

WPI

Helping Undecided Students Select a Major

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Abstract

The Career Development Center's (CDC) Major Section is designed to give students a brief overview of majors they are interested in. It's original state was lacking ease of understanding, aesthetic design, and useful information. Our project redesigns the site to promote these factors.

Problem

80% of college students are undecided⁽¹⁾. They would benefit from having better information about majors at WPI.

Solution

Redesign the CDC website with several goals in mind:

Simple to understand

Easy access to a large quantity of useful information

Successfully educate students on a specific major

Before

Aerospace Engineering

Aerospace Engineering stems into two subdisciplines: Aeronautical and Astronautical Engineering. The designing, testing, and supervision of manufacturing aircrafts, spacecrafts, and missiles is the work of an Aerospace Engineer. New technologies are created for various usages, such as: aviation, defense systems, space exploration, structural design, guidance, navigation and control, instrumentation and communication, along with production methods. Some of the aerospace products that an Aerospace Engineer works on are: commercial aircrafts, military fighter jets, helicopters, spacecraft, along with rockets or missiles. Aerospace Engineers are experts in thermodynamics, propulsion, acoustics, or guidance systems. They typically work in the aerospace product and parts industry, along with motor vehicles manufacturing and designing vehicles that have lower air resistance and fuel efficiency.

SAMPLE OCCUPATIONS:

- Aerospace Engineer
- Aeronautical Engineer
- Design Engineer
- Aerospace Technologist
- Mathematical Software Programmer
- Flight Test Engineer (Flight Systems Test Engineer)
- Systems Engineer
- Aerospace Stress Engineer
- Avionics Engineer
- Structures Engineer
- Test Engineer

SKILLS REQUIRED:

- Analytical or scientific software
- Computer aided design CAD software and CAM software
- Critical thinking
- Complex problem solving
- Operations analysis
- Speaking
- Reading comprehension
- Mathematics
- Science
- Monitoring
- Writing

PROFESSIONAL ORGANIZATIONS:

- American Institute of Aeronautics and Astronautics
- Aerospace and Electronics Systems Society of IEEE
- Aerospace Industries Association
- American Astronautical Society
- Society of Flight Test Engineers

- Information is too specific, and may not be relevant to all students.
- Doesn't list any further reading resources.
- No Flow, entire page is made of unrelated lists.

After

Aerospace Engineering

Aerospace Engineers design or coordinate technical personnel involved in the creation, fabrication and testing of air, space, and water vehicles.

WPI has Professional Associations on Campus:

- American Institute of Aeronautics and Astronautics
- Institute of Electrical and Electronics Engineers
- American Society of Mechanical Engineers
- Pi Tau Sigma

Your Major isn't always your Job Title...

Some Job Titles of WPI Graduates in this field are:

- Mechanical Design Engineer
- Industrial Engineering Lead for Global Transitions Programs
- Engineering Manager
- Commercial Technical Publications Coordinator
- Vehicle Specialist

Other common Job Titles can be found at [MySkillsMyFuture](#).

Salaries are an important consideration

The wages of WPI Graduates found in the [First Graduation Report](#)
Average Starting Salary (2014): \$57,000

Companies and Industries

Companies that hire Aerospace Engineers:

- Boeing
- Lockheed Martin
- Raytheon
- US Air Force/Navy

Industries that also hire Aerospace Engineers:

- Aerospace Design
- Aircraft Manufacturing and Research
- Navigations and Measurement Development
- Quality and Control Instrument manufacturing

Common Occupational Activities

- Analyzing Data
- Inspecting Equipment and Structures
- Computer-Aided Design
- Materials Research
- Drafting and Specifying Technical Devices and Equipment

Learn more Aerospace Engineering

What a typical day in the life on an Aerospace Engineer might look like:
[Career Cornerstone](#)

On Campus:

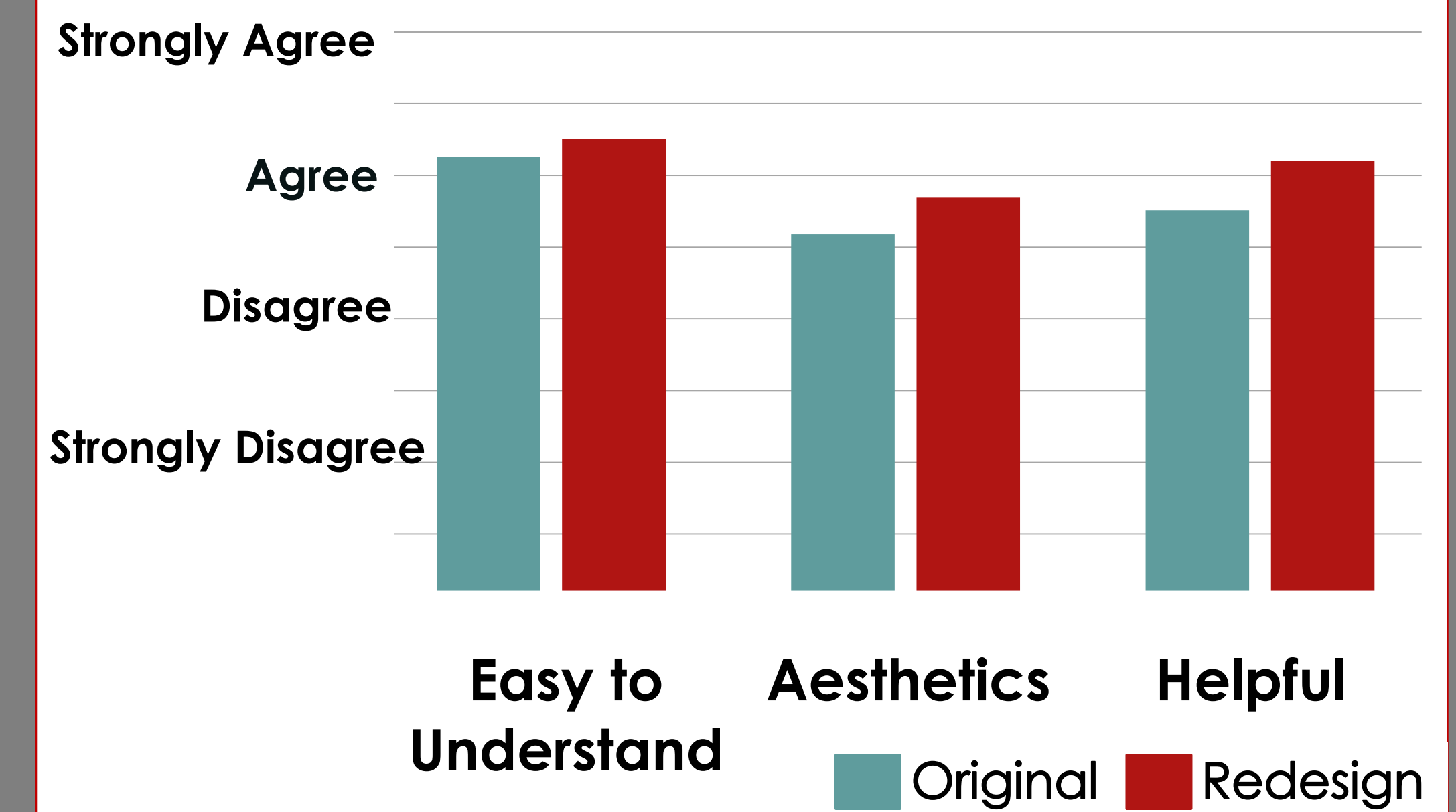
- Aerospace Engineering Department
- Course Catalog
- Research

- Information is laid out by relevance to students.
- Points to resources that expand on specific sections students want to know more about.
- Flow is conversational, progression is natural and easy to understand.

Benefits

- Students can learn the basic background of a major easily.
- Students can make informed decisions about what to major in.

Comparison of Old and New CDC Site



Conclusion

Results show that students respond well to the new layout. Smaller categories eased comprehension of information. Some students responded that the page text was not formal enough. **The updated content is live on the CDC website.**

View Original

View Redesign

Survey

References

(1) Haynes, G., & McCrone, T. (2012, October 1). Young people's decision-making: The importance of high quality school-based careers education, information, advice and guidance. Taylor and Francis online. Retrieved November 5, 2014.

(2) Hurst, J., & Good, L. (2009). Generation Y and career choice: the impact of retail career perceptions, expectations and entitlement perceptions. Career Development International, 14(6-7), 570-593. doi:10.1108/13620430910997303