1. **Proposed initiative: (limited to 500 characters or less)**

   Strategic Enhancement of Courses within the Environmental Science, Conservation, Community Planning and Geology Curricula. This initiative seeks funds to support revisions and additions to courses in a way that increases the critical thinking, active learning and multidisciplinary nature of courses involved in the realignment of four majors within the Plant and Earth Science Department – Conservation, Environmental Science, Community Planning, and Geology – along with portions of another program – Crop and Soil Science.

2. **Person, administrative department, or college proposing the initiative:**

   Department of Plant and Earth Science, CAFES

3. **Which strategic goal does this initiative support?**

   Distinctive Academic Excellence

4. **Describe how the initiative supports the goal(s). (limited to 1000 characters or less)**

   The Plant and Earth Science Department is interested in revising and realigning four majors within the department to increase the connections between and interdisciplinary nature of the majors. Due to the substantial nature of the curricula remodel, implementation support is needed. Several courses will needed to be discontinued, new courses developed and several courses will require extensive redesign. In order to increase the effectiveness of these curricular changes, this initiative seeks funds to support revisions and additions in a way that increases the critical thinking, active learning and multidisciplinary nature of the resulting classes. Specifically, faculty members will be supported by released time or summer stipends based on proposed changes deemed most effective in creating distinctive, academically excellent courses that fit into the revised majors. The belief is that these revised majors will provide better educational opportunities for students and be more readily accepted by employers as well.
5. Based on the definition of university-wide Initiative [initiative that spans across colleges, units, and departments], indicate how the proposed initiative has a university-wide impact: (limited to 1000 characters or less)
The four majors involved in the curricular realignments are Community Planning, Conservation, Environmental Science and Geology. In addition, the environmental portion of the Crop and Soil Science Major will also be involved in these revisions. ESIS (Fall 2012) showed 215 first-major students in the four principal majors involved. These students will be positively impacted as courses within the majors are revised to be more interrelated and include more effective teaching and learning methods. Many other students in the PES Department take these courses and will be positively impacted by these changes as well. In addition, five general education courses, including the two heavily-enrolled GEOL 101 and ESM 105, are involved in the majors being revised, thus the education of many students throughout the university will be enhanced by these revisions. In addition, it is expected that the realignment of these majors along with revisions in the curricula will lead to enhanced recruitment of new students to UWRF through creative marketing of relevant educational and employment opportunities.

6. Please provide a set of benchmarks and / or indicators of success to support your initiative. (limited to 1000 characters or less)
An easily measured benchmark is completion of 5-10 course revisions or additions that include more effective incorporation of connectedness between classes and more active learning methods of delivery. These will be the courses supported by stipends from this initiative. There will be additional course revisions or additions required through the curricular realignment. In the longer term, an indicator of the success of this effort is the number of students majoring in the realigned majors and enhancement of overall enrollment totals at UWRF.

7. Indicate, to the best of your consideration, which of the foundational elements mentioned below will the initiative engage. You will have opportunity to elaborate on each element on the next page. (Please indicate YES or NO each of the foundational elements.)
   Sustainability - yes
   Inclusiveness - yes
   Human Capital - yes
   Technology - yes
   Facilities – yes
   Finance - yes
   Other

8. SUSTAINABILITY: Indicate how SUSTAINABILITY would be affected by the initiative. If SUSTAINABILITY is not affected by the initiative, please describe why not. (limited to 1000 characters or less)
All courses in the four majors being realigned have a clear and direct relationship to sustainability. Indeed, these majors may be considered one of the centers of sustainability programming on this campus. The titles of some of the courses involved in this curricular
change demonstrate the close tie to sustainability: Environmental Sustainability, Environmental Geology, Fate and Transport of Chemicals in the Environment, Hydrology and Water Quality, Environment Impact Assessment, Soil and Water Conservation, GIS Applications in Resource Management, Geological Destinies of Nations, and others.

9. **INCLUSIVENESS**: Indicate how INCLUSIVENESS would be affected by the initiative. If INCLUSIVENESS is not affected by the initiative, please describe why not. (limited to 1000 characters or less)

Making course materials more active usually promotes greater inclusiveness especially if the materials are designed with that in mind. For example, inclusion of Google Earth activities into one of our GEOL 101 sections uses locations from all across the globe and particularly from Asia where some of our students are from. They enjoy the opportunity to learn more about their region rather than just local examples. In addition, it helps facilitate classroom discussions because they then feel more confident talking and sharing their insights. Each instructor receiving a stipend will be asked to consider how inclusiveness can be enhanced in their revision or new course.

10. **HUMAN CAPITAL**: Indicate how HUMAN CAPITAL would be affected by the initiative. If HUMAN CAPITAL is not affected by the initiative, please describe why not. (limited to 1000 characters or less)

One of the goals of realigning the four majors is to increase the effectiveness in using faculty resources across different majors within the department. In addition, this initiative provides help to current faculty members in facilitating the development of new and revised courses associated with these curricular changes.

11. **TECHNOLOGY**: Indicate how TECHNOLOGY would be affected by the initiative. If TECHNOLOGY is not affected by the initiative, please describe why not. (limited to 1000 characters or less)

Use of technology in a way that increases the effectiveness of student learning will be a clear focus of this initiative. Inclusion of technology capability into 221 Ag Science is part of a related lab remodel proposal.

12. **FACILITIES**: Indicate how FACILITIES would be affected by the initiative. If FACILITIES is not affected by the initiative, please describe why not. (limited to 500 characters or less)

In a different, but related proposal, the Plant and Earth Science Department/CAFES will submit a lab remodel proposal through the normal university budgeting process to remodel 221 Ag Science to facilitate more active learning activities and hybrid teaching in that room. This lab remodel proposal will be ranked as the highest priority in CAFES after the remodel of 217 Ag Science.

13. **FINANCE**: Indicate how FINANCE would be affected by the initiative. If FINANCE is not affected by the initiative, please describe why not. (limited to 1000 characters or less)
This initiative requests $10,000 to be used in faculty released time or summer stipends to support the course revisions and development associated with this strategic initiative.