

Grand Valley State University

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Anatomy of an “Instruction Plan”: Information Literacy, ABET Lifelong Learning, and the Engineering Curriculum

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Available at: https://works.bepress.com/debbie_morrow/10/

Abstract

Planning library instruction to help disciplinary departments meet accreditation is a strong way for academic libraries to demonstrate value. During 2012 the Liaison Librarians at Grand Valley State University undertook a new initiative to develop "instruction plans" for each of our liaison departments. The goal of a departmental instruction plan is to profile the curriculum in a discipline and strategically identify prospective courses for offering library instructional support where the greatest number of students can experience the most benefit, relevant to specific assignments and discipline-specific skill areas. The plan also captures specific information literacy core competencies that the librarian plans to address through those targeted courses.

This poster will present elements of the GVSU University Libraries instruction plan format, in relation to the School of Engineering's program assessment plans, and to courses targeted for possible collaboration with the Engineering Liaison Librarian.

Course Details: EGR 220

c. Reason Targeted

Engineering program 'Student Outcomes' accreditation criterion 3(i): programs will be able to demonstrate (i.e. with assessment data) that students have "a recognition of the need for, and an ability to engage in life-long learning" [1].

g. Information Literacy Core Competencies

The GVSU Libraries have developed a scheme of 'ILCCs' coordinated with the University's General Education program, using ACRL's Information Literacy Competencies for Higher Education as a foundation. [2]

Below are specific ILCCs that could be taught in IL instruction for a lower level course such as EGR 220. This course is required for full secondary admission as an Engineering major, so all major will receive the instruction.

1. Identify the topic
2. Determine the scope and depth of the information needed
3. Locate information sources
4. Evaluate the information sources
5. Use the information
6. Communicate the information

Department Overview & Summary of Targeted Courses

Overview of IL for Engineering – highlights

- Historically the EGR Liaison Librarian at GVSU has primarily monitored the print collection and acquisition of databases.
- The BSE program at GVSU has a very hands-on, applied focus, and a strong majority of graduates have job offers directly upon completing their degrees; a few go on to graduate programs.
- Since 2001, ABET, the engineering program accrediting body, has newly emphasized documented student outcomes – i.e. assessment of student learning.
- Prior to their 2010 re-accreditation EGR dedicated a faculty position to assessment coordination; this faculty member has been a good contact for me as Liaison Librarian.

Summary of targeted EGR courses, as of Summer '12

Courses to be targeted for information literacy instruction

Course Code	Semesters Offered	Number of Sections	Number of Students
EGR 220	Fall, Winter	F – 5+ ; W – 8+	F – 80+ ; W – 129+
EGR 250	Winter, SpSu	W – 3 ; SS – 1	W – 74+ ; SS – 15
EGR 290-390-490	Fall, Winter, SpSu	n/a	F – 52 (490); W – ? ; SS – 57 (390), 2 (390), 4 (490)
EGR 485-486 (Capstone)	Winter – SpSu	W – 1 lecture/9 labs ; SS – 4+ labs	W – 90 ; SS – 90

- I obtained the references from a 20-page term paper assignment in the S'12 section of EGR 250 and did a citation analysis (approx. 250 citations) which I hope will become a basis for discussion and collaboration on locating and evaluating appropriate sources.
- During W'13 I sat in on the weekly meetings of Senior Design (EGR 485) teams with their faculty advisor, to begin to evaluate possible IL support I can offer at this advanced undergraduate level.



Begin with an ...

Instruction Plan Template

Department:
Liaison:
Date:

Overview of library instruction for this department: (include the history of the relationship with the department, what makes this discipline unique, any special projects that require library assistance, any special outreach or promotional efforts (such as a departmental open house for prospective majors), special training for faculty, cooperation or team teaching with other librarians, and the number of students in the major/minor)

Courses to be targeted for information literacy instruction

Course Code	Semesters Offered	Number of Sections	Number of Students

Details (expand to as many courses as necessary)

- Course code and number:
- Course name:
- Course description:
- Reason targeted:
- Number of sections offered in the upcoming academic year:
- Number of sections I plan on teaching:
- Number of students I would reach in those sections:
- Specific Information Literacy Core Competencies to be taught:
- Medium of instruction (in computer lab, in classroom, online tutorial, streaming video, etc.):
- Syllabus goals or assignments that require library research:
- Assessment activities for this course:
- Additional comments (lesson plan ideas, special requests from previous professors, special skills required, etc.):

Course Details: EGR 220 (cont.)

h. Medium of instruction

- Lecture-demonstration-discussion
- Using a made-up slide set with discussion questions as prompts

Does hot water freeze faster than cold water?
A hypothetical experimental investigation

Apparatus

- What images are there?
- How do you think?
- Why do you think that? For any possible explanation?
- How do you think that? For any possible explanation?
- Copyright and educational "fair use": in a nutshell, for your classroom presentation you will not be infringing on the rights of a copyright holder. You must, however, give credit to the original author and must clearly distinguish your original content from the original work. It is your responsibility to obtain permission for your intended use from each rights holder. At a minimum, documenting the source in the presentation is a good practice and a good practice.

i. Syllabus goals or assignments requiring research & j. Assessment activities for this course

- EGR 220 course objectives (from the syllabus) include:
 - write technical reports of various forms to communicate information obtained from scientific and engineering experiments; and,
 - prepare and give technical oral presentations.
- Course final assignment is: oral presentation with slides.
- Periodic assessment of ABET 3(i) done using: a sample of the presentation slide sets, scored using a rubric expanded from portions of the grading rubric for the presentation.

Real-World Problem	Library Skill Competency	Assessment	Debbie Morrow, Liaison Librarian
1. Problem: A student is struggling to understand a complex engineering concept.	1.1. Identify the topic	1.1.1. Identify the topic	1.1.1. Identify the topic
2. Problem: A student is struggling to find relevant information for a project.	2.1. Determine the scope and depth of the information needed	2.1.1. Determine the scope and depth of the information needed	2.1.1. Determine the scope and depth of the information needed
3. Problem: A student is struggling to evaluate the credibility of a source.	3.1. Locate information sources	3.1.1. Locate information sources	3.1.1. Locate information sources
4. Problem: A student is struggling to use the information found.	4.1. Evaluate the information sources	4.1.1. Evaluate the information sources	4.1.1. Evaluate the information sources
5. Problem: A student is struggling to communicate the information found.	5.1. Use the information	5.1.1. Use the information	5.1.1. Use the information
6. Problem: A student is struggling to communicate the information found.	6.1. Communicate the information	6.1.1. Communicate the information	6.1.1. Communicate the information

References

- ABET. (2012). *Criteria for Accrediting Engineering Programs, 2012 – 2013*. [web]. www.abet.org. Retrieved May 9, 2013 at: <http://www.abet.org/Engineering/Engineering/Programs/2012-2013>
- The version shown here is a draft, not yet published. It is a revision of the following, in collaboration with the GVSU General Education Program: Grand Valley State University (2010). *Information Literacy Core Competencies*. Retrieved from <http://www.gvsu.edu/libraries/>

Contact Information

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