OER Revisions and Ancillary Materials Creation Mini-Grant Application

Affordable Learning Georgia aims to support the sustainability of previous Textbook Transformation Grants implementations through revisions of created open educational resources or the creation of new ancillary materials for existing OER. Individuals or teams who would like to apply for an OER Revisions or Ancillary Materials Creation. Mini-grant participants do not need to be the original creators of the resource(s). While we welcome original authors to revise their original materials, the nature of open licenses allows for the revision and remixing of OER materials by anyone as long as the terms of the license are adhered to.

The final deliverable for this category is the revised or newly-created materials as proposed in the application, which will be hosted through GALILEO Open Learning Materials. All revised or newly-created materials will be made available to the public under a Creative Commons Attribution License (CC-BY), unless the original materials were under a more restrictive license such as the inclusion of SA (Share-Alike) or NC (Non-Commercial).

For the purposes of this grant, we define revision as the major improvement of a resource through updates for accuracy, accessibility, clarity, design, and formatting. We define ancillary materials as any materials created to substantially support the instruction of a course using an existing open educational resource(s).

Applicant Name *

Joycelyn Streator

Applicant Position *

Assistant Professor, Information Technology

Applicant Institution *

Georgia Gwinnett College

Applicant Email Address *

Please use your institutional email address.

jstreator@ggc.edu

Other Team Members

Please provide both names and email addresses here.

Type of Project *

- ○ Revision of pre-existing OER
- ◉ Creation of ancillaries for pre-existing OER
- ○ Other:

Course Number(s)

ITEC 2110

Course Title(s)

Digital Media

Final Semester of the Project *

This is the semester in which the materials created/revised will be completed.

- ◉ Summer 2020
- ○ Fall 2020

Proposed Grant Funding Amount: *

This is the total (in a dollar amount) of funding you are requesting for the mini-grant. There is a maximum of $4800, with a maximum of $2000 per team member and $800 for project expenses.

$2,800

Currently-Existing Resource(s) to be Revised / Ancillaries Created *

Please provide a title and web address (URL) to each of the currently-existing resources that you are either revising or creating new ancillary materials for below.

https://oer.galileo.usg.edu/compsci-collections/6

Project Description *

In at least one paragraph, describe your project's goals and deliverables.

ITEC 2110, Digital Media, is a multi-section course for undergraduate sequence for Georgia Gwinnett College students. There are currently 60 sections offered per year with over 1,400 students being taught annually. In Spring of 2015, a grant was awarded to transform the course to offer free and open source materials.

This proposal builds on the previous work by creating an updated workbook of connected learning activities and teaching strategies. These activities are designed to provide scaffolded learning environment by which the activities for one topic build on knowledge from the preceding topics. The workbook should work seamlessly with Dr. Lai and Chen's works, providing additional hands-on training for ITEC 2110 students and faculty.

Title of Project: ITEC 2110 Digital Media: A Workbook for Learning Technical and Design Fundamentals

The goals of this project are to:

1. Develop a workbook of online supplementary materials to support student acquisition of technical, design, and software skills in Digital Media at no cost.
2. Identify and document suggested teaching strategies for instructors using the materials. This would include common issues that student experience.

The deliverables of this project are:

1. A workbook containing a series of active learning activities that incorporated scaffolding learning.
2. A document with guidance for instructors on strategies for incorporating the activities.

Transformation Plan

ITEC 2110 is a multi-section course for undergraduate sequence for Georgia Gwinnett College students. There are currently 60 sections offered per year with over 1,400 students being taught annually. In Spring of 2015, an ALG grant was awarded to Drs. Lai and Chen to transform the course to offer free and open source materials.

This proposal aspires to build on the previous work of Lai and Chen by creating an updated workbook of connected learning activities and teaching strategies. The workbook should work seamlessly with Lai and Chen's works, providing additional hands-on training for ITEC 2110 students and faculty.

The workbook will provide scaffolding learning that allows the student to master technical concepts in a progressive manner. Scaffolding learning allows students to be more engaged in class and allows for the acquisition not only of knowledge but a deeper understanding concepts. In this methodology, students will be provided instructions during the early stage. However, responsibility for learning will shift to the student as they acquire more skills and knowledge. (Jumaat and Tasir, 2013, Proceedings of the IEEE). Digital Media lends itself well to scaffolding learning since the course provides opportunities for hands-on projects that would demonstrate a student's progressive acquisition of knowledge and skills.

Dr. Streator will design activities that will cover three essential areas of mastery: technical concepts, design principles, and acquisition of software skills. The workbook is expected to contain some 20-25 activities to cover a 15-week course. The ITEC 2110 Learning Strategies for Faculty guidebook is expected to contain pedagogical strategies, solutions, and common challenges that students face. In addition, Dr. Streator will design a survey to assess student performance and attitudes.

Dr. Streator will develop a pilot to introduce the exercises into three projected sections that she will be teaching during the life of the project. All of the sections will be ALG-designated ITEC 2110 classes (classes using the online textbook). In addition, she will administer the survey and gather data during the semester. The data will report on improvements on students' performance and attitude towards the workbook.

REFERENCE:

Jumaat, Nurual Farhana and Zaidatun Tasir, "Instructional Scaffolding in Online Learning Environment: A Meta-analysis" Proceedings of the IEEE,, April 2014. Retrieved from: https://www.researchgate.net/publication/269033099_Instructional_Scaffolding_in_Online_Learning_Environment_A_Meta-analysis

Timeline and Personnel *

Provide a project timeline with milestones below, keeping in mind your selected Final Semester above. Provide a short description of the roles any additional team members will take on during the activities in your timeline.

Fall 2019 (Starting November 2019)

Key Dates
October 4, 2019: Notification
October 28, 2019: Kickoff Meeting. Mini-grantees will have online orientation.

Fall 2019
Dr. Streator will review the ALG-funded materials and resources to enhance the materials that will be developed for this proposed project. This semester will be spent planning the project. She will request for IRB approval as she will administer a questionnaire to determine changes in students' attitude and performance.

Dr. Streator will begin disseminating information about the completed ITEC 2110 workbook and faculty guide to faculty teaching the course in spring 2020. Faculty who utilize the materials will be asked to complete a brief questionnaire so to improve the workbook.

Spring 2020
Dr. Streator will pilot the activities in two sections of ITEC 2110 in the spring semester. She will gather and analyze evaluation data on student performance and attitude towards the workbook. She will then make further adjustments. In addition, she will refine the ITEC 2110 Learning Strategies for Faculty guidebook based on survey data from faculty and students who piloted the activities.

Summer 2020
Dr. Streator will continue to pilot the materials in one section of ITEC 2110 in the summer. She will gather analyze the collected data on student performance and attitude towards the revised workbook during the last two semesters. The data will be used for a presentation at the STL Commons spring conference. The presentation and the results of the project will be part of the PI's final report to ALG.

Budget *

Please enter your project's budget below. Include personnel and projected expenses. The maximum amounts for the award are as follows: $4,800 maximum award, $2,000 maximum per team member, $800 maximum for overall project expenses. Unlike standard-scale and large-scale transformations, the maximum of $800 is not a required element of the budget, but rather meant primarily for the purchase of specific tools and software which would help with improving resources.

Request: $2,800

Budget Justification:

Compensation for faculty: $2,000
Funds are requested to cover the PI's, Dr. Joycelyn Streator, work related to refining and piloting the exercise and for designing documents for publication, online posting of learning activities. The funds will cover her pay and fringe benefits (FICA Med, FICA SS, and retirement).

Project Expenses (travel, etc.): $800
These funds are requested to partially pay for travel expenses to events such as the Lilly National Conference on College and University Teaching and Learning. The team will disseminate information on the ALG grant and to encourage other ITEC 2110 faculty throughout the nation to adopt OER materials for their courses.

Total: $2,800

Creative Commons Terms *

- [x] I understand that any new materials or revisions created with ALG funding will, by default, be made available to the public under a Creative Commons Attribution License (CC-BY), with exceptions for modifications of pre-existing resources with a more restrictive license.