

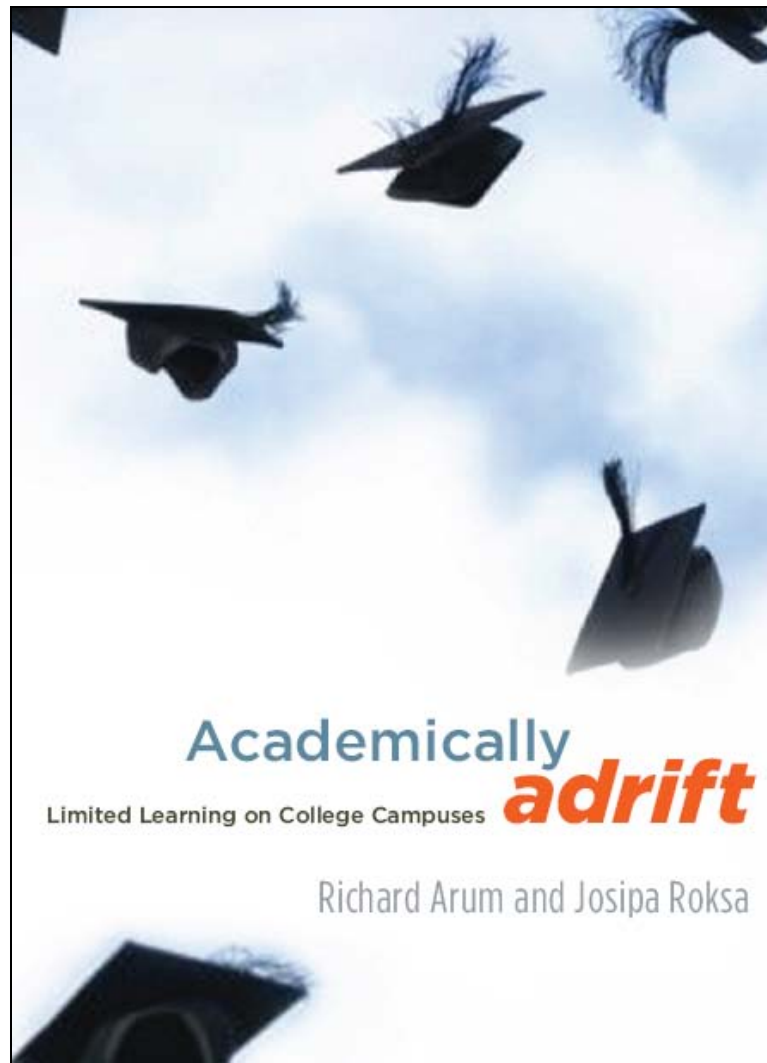
# **Responding to *Academically Adrift*: What Colleges Can Do**

## **Richard Arum and Josipa Roksa**

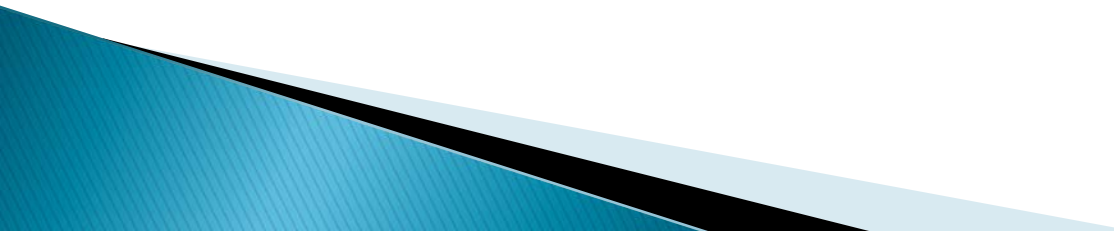
**February 18, 2011**  
Inside Higher Ed Audio Conference

\*We thank the Carnegie Corporation of New York and the Lumina, Ford and Teagle Foundations for their generous financial support and the Council for Aid to Education for collaboration and assistance with data collection.

Source (University of Chicago Press, January 2011):



# Research Questions

- ▶ Are students improving their critical thinking, complex reasoning, and writing skills during college?
  - ▶ What specific experiences and college contexts are associated with student learning?
  - ▶ How do disadvantaged groups of students fare in college with respect to learning?
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# Determinants of College Learning Dataset

- ▶ Longitudinal Design
  - Fall 2005, Spring 2007, Spring 2009, *Spring 2010, Spring 2011 (planned)*
- ▶ Large Scale
  - 2005–2007: 24 diverse four-year institutions; 2,341 students
  - 2005–2009: 29 diverse four-year institutions, 1,666 students
- ▶ Breadth of Information
  - Family background and high school information, college experiences and contexts, college transcripts
  - Collegiate Learning Assessment (CLA)

# Collegiate Learning Assessment (CLA)

- ▶ **Dimensions of learning assessed**
  - critical thinking, complex reasoning, and written communication
- ▶ **Distinguishing characteristics**
  - Direct measures (as opposed to student reports)
  - NOT multiple choice
  - Holistic assessment based on open-ended prompts representing “real-world” scenarios
- ▶ **Used in other contexts**
  - One of the measures of learning used by VSA
  - Will be utilized in 2016 by OECD-AHELO project

