non-profit organization. She is currently the CEO and Founder. Using experiential case-based learning, PIE programs allow students to better develop STEM-based skills beyond the traditional classroom by collaborating with industry, community and university partners. PIE Programs offer a unique opportunity to students, educators, entrepreneurs and community leaders, allowing the development of a better-prepared digital workforce, ready for whatever challenges arise in the 21st century marketplace.


school of Business, U.S. State Department (Fulbright Scholar), and the FBI.