University of Louisiana at Lafayette

Detailed Assessment Report 2015-2016 Industrial Design BID

As of: 11/04/2016 12:54 PM CENTRAL

(Includes those Action Plans with Budget Amounts marked One-Time, Recurring, No Request.)

Mission / Purpose

Industrial design is a unique field that emphasizes practical concern for design restrictions while creating products that cater to human characteristics, requirements, and interests.

The four-year professional degree in industrial design encourages collaborative and experiential learning with diverse disciplines, and we work to create a hands-on learning environment that is conducive to creative exploration. We emphasize a broad understanding and sensitivity to environmental and social concerns, while working to help you develop critical thinking and problem solving skills. We want you to advance in industrial design with the knowledge that user needs, universal design, sustainability, human-centered design, and ergonomics all play an integral role in industrial design.

We will work with you to advance industrial design knowledge, cultivate aesthetic sensibilities, and improve the material conditions and the needs of people and their environments. You'll become proficient in drawing, visual communication, graphic layout, form development and physical model making. In addition, we're always seeking out new methodologies to incorporate technology into the curriculum, such as advanced computer modeling, photo-realistic rendering, rapid prototyping, and CNC milling. We want you to be well prepared for the professional design world and have the ability and passion to make a positive contribution to the betterment of humankind through teaching, research, practice, and service.

Student Learning Outcomes/Objectives, with Any Associations and Related Measures, Targets, Findings, and Action Plans

SLO 1: Drawing Skills

Drawing Skills: Ability to communicate within a two dimensional format .

Related Measures

M 4: Drawing Skills

Student comprehesion of stroke, lineweight, perspective, core and cast shadows, and rendering techniques. Students showed 80% competency in this area. The students were assessed by Jerome Malinowski, Andy Lowey, and Adam Feld.

Source of Evidence: Evaluations

Target:

The goal of the drawing skills evaluation was to achieve 90% in competency of 2-D graphic communication

Finding (2015-2016) - Target: Met

Drawing skills were taught to 32 First year students. 28 of 32 students (87.5%) showed competency and are prepared to enter into their second year.

Related Action Plans (by Established cycle, then alpha):

Drawing

Drawing development needs to be measured for at least three years to understand its success rate. For the first year it was 87.6% and this year was 85%. 30% of this class was remedial

Established in Cycle: 2011-2012 Implementation Status: Finished Priority: High

Relationships (Measure | Outcome/Objective):

Measure: Drawing Skills | Outcome/Objective: Drawing Skills

Implementation Description: Additional drawing assigments were added. Also guest lecture demonstrations were added.

Responsible Person/Group: Jerome Malinowski

REwork Sketching Presentation

The Industrial Design Faculty are now teaching DSGN 114 to allow the Industrial Design students the chance to get the teaching they will need for the later years in the program. Since SP 16 was the first semester an ID professor taught the class the assignments were tested. Some assignments worked and some could use better description. In addition to describing the assignments, it is imperative for the students to receive visual examples on their project briefs to support class demos.

Established in Cycle: 2015-2016 Implementation Status: In-Progress Priority: High

Relationships (Measure | Outcome/Objective): Measure: Drawing Skills | Outcome/Objective: Drawing Skills

Implementation Description: Reworking assignments and adding visual examples to project briefs

Responsible Person/Group: Prof. Adam Feld

Additional Resources: A Mirror that can be suspended above the demo area OR a tablet based tv or projector would assist in demonstrating to students techniques.

SLO 2: 3D Modeling Skills

Modeling Skills: Ability to communicate within a three dimensional format. Modeling skills, 3D mock up exploration, form development, craftsmanship, and models were assessed.

Related Measures

M 5: 3D Modeling Skills

Modeling skills were assessed on 14 students. 30% of these students were remedial. They scored 82% in the competent area. The students were assessed by Jerome Malinowski, Andy Lowey, and Adam Feld.

Source of Evidence: Evaluations

Target:

The goal was to achieve 90% in the competent area in 3D Modeling skills.

Finding (2015-2016) - Target: Met

15 Students were taught in 2014/15 as well as 14 students in 2015/16 in Surface modeling as well as solid modeling. The intent was to assign projects

that will build on certain skills needed in the development of products for presentation as well as rapid prototyping. In each class, students achieved 90% and 85%. The 2014/15 class has had a longer period with the software and has developed further. The 2015/16 class greatly understood surface modeling but is having difficulty with solid modeling.

Related Action Plans (by Established cycle, then alpha):

New 3D modeling software

Learning 3-dimensional modeling is difficult especially when each software application looks different and works in different ways. Since there is difficulty in learning how to navigate different programs as well as a cost to students, a new software is being suggested. The new software is cross platform as well as free to students. This will allow the students to build in surface as well as solid modeling in addition to export to machinery. The hope is that with a single program, the interface will be similar and student learning will be greater.

Established in Cycle: 2015-2016 Implementation Status: In-Progress Priority: High

Relationships (Measure | Outcome/Objective):

Measure: 3D Modeling Skills | **Outcome/Objective:** 3D Modeling Skills

Implementation Description: Since learning new software takes time, the idea is to begin with machining in the fall so students are comfortable with the software's interface and are able to export to the rapid prototyping equipment. The students will then have a class INDN 308 that will begin the 3D modeling with the new software.

Projected Completion Date: 10/2016 Responsible Person/Group: Prof. Adam Feld Additional Resources: N/A

SLO 4: Board Presentations Portfolio

The portfolio is the culmination of all 4 years of design work put within a two dimensional graphic context. A bound book format is required.