# Performance Task (example)

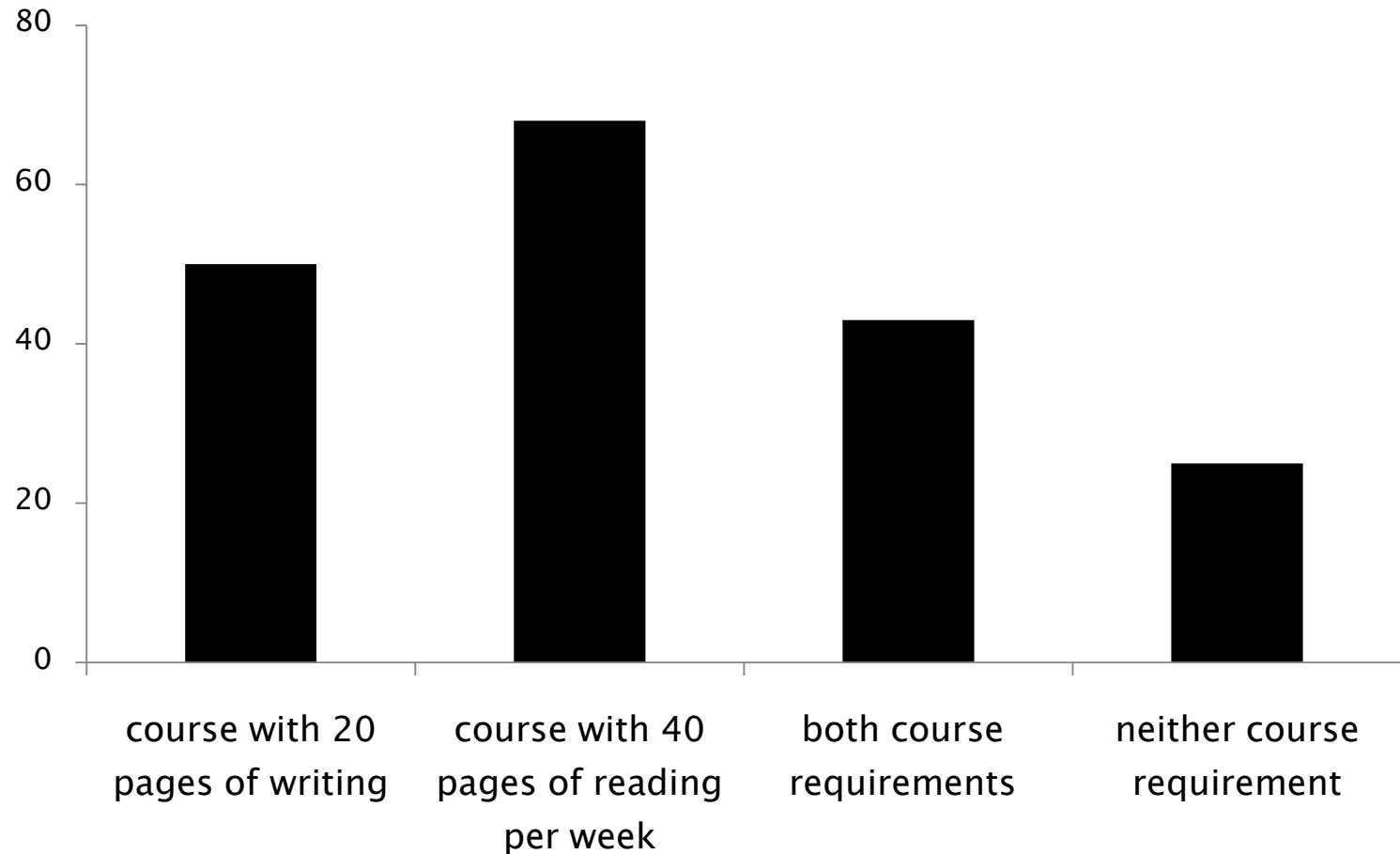
You are the assistant to Pat Williams, the president of DynaTech, a company that makes precision electronic instruments and navigational equipment. Sally Evans, a member of DynaTech's sales force, recommended that DynaTech buy a small private plane (a SwiftAir 235) that she and other members of the sales force could use to visit customers. Pat was about to approve the purchase when there was an accident involving a SwiftAir 235.

## Performance Task (example, cont.)

Students are provided with a set of materials (e.g. newspaper articles, Federal Accident Report, e-mail exchanges, description and performance characteristics of AirSwift 235 and another model, etc.) and asked to prepare a memo that addresses several questions, including what data support or refute the claim that the type of wing on the SwiftAir 235 leads to more in-flight breakups, what other factors may have contributed to the accident and should be taken into account, and their overall recommendation about whether or not DynaTech should purchase the plane.

<http://www.collegiatelearningassessment.org/>

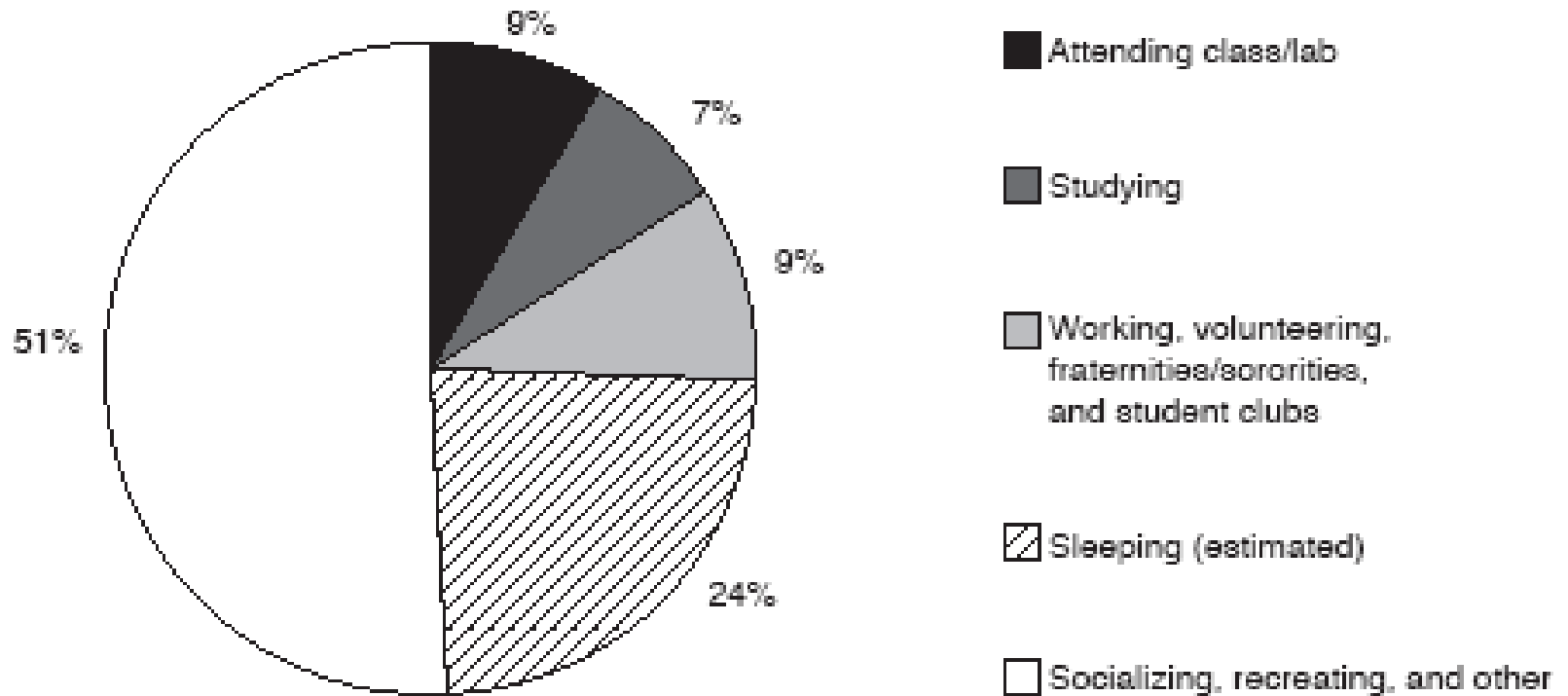
# Course Requirements



Note: Based on Spring 2007 survey.



# Students' Time Use

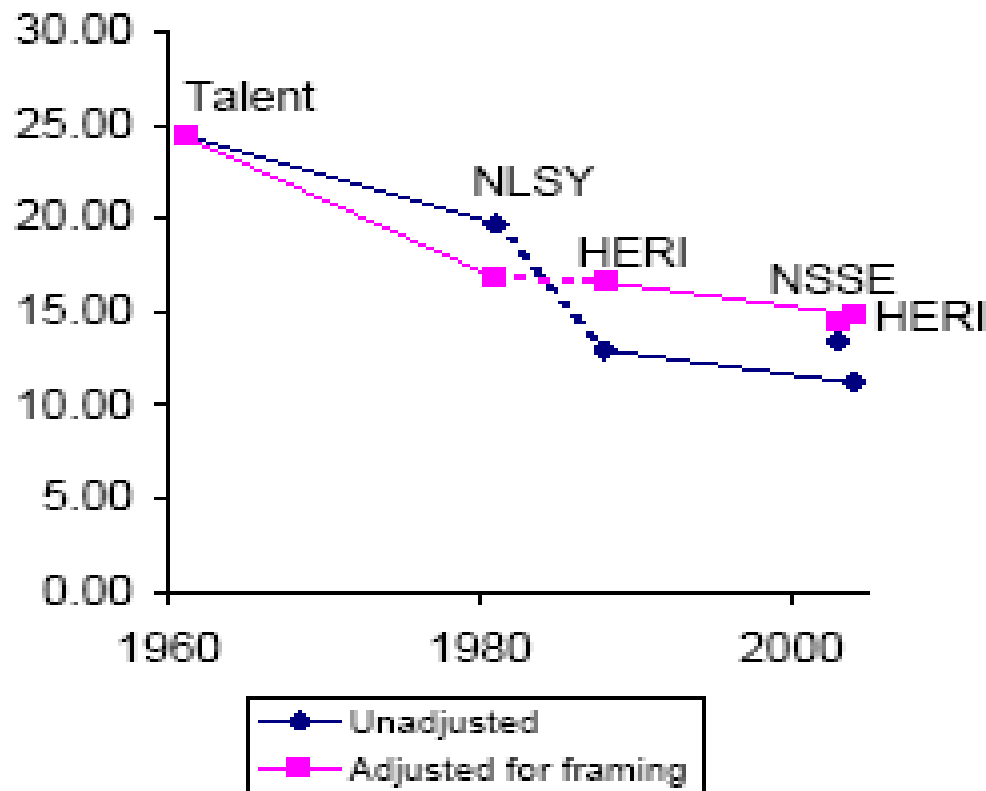


Note: Based on Spring 2007 survey.

# Academic Commitment Over Time

(source: Phillip Babcock and Mindy Marks, *forthcoming* 2010 )

Average Study Hours

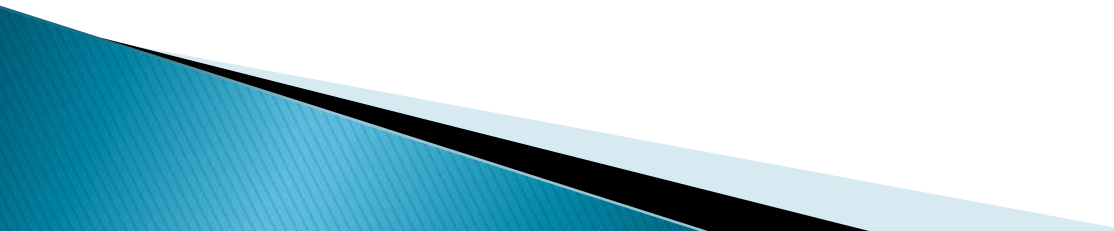


Academic time from 1925-1965 in time diaries relatively constant (39.2 to 34.1)

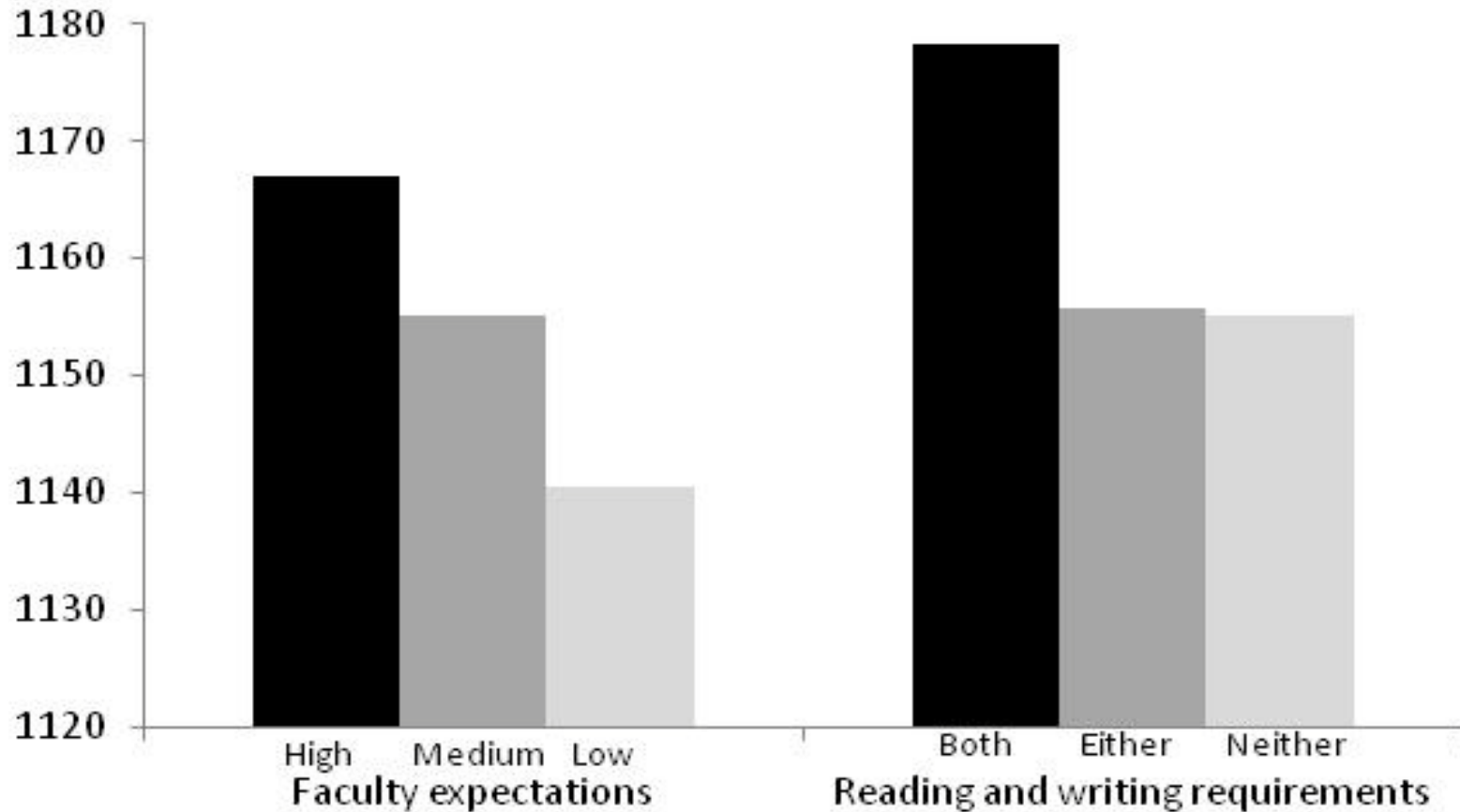
## CLA Gains 2005–2007 (performance task)

- ▶ 0.18 standard deviations – 7 percentile point gain (0.47 sd, 18 percentile points, 2005–2009)
- ▶ No statistically significant gains in critical thinking, complex reasoning and writing skills for 45 percent of the students in the sample (36 percent, 2005–2009)

## CLA Gains 2005–2009 (performance task)

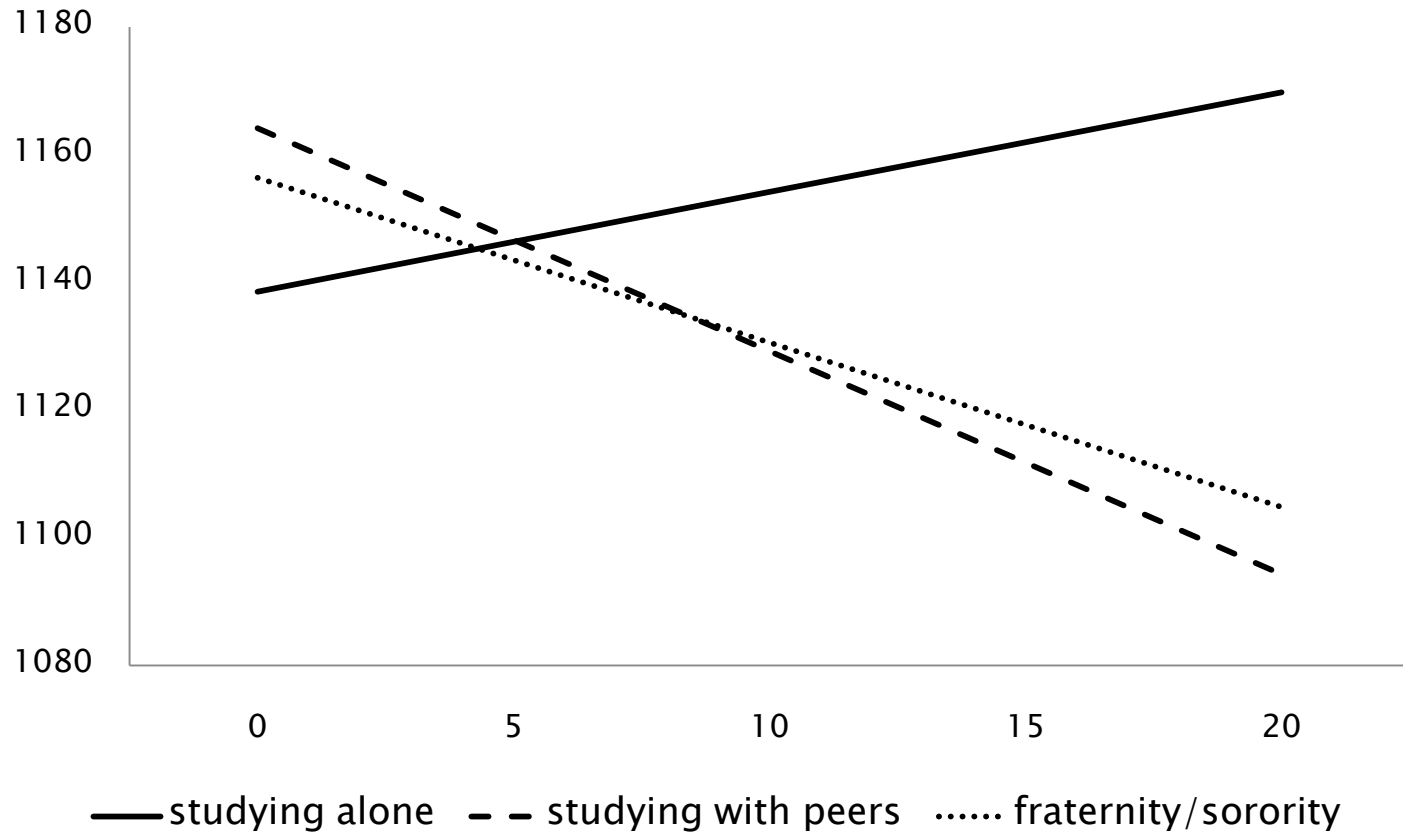
- ▶ 0.47 standard deviations – 18 percentile point gain
  - ▶ No statistically significant gains for 36 percent of the students over four years
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# CLA Performance: Faculty Expectations and Reading/Writing Requirements



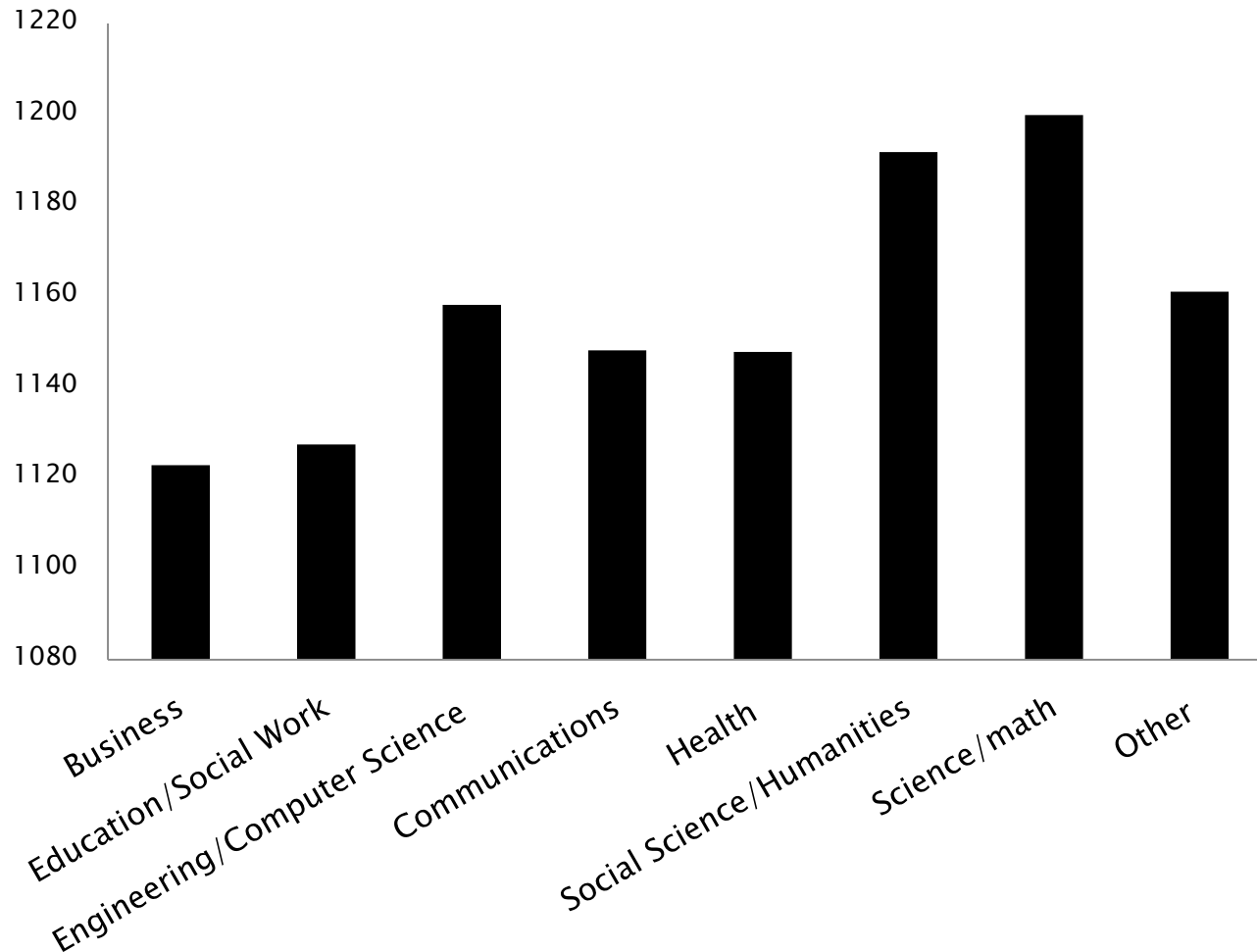
Note: Predicting 2007 CLA scores while controlling for 2005 CLA scores, student characteristics, and institutions attended.

# CLA Performance: Studying and Fraternities/Sororities



Note: Predicting 2007 CLA scores while controlling for 2005 CLA scores, student characteristics, and institutions attended.

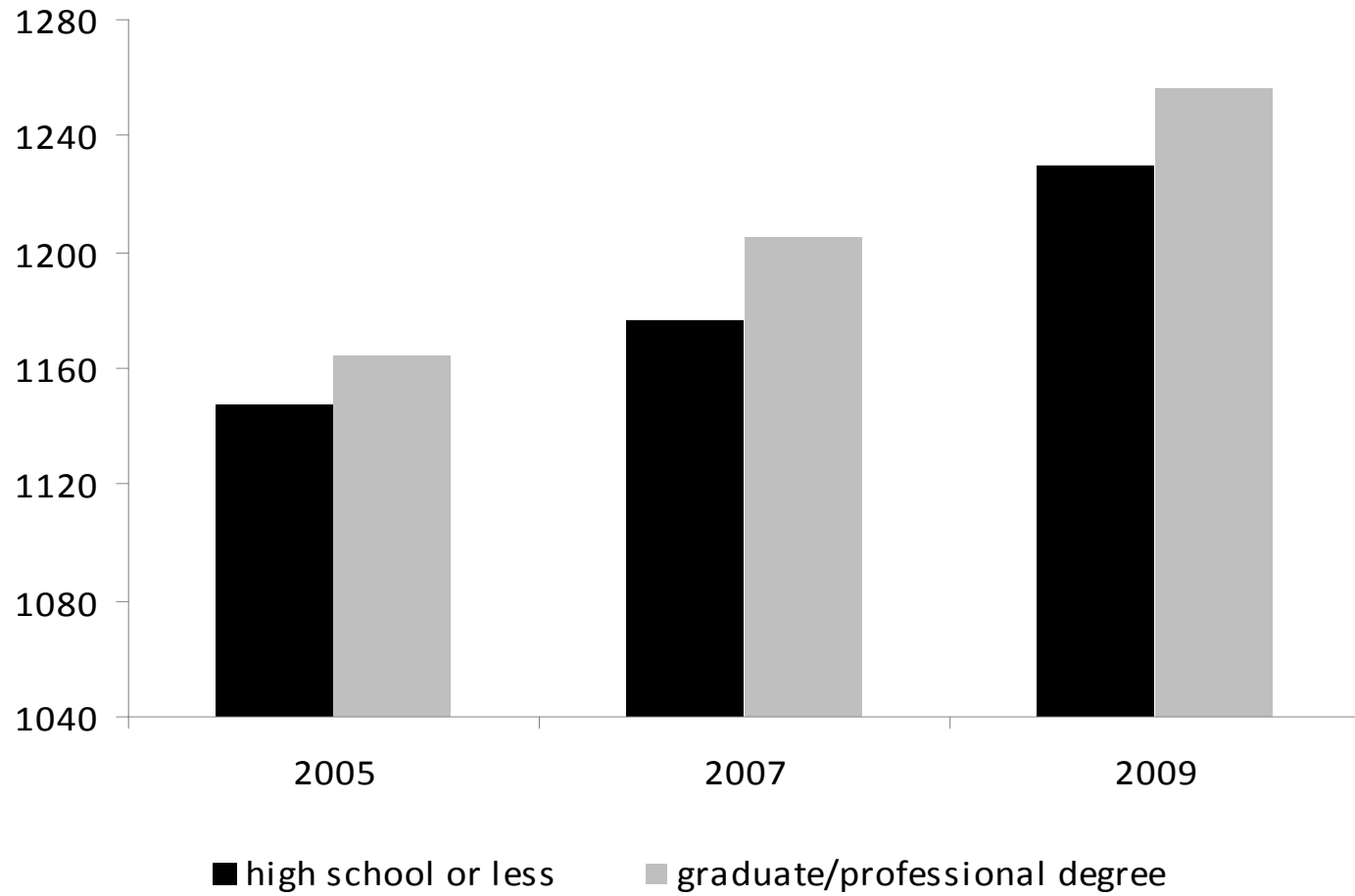
# CLA Performance: College Major



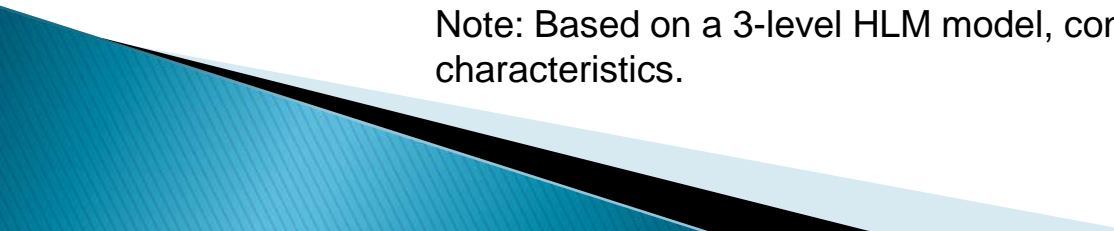
Note: Predicting 2007 CLA scores while controlling for 2005 CLA scores.



# Inequality in CLA Performance: Parental Education



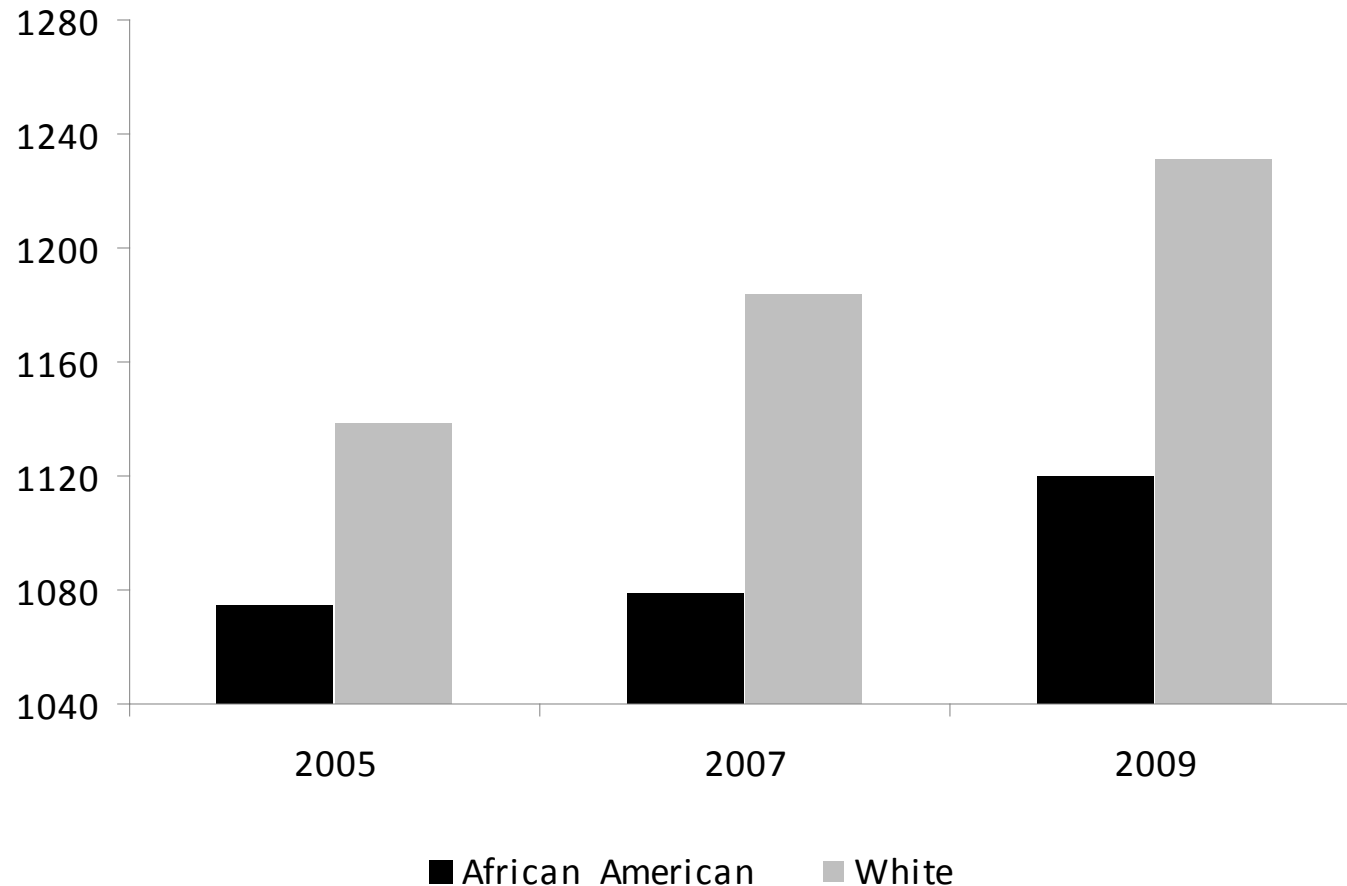
Note: Based on a 3-level HLM model, controlling for a range of demographic/family characteristics.







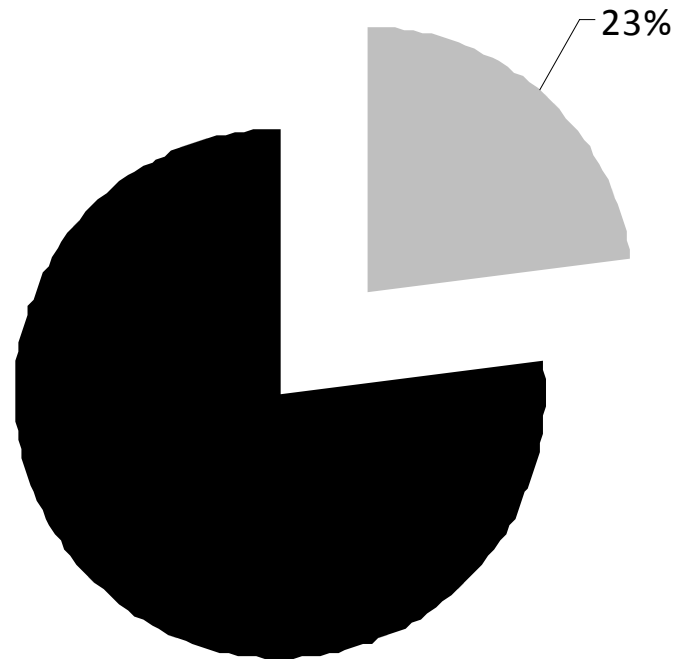
# Inequality in CLA Performance: African American vs. White



Note: Based on a 3-level HLM model, controlling for a range of demographic/family characteristics.

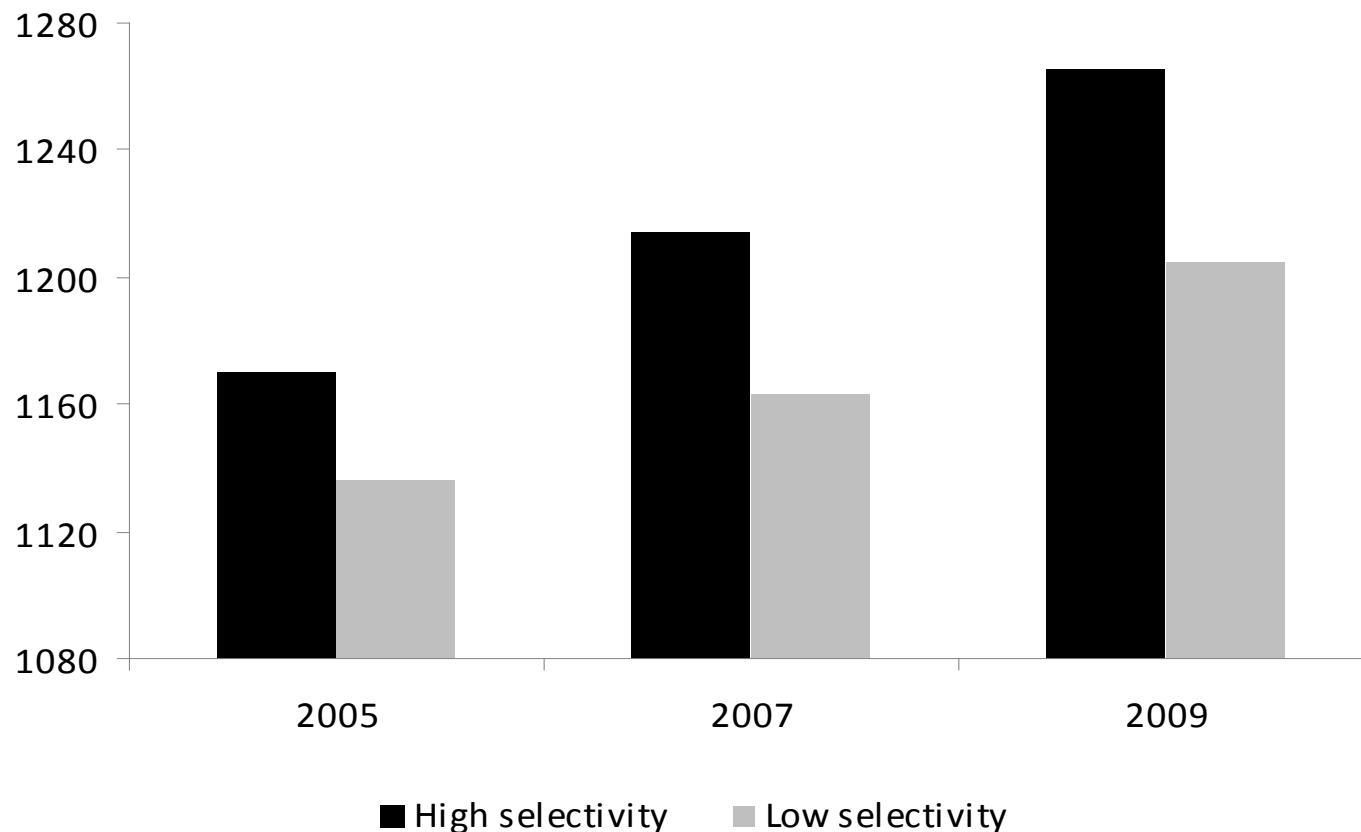
# Institutional Variation

23 percent of CLA growth between 2005 and 2009 occurs across institutions



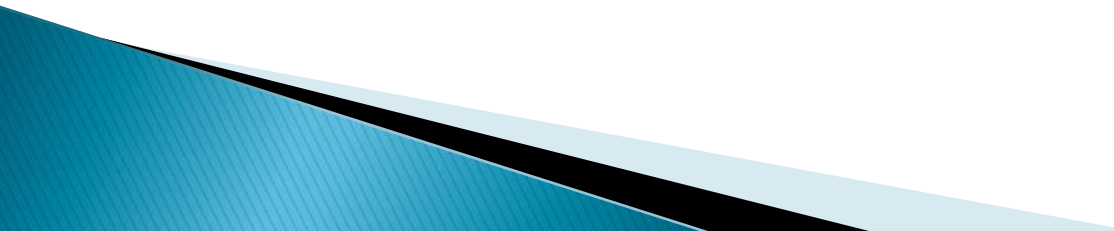


# College Selectivity and CLA Performance

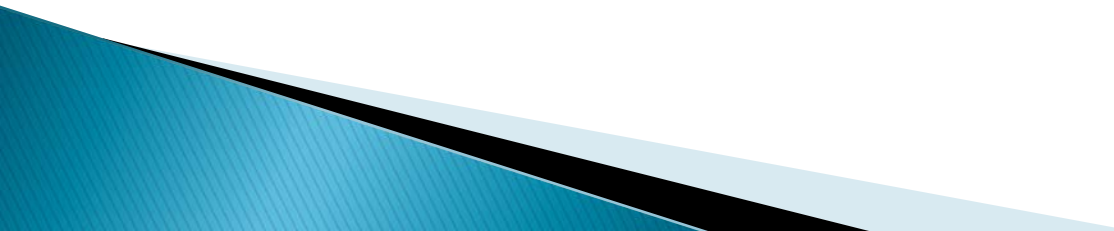


Note: Based on a 3-level HLM model, controlling for a range of demographic/family characteristics.

# Summary of Findings

- ▶ Students experiencing low (and likely declining) levels of academic rigor.
  - ▶ Gains in student performance are disturbingly low in U.S. higher education.
  - ▶ Learning in U.S. higher education is characterized by persisting and/or growing inequality with respect to individual characteristics.
  - ▶ There is notable inequality in experiences and outcomes across U.S. institutions associated with college selectivity.
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# Policy Recommendations

- ▶ Federal imposed accountability would be counterproductive (existing measurements are imperfect; unintended consequences likely)
  - ▶ Federal resources could provide incentives for institutional improvement, innovation and assessment
  - ▶ Federal resources needed to develop research infrastructure to advance scientific knowledge of learning in higher education
  - ▶ Accountability should operate at lower levels in the system
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# Recommendations for Institutional Improvement – Administrative Leadership

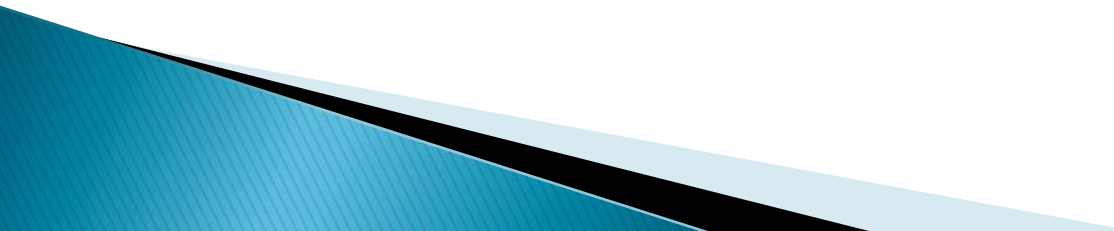
- ▶ Promote organizational cultures emphasizing student learning – both symbolically and substantively:
  - Evaluate internal incentive structures
  - Support ongoing assessment of program quality and student learning outcomes
  - Develop plans for improvement
  - Monitor implementation of improvement plans
  - Align resource allocation decisions with academic goals
- ▶ Work collaboratively – improvement of academic rigor and undergraduate learning are issues that faculty, students and administrators should be able to work on together.

# Recommendations for Institutional Improvement – Faculty Leadership

- ▶ Faculty must assume individual and collective responsibility for ensuring adequate academic rigor across programs and classes – with reviews at course, department and school level:
  - course requirements (e.g., levels of reading and writing)
  - course expectations (i.e., study hours)
  - grading standards
  - core curriculum
- ▶ Faculty should have high expectations for their students and communicate expectations clearly and consistently


# Recommendations for Institutional Improvement – Review Faculty Evaluation Criteria

*Internal deliberations warranted to review criteria used for decisions related to tenure, promotion and compensation:*

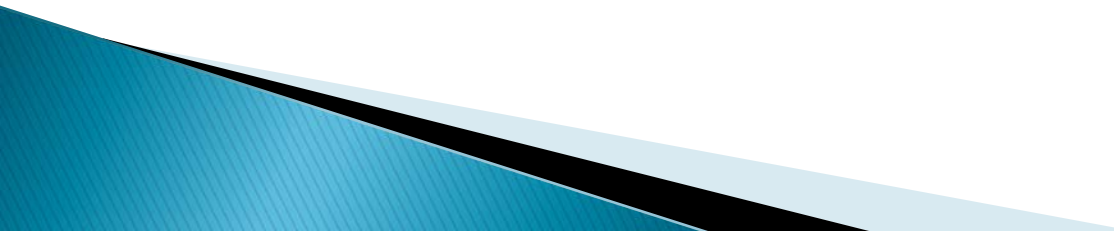
- Do we have the right balance in our weighting of faculