

Pieper Professorship for Servant-Leadership



COLLEGE OF ENGINEERING
UNIVERSITY OF WISCONSIN-MADISON

Extraordinary Opportunity

Pieper Professorship for Servant-Leadership

- The Pieper Family Foundation's visionary support will enable enriched programming and opportunities for students to grow into thoughtful and generous servant-leaders.

A Profound Thank You

- The Pieper Family Foundation's commitment in developing student leaders offers the UW-Madison College of Engineering an extraordinary opportunity.
- We look forward to working with you as partners in helping students see the larger world they exist in, and how they may help others through ethical decisions, and genuine service.

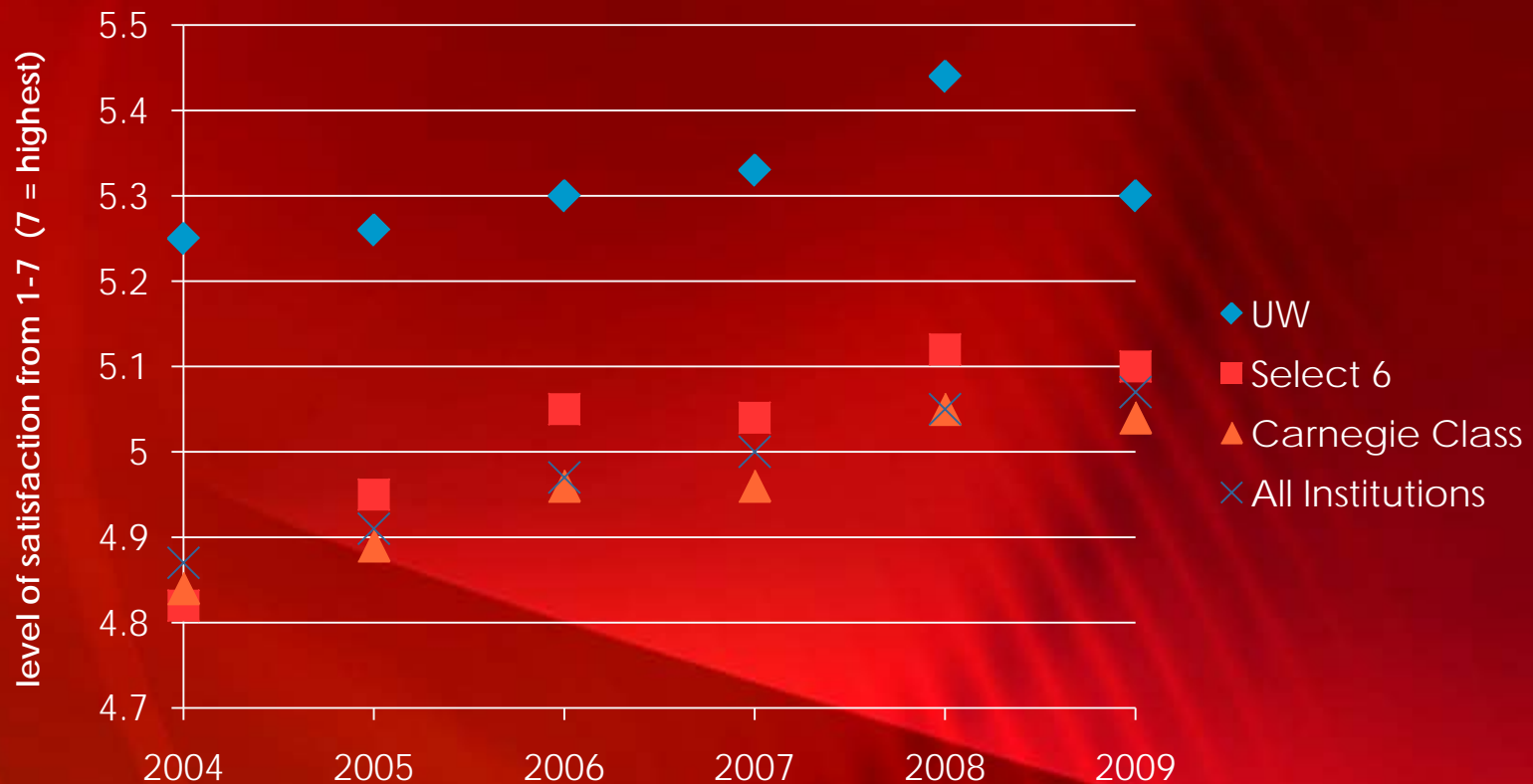
Past & Present: Practice and Data

- Benchmarking data
- Coursework
- Service projects
- Research

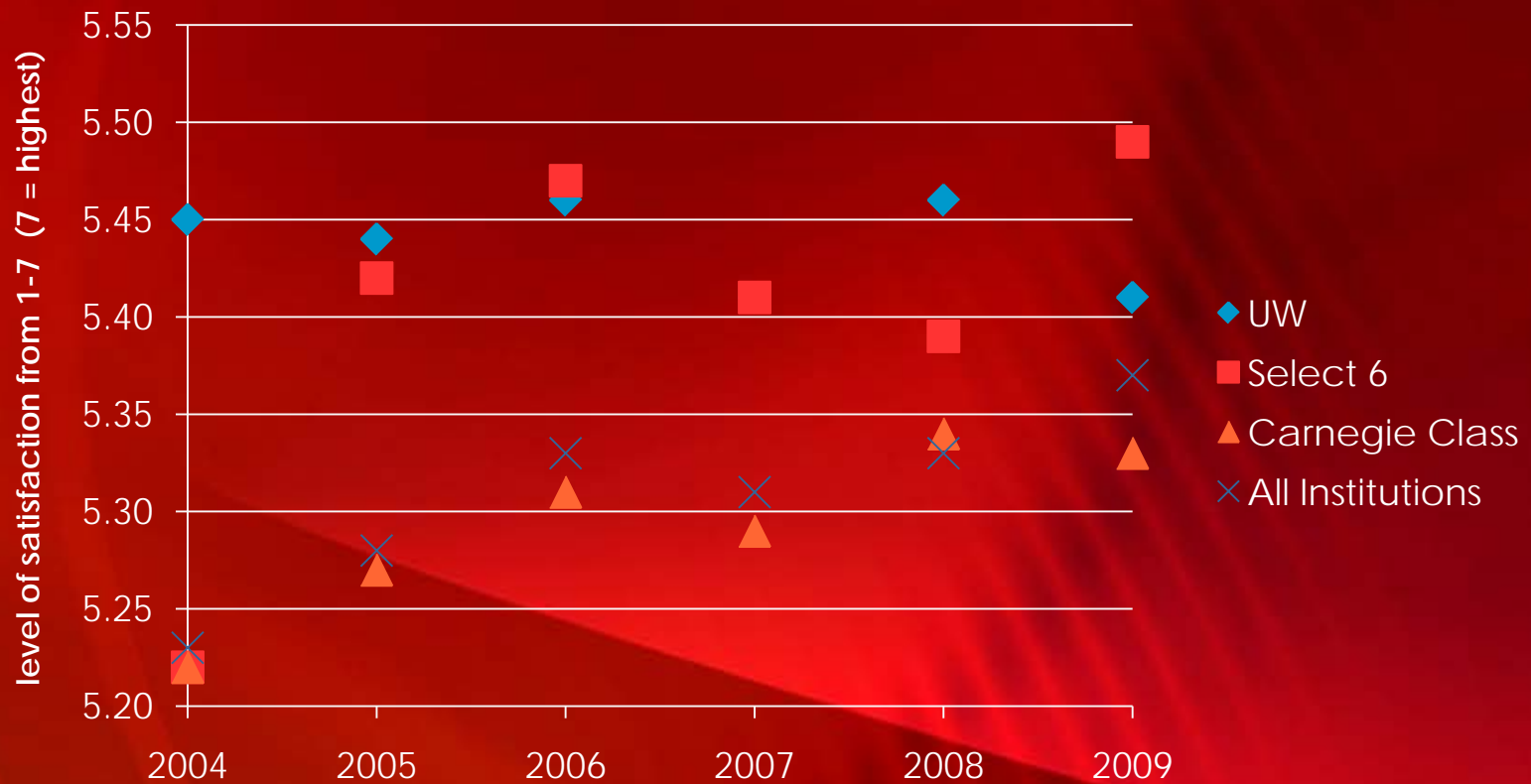
Benchmarking with Peers

- **Source:**
- Engineering Student Assessment Benchmarking Project: designed to provide comparative feedback from graduating undergraduate students regarding their Engineering Student experience.
- **Question Scale**
- The factor and question analysis is based on the numbered questions in the survey which are designed to gather perceptions of the participants across a variety of content areas. These questions rely on a 1 to 7 scale with "1" indicating either strong disagreement or being very dissatisfied and "7" indicating either strong agreement or being very satisfied.
- **Factors**
- Factors (also called constructs) are statistical grouping of questions. Conceptually, factors describe a broader concept while questions describe specific items. For more information, please see the supplemental information section.
- **Questions related to "Factor 4: Team & Extracurricular Activities"**
- Q27: Satisfaction with value derived from team experiences
- Q28: Satisfaction with value of engineering program student organization activities
- Q29: Satisfaction with Leadership Opportunities in Engineering program's extracurricular activities

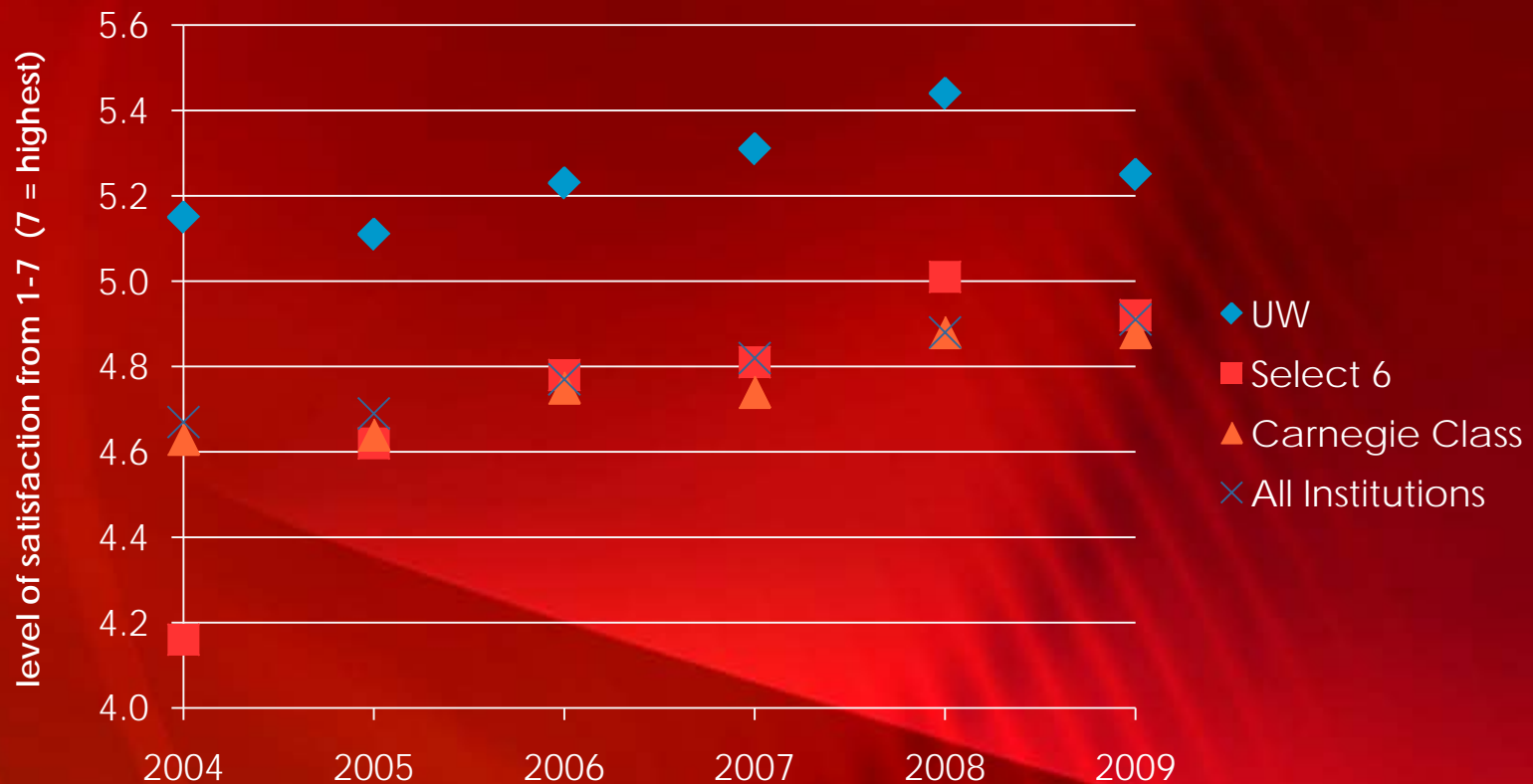
Team & Extracurricular Activity (Factor 4 Qs)