Related Measures

M 6: Merit Presentations

Evaluated INDN 402 for the IDSA Student Merit Award Competition Presentations. It is mandatory for all students in INDN 402 to develop, design, and present an overview, in digital and oral form, of their experiences and projects while in the Industrial Design Program in the SOAD. This presentation is an educational device to synthesize their design experiences and compressing those experiences into a 7 minute presentation format. This meets the Industrial Designer Society of America standard for oral and visual presentations in a national student competition.

The studetns are evaluated in three stages:

- 1.) By the Faculty
- 2.) By 5+ local industry professionals
- 3.) Regionally and nationally

The presentations are evaluated by 5 criteria:

- 1.) Scope of Work
- 2.) Quality of Work

- 3.) Quality of Thought
- 4.) Visual Presentation
- 5.) Verbal Presentation

Source of Evidence: Presentation, either individual or group

Target:

Students measured success is 70% upon completion of their presentation.

Finding (2015-2016) - Target: Met

14 students were in INDN 402 and 13/14 presented. The presentations in SP 16 measured a success rate of 11 of 13 (84%). Two presentations were not successful due to non-completion or lack of preparedness. Many students surprised the faculty and judges due to the narrative of their presentation. The visual quality of the work also increased.

Related Action Plans (by Established cycle, then alpha):

Oral and Visual Presentation of ID Program Experience

Stressing the importance of visual and oral presentations in a formal setting during class. Self evaluation as a designer and the importance of creating a narrative with in the story.

Tools employed

- 1. Story boarding to develop personal narrative
- 2. 2 min, 4 min, 7 min Repetitive presentations
- 3. Placing visuals within software

Established in Cycle: 2014-2015

Implementation Status: In-Progress Priority: High

Relationships (Measure | Outcome/Objective):

Measure: Merit Presentations | **Outcome/Objective:** Board Presentations Portfolio

Implementation Description: Professor will further encourage students, extrapolating examples of excellent presentations, make presentation completion and submission part of passing INDN 402.

Projected Completion Date: 03/2015

Responsible Person/Group: Industrial Design Faculty and 5+ Industry Professionals

Additional Resources: Better Projectors, Controlled environment, Locale conducive to professional presentations.

Peer Evaluations

Each Student will have to review their fellow classmates presentation and give feedback and input.

Established in Cycle: 2014-2015 Implementation Status: In-Progress Priority: High

Relationships (Measure | Outcome/Objective): Measure: Merit Presentations | Outcome/Objective: Board Presentations Portfolio

Implementation Description: Students will use the IDSA Merit Jury Form and give feedback based on the 5 categories Projected Completion Date: 03/2015 Responsible Person/Group: The course Instructor

Merit Preparedness

For most of the students, preparedness was key in their presentations. The faculty feel that the students need to work earlier on their presentation so they are prepared when the date comes for the Merit Awards. As for the winner, the student worked one on one with the faculty to perfect their speech in addition to time frame and are prepared to compete at the Southern District Conference April 16th, 2016.

Established in Cycle: 2015-2016 Implementation Status: Planned Priority: High

Relationships (Measure | Outcome/Objective):

Measure: Merit Presentations | **Outcome/Objective:** Board Presentations Portfolio

Implementation Description: Discuss with the students about preparedness for Merit. We invited students in the third and second year to watch the presentations so they have an understanding of what they will need to do spring semester of their graduating year.

Projected Completion Date: 01/2017

Responsible Person/Group: The Industrial Design Faculty **Additional Resources:** n/a

Analysis Questions and Analysis Answers

How were assessment results shared and evaluated within the unit?

The past assessment cycle was developed by the Weave Coordinator and then shared with the group. In the past year the 3 Industrial Design faculty have worked together to develop and evaluate each goal, measure and finding. When the Industrial Design Units were complete, the results were accessed by the program director and associate dean.

Identify which action plans [created in prior cycle(s)] were implemented in this current cycle. For each of these implemented plans, were there any measurable or perceivable effects? How, if at all, did the findings appear to be affected by the implemented action plan?

Action plans implemented for this current cycle were for: Sketching, 3D modeling, Time management, and Merit Presentations. For sketching, the third year faculty member taught the first and third year Industrial Design students how to rapidly visualize in a particular style. Through repetition and constantly new topics to sketch, the students progressed further and were appropriately prepared to go into their next year. For 3D modeling, the students begin 3D modeling in the spring of second year and then have all of third year to progress. With the direct connection to projects designed and then prototyped, the students had a large leap on competency in the software. For Time Management, this has been a struggle with the newer generations of student. However, this year there are plans to help the students by the use of Gantt charts and time recording. Finally, the Merit Presentations, this past years class had a huge success in the development of their presentations for the IDSA Southern District conference. The action plan was to begin earlier and the presentations reflected the additional time. The findings were affected by the application of a new plan or way of approaching the issue, with the intent of increasing the student's ability or knowledge in that subject.

What has the unit learned from the current assessment cycle? What is working well, and what is working less well in achieving desired outcomes?

Since the Industrial Design faculty develop each goal, measure, and finding, we are able to see more quickly how things are working. We look at each goal, measure, and finding to develop new action plans for the following semester and year. This past year, we focused on drawing skills, presentations, and portfolio. Since we developed the action plans together, we were able to approach each project in the semester with the development of drawing, presenting, and the creation of student's portfolios. The program also begins each semester with a vertical classroom, which allows the faculty, and students to all interact. What this means is that students who are not in a class with a particular teacher feel free and confident to ask them questions, thus allowing for a more cohesive development of student skills.