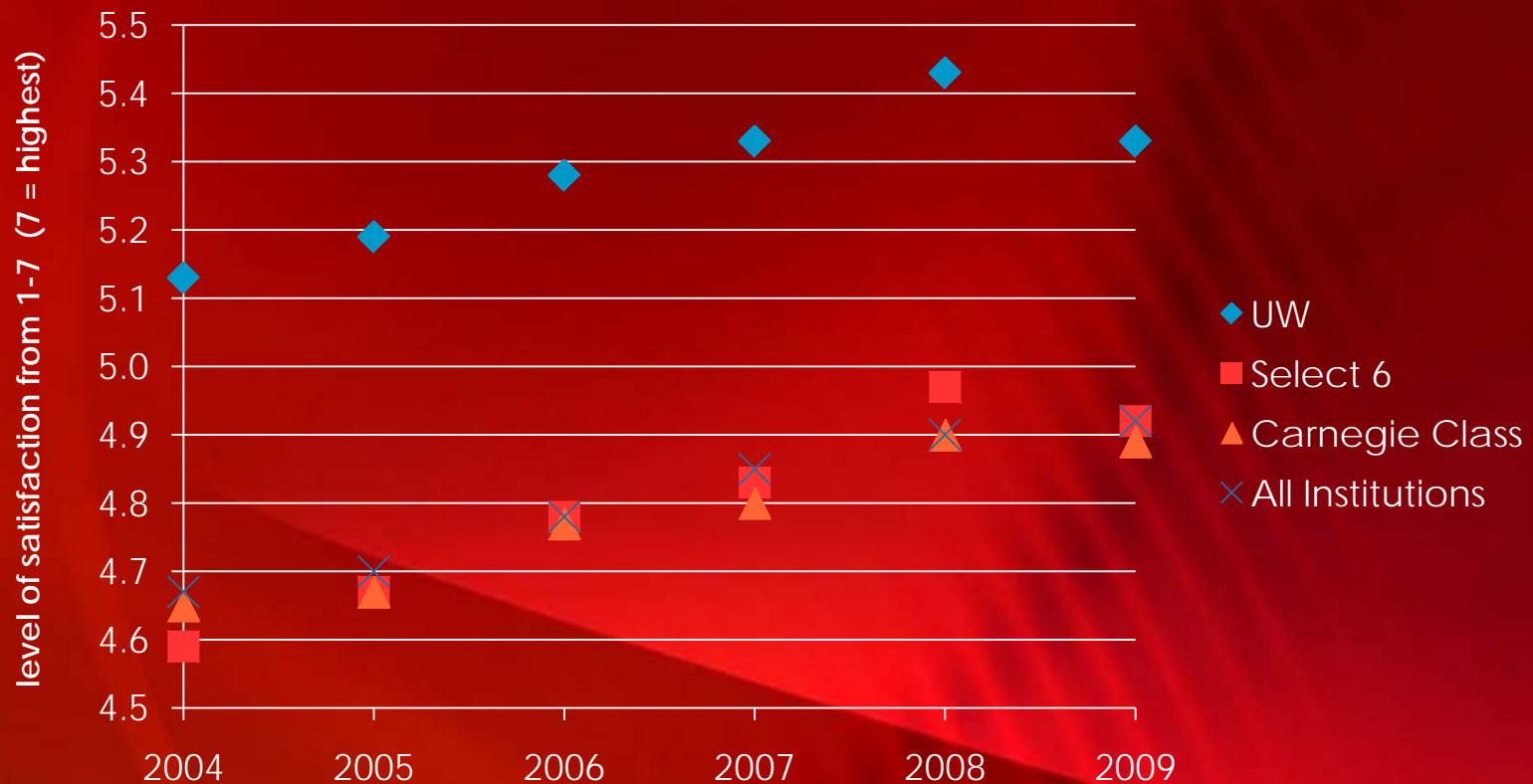
Team Experiences



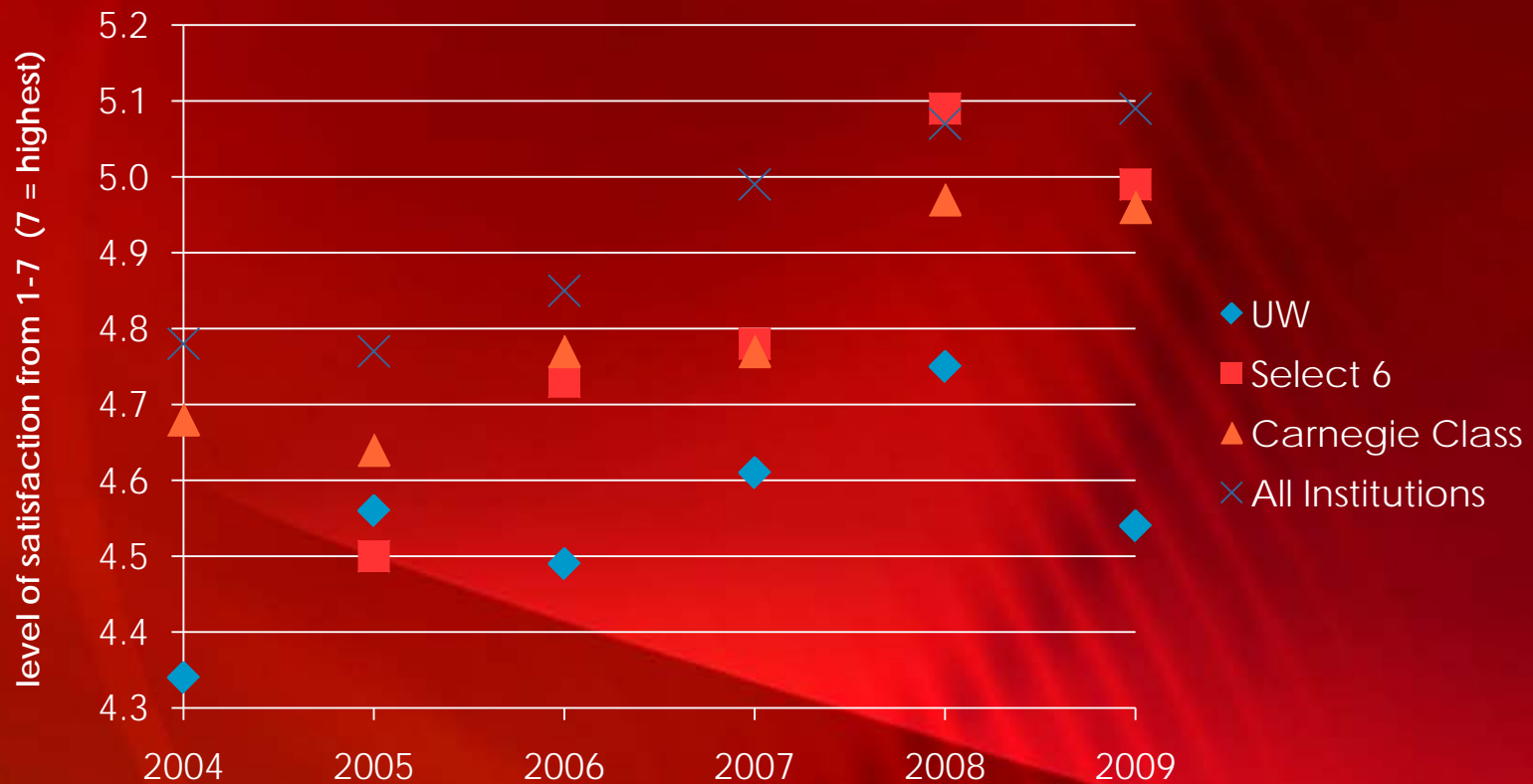
Student Organization Activities



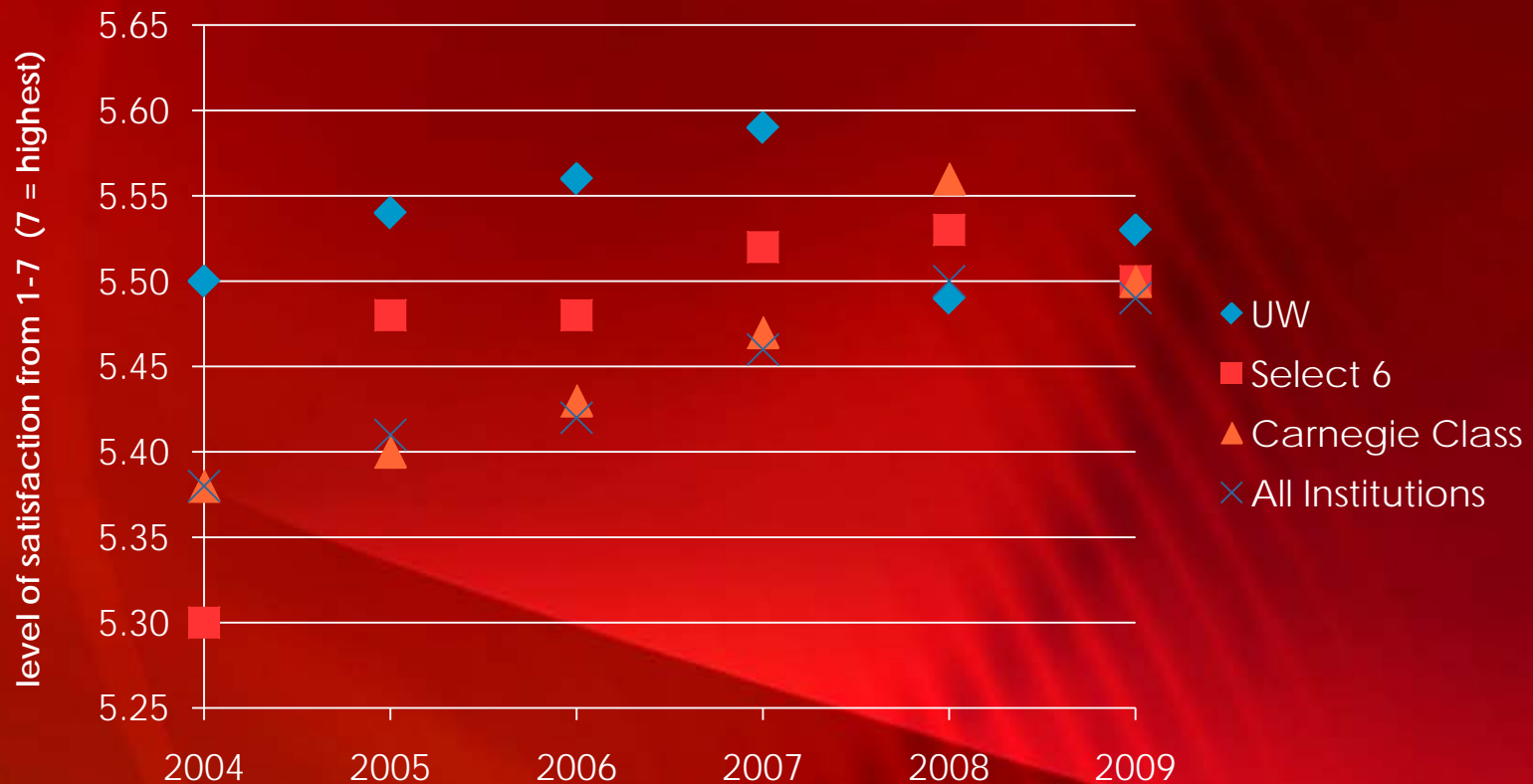
Leadership Opportunities



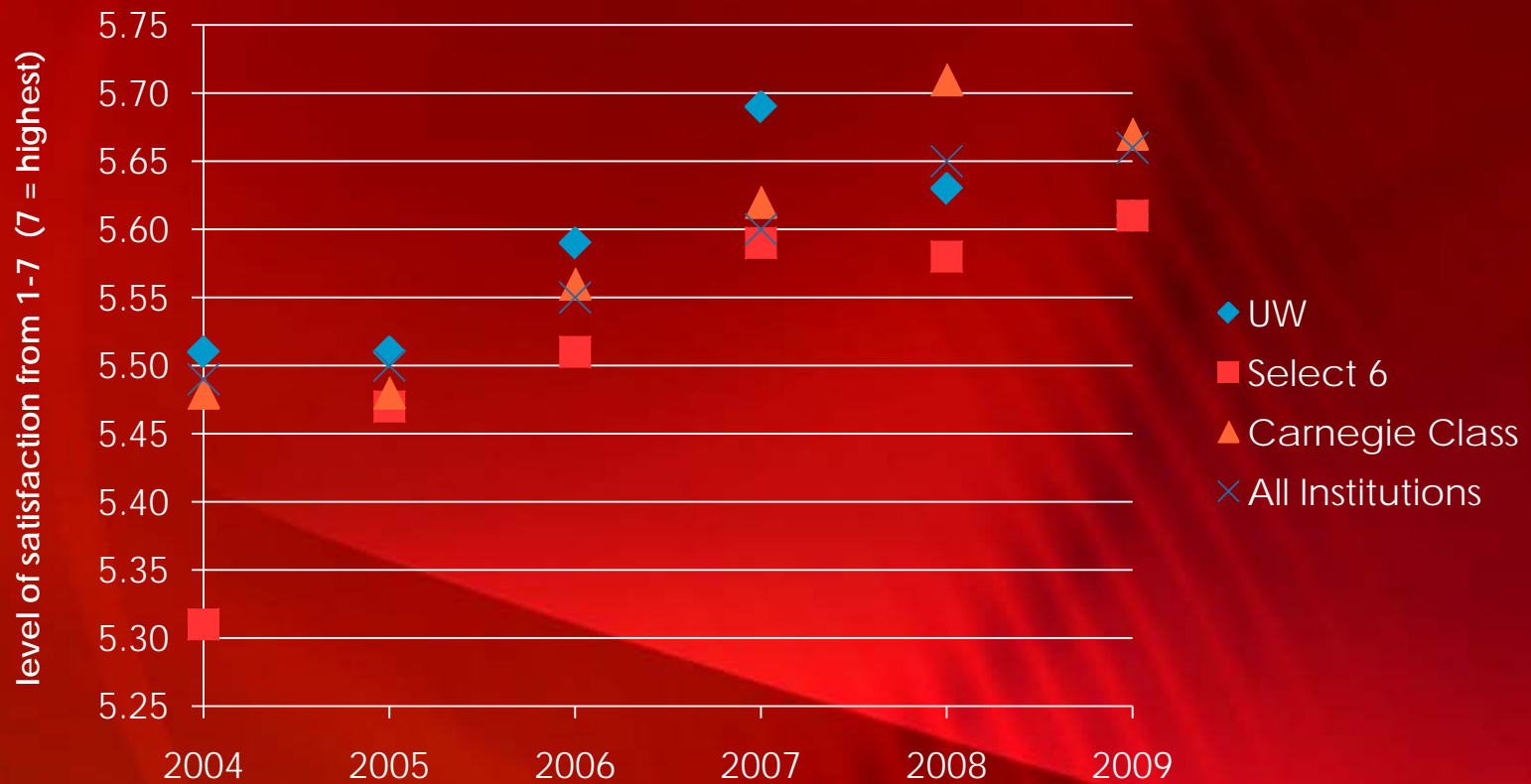
Academic Advising – Faculty



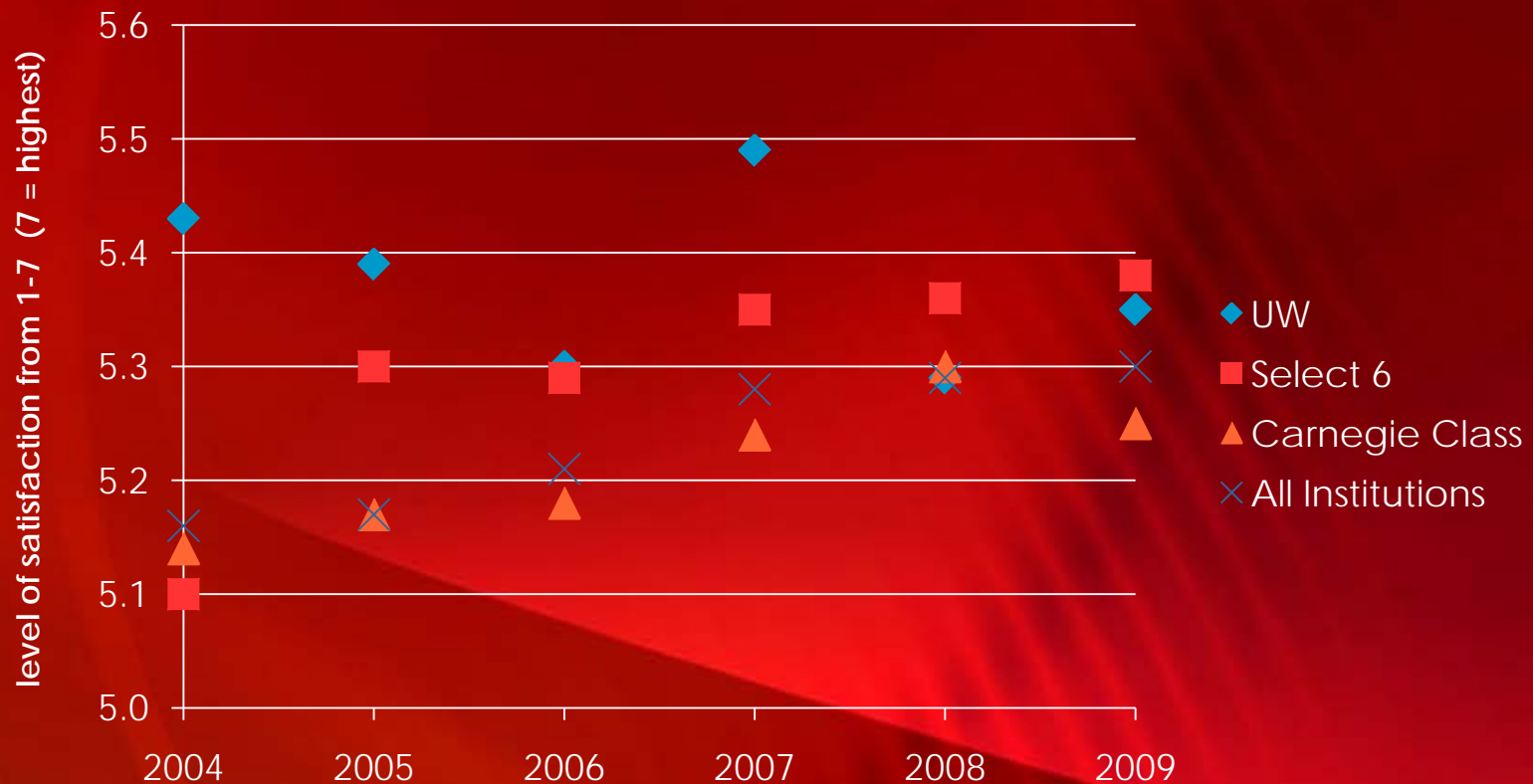
Ability to Work in Teams



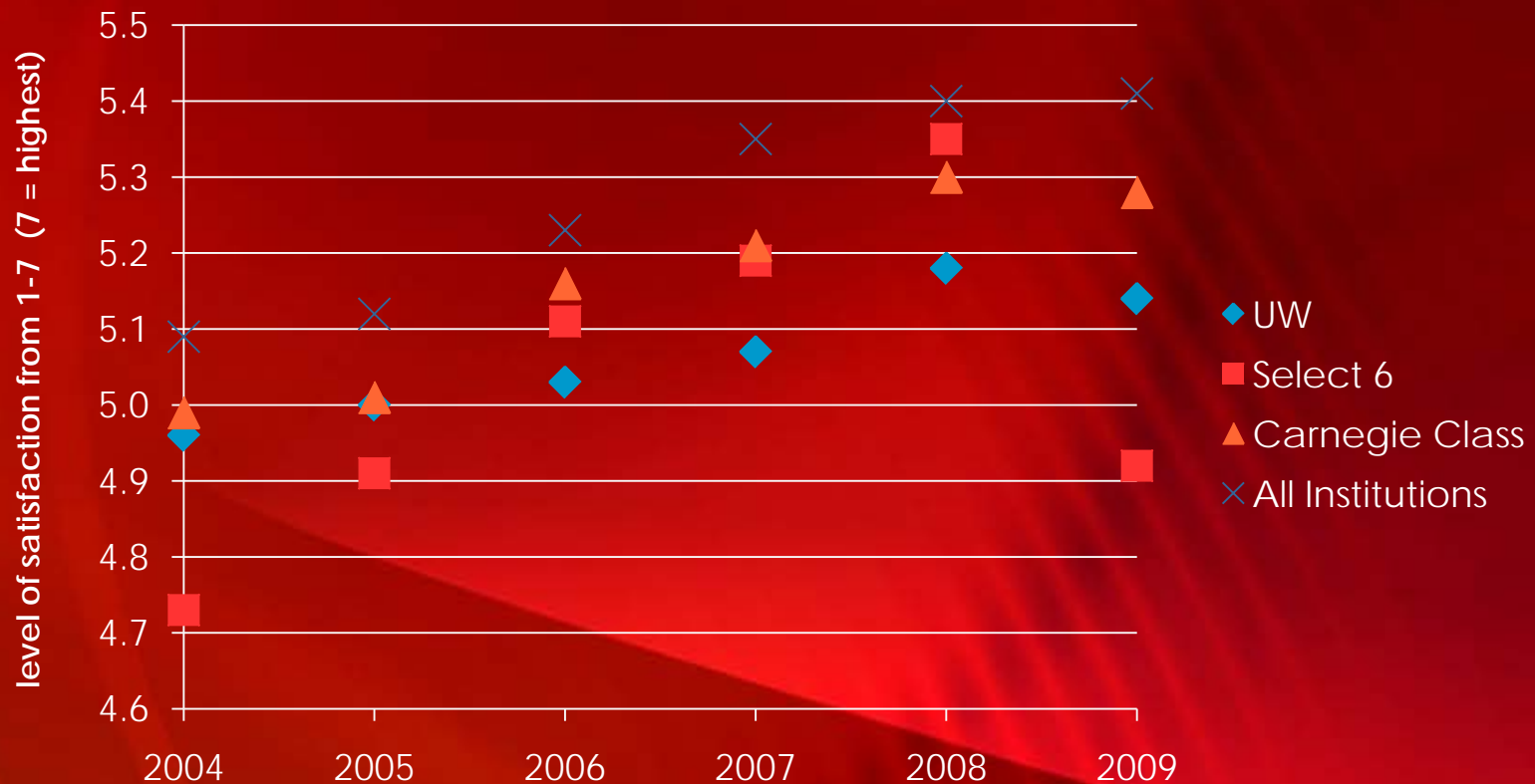
Level of Camaraderie



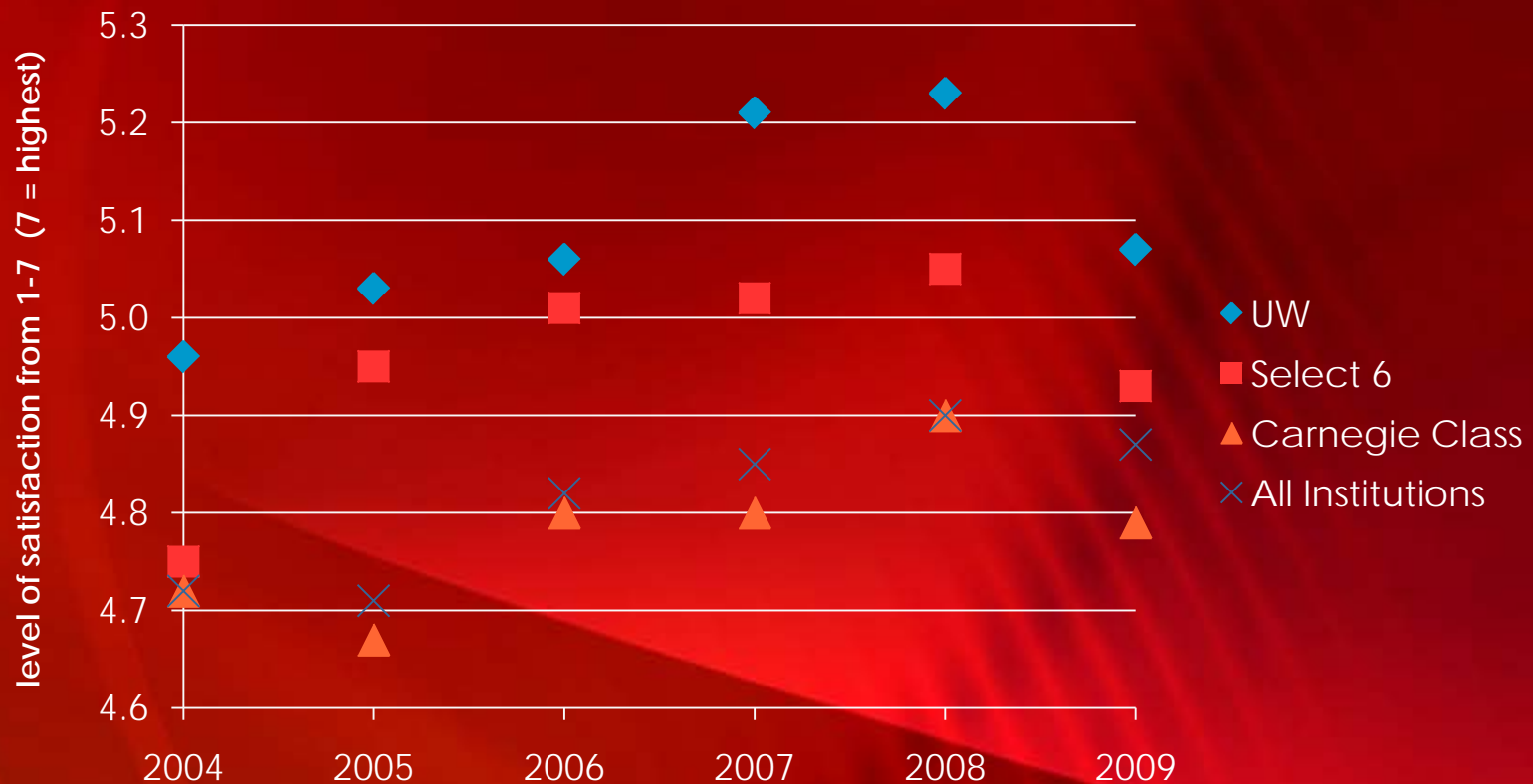
Ability to Function on Multidisciplinary Teams



Understanding of Ethical Responsibility

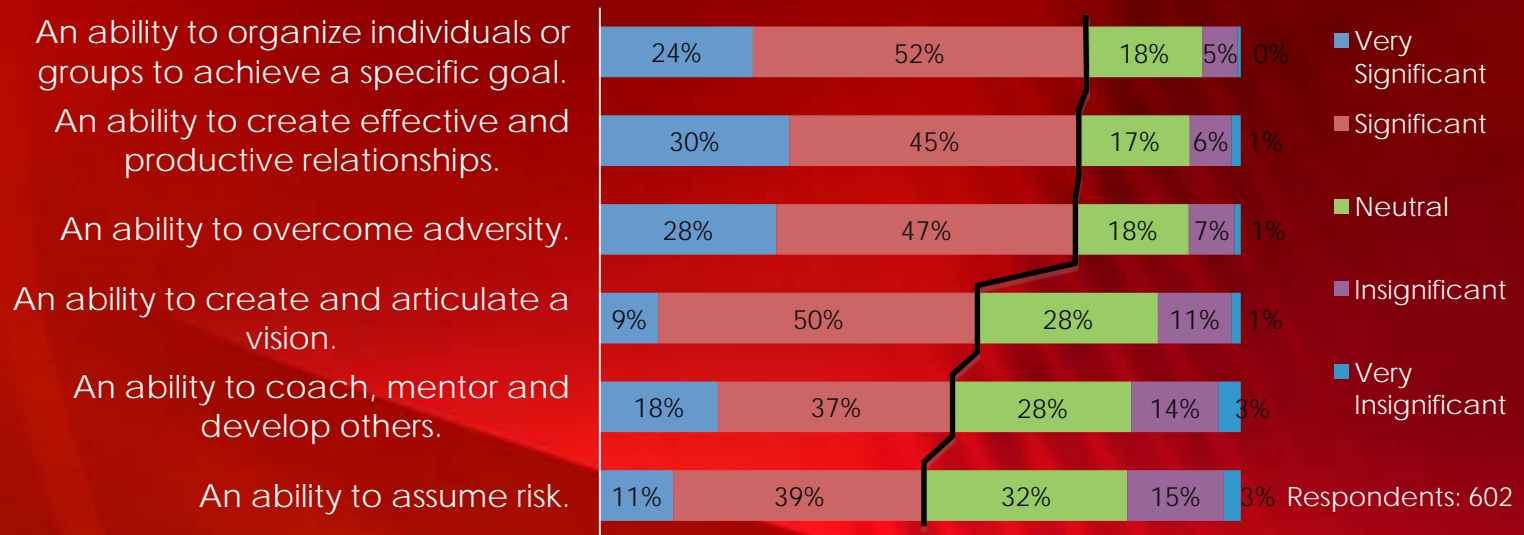


Extent Program Experience Fulfilled Expectations



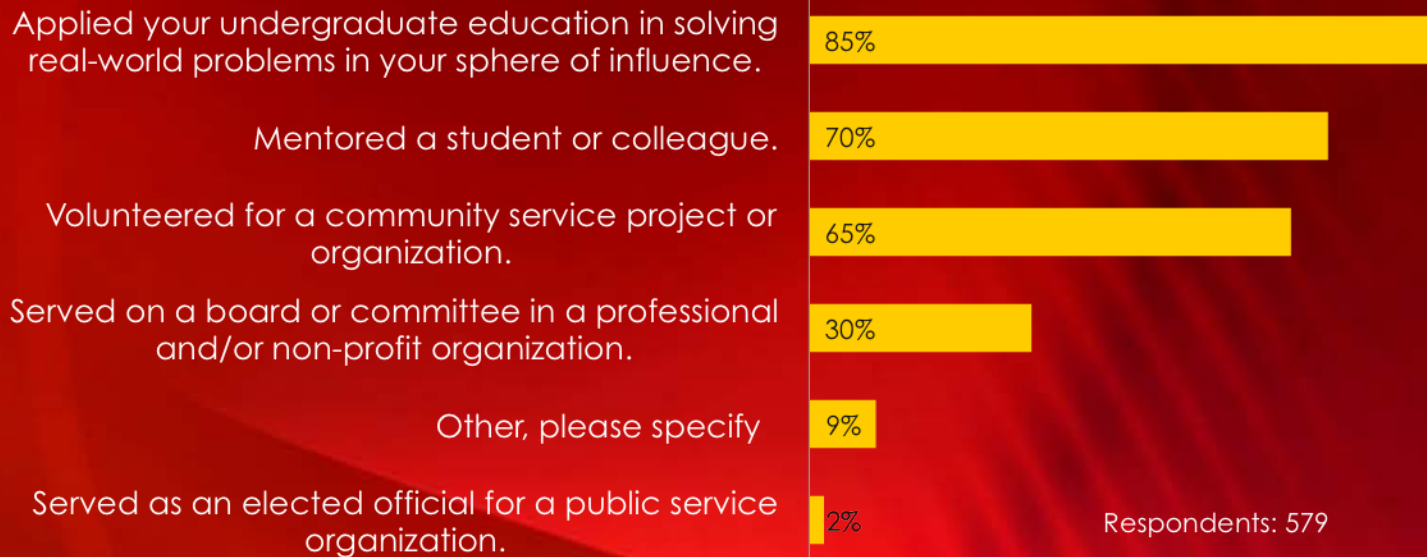
Alumni Survey Results

1. Please indicate to what extent your overall College of Engineering (CoE) educational experience contributed to your skills and knowledge in the following ways:



Alumni Survey Results

7. Which of the following have you done since graduation?

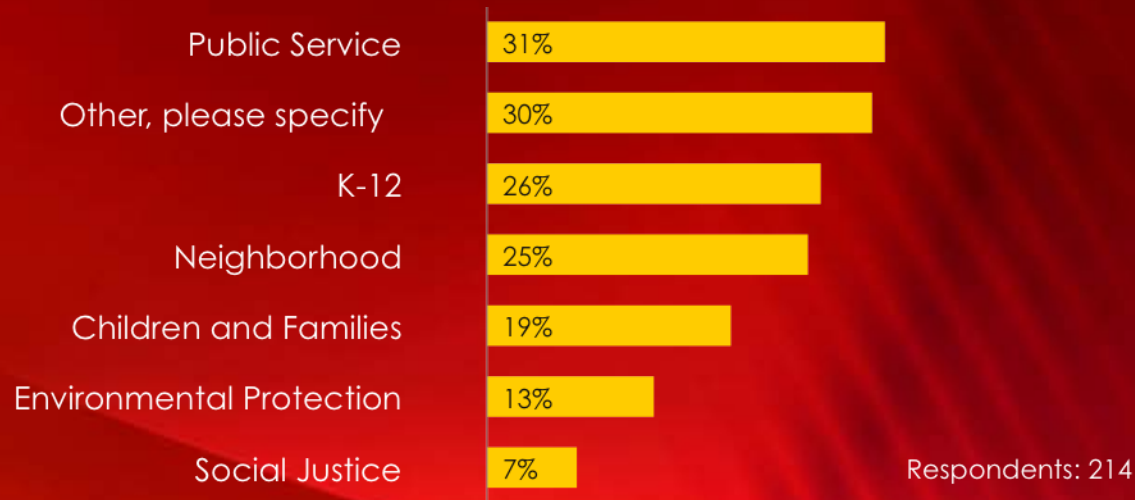


Top Other Responses:

- Grad school
- MBA
- PhD
- Started Business
- Leadership/Management

Alumni Survey Results

12. If you answered yes to question 11, please indicate which type of community-based organization you are involved in (check all that apply).



Top Other Responses:

- Religious
- Athletic
- Education (teaching)
- Aid (Habitat for Humanity, Humane Society, Homeless shelter, Food Pantry)

Alumni Survey Results

15. Why are you involved in these organizations (check all that apply)?



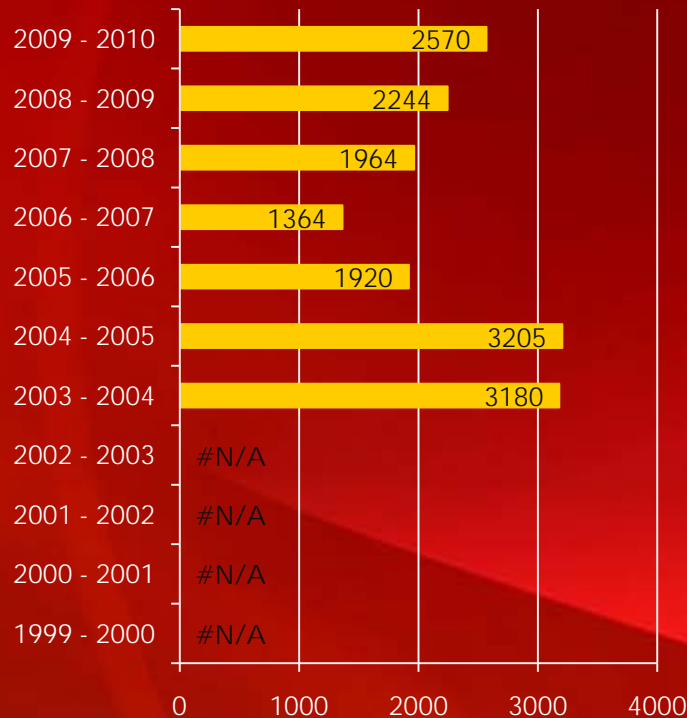
Respondents: 418

Top Other Responses:

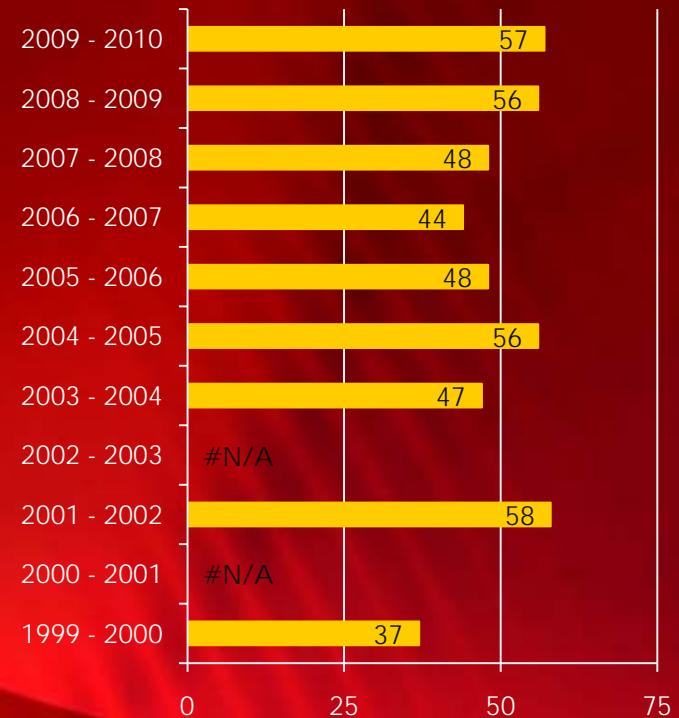
- Educate the youth
- Help the environment

Benchmarking Student Participation

of Students

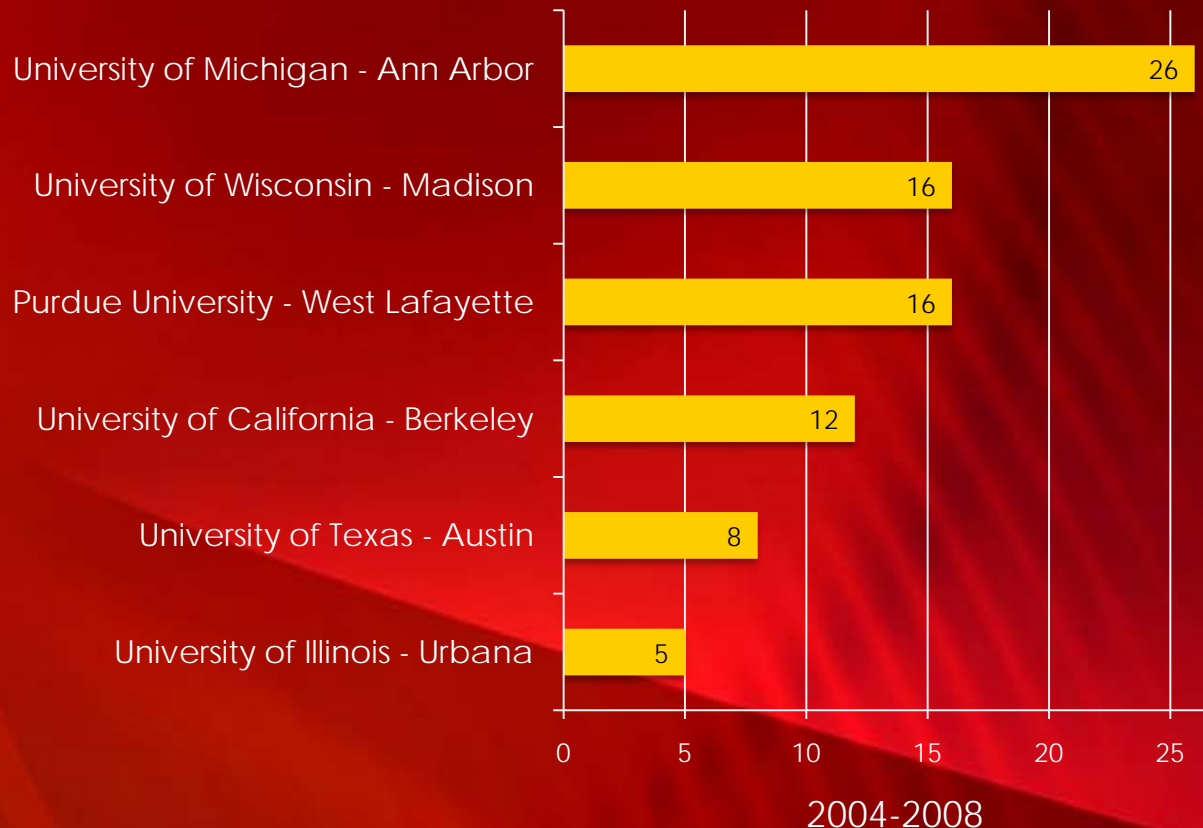


of Organizations

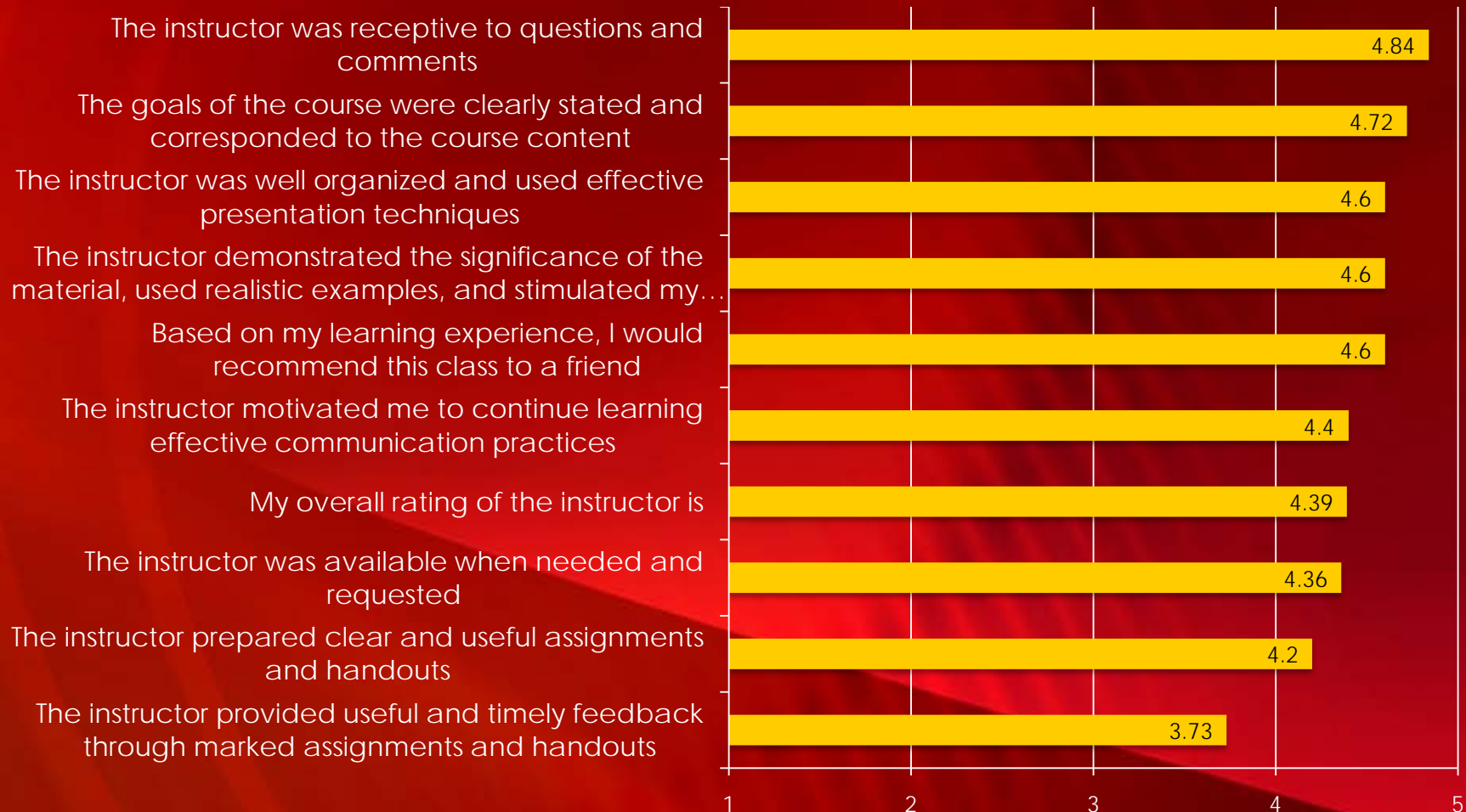


Numbers are estimates based on student reported data at the beginning of each fall semester. Organizations may continue to increase membership throughout the year.

Engineering Alumni Entering Service with the Peace Corps



Fall 2009 Dean's Leadership Class Student Evaluations



2009 CEE Leadership Class Student Evaluations



2009 Student Accomplishments

- Engineers Without Borders
 - Led a book drive for Kano State University library in Nigeria
 - Received Gold Award for Haiti project at the U.N. Mondialogo Engineering Award (MEA) Competition in Germany
 - Awarded Kaufman Grant for Red Cliff, WI project
 - Coordinating TEAMS competition for high school students this spring
- Habitat for Humanity
 - Led four Alternative Winter Break Trips for UW students
 - Received State Farm Grant for fundraising initiative
 - Raised over \$12,000 through annual Rake-a-Thon event



Civil and environmental engineering students Jonathan Blanchard , Kevin Orner and David Tengler receive a plaque from five communities in Ecuador that will benefit from a new water pipeline the students implemented in June.

Habitat for Humanity The Allah family



Born Logic and Rayson Allah

Research

- Leading from the heart work

News

PROJECT MANAGEMENT

Center Promotes Leadership To Make Projects Manageable

Columbia University's first forum on construction-project leadership was built around the theme that project success requires leadership in addition to management. The forum drew more than 100 industry professionals to the New York City campus on Aug. 25.

Prevailing theories of project management are often inadequate because they largely ignore the dynamic environment of projects, particularly construction projects, said Alexander Laufer, director of Project University's Center for Project Leadership.

Wisconsin, Madison, and Norman R. Doll, an adjunct professor at the same school and president emeritus of Pieper Electric Inc., Milwaukee, discussed their leadership research and efforts to teach leadership to students.

The team studied the work of Jim Collins in his book "Good to Great," which identified unexpected attributes of leaders, such as humility and a willingness to put the needs of the organization ahead of their own. Would the same leadership qualities be present in successful, regional construction companies?

Doll pointed out the work is qualitative and values-focused and that results are preliminary. But, he said, the construction leaders had a "significant focus on people with an emphasis on the right people—and that they lead by example."

Russell said Wisconsin's program delivers theories and skills in the classroom but also project-based experiences. "Planning is important but you must learn to be adaptive and flexible," he said. For example, in a project to develop a method to remove excess fluid from drinking water that was causing skeletal deformities in a village in Kenya, students found that bone-char filtration could solve the problem technically but prevented cultural obstacles.

Cameron, global process owner

MANAGEMENT VS. LEADERSHIP

	MANAGEMENT	LEADERSHIP
PRODUCT	Order	Change
APPLIED	Continuously	Infrequently
INFLUENCE	Routine matters	Non-routine matters
FOCUS	Technical problems	Adaptive problems

Leadership, Laufer, a professor of civil engineering at the Technion-Israel Institute of Technology in Haifa, is a visiting professor at Columbia and established the center there last year.

"For years, theories have talked about rethinking project management," Laufer said, while project after project continues to have poor results. One problem he identifies is a "persistent gap between the identities of a 'research methodology' and the research work in close collaboration."

Jeffrey S. Russell
UNIVERSITY OF WISCONSIN
Team studied the "Good to Great" qualities: a combination of humility and a tremendous personal will to get the job done.

Norman R. Doll
UNIVERSITY OF WISCONSIN
Team studied the "Good to Great" qualities: a combination of humility and a tremendous personal will to get the job done.

who bring attributes such as strategic focus, lateral thinking, courage, commitment and accessibility, he added.

Speakers and attendees also debated whether or not leadership can be taught in class. Terry Little, a consultant with Spectrum Group, Alexandria, Va., contended that leaders are "made" by the mentoring they get from their leaders. Laufer compared leadership to a muscle that "improves with practice, training and reflection."

But Russell countered that a blend of formal academic education and real-world, practical experience is needed. "It's extremely important that we articulate that we expect students some day to become leaders," he said.

Scott Cameron
PROCTER & GAMBLE

ARE YOU LEADERSHIP MATERIAL? SCORE YOURSELF FROM ONE TO FIVE

To what extent do I empower others?
Does my behavior reflect my respect for others?
Am I consistent in demanding high quality for myself and for others?
How does my behavior affect the spirit of others?
How do I foster teamwork?
How do I encourage learning?
How do I feel if I were the recipient of my behavior?

By Janice Tuchman, with Debra K. Rubin

Future Directions: Theory, Practice & Data

- Implement and assess on-line leadership and sustainability classes
- Create leadership award and scholarship
- Initiate College of Engineering-wide service projects
- Host a Student Leadership Conference or Retreat
- Host a College of Engineering Leadership Workshop for students, faculty, and staff
- Promote student participation in Leadership Conferences
- Facilitate Travel-Abroad Service Projects
- Explore starting and sustaining a mentoring program

Questions??



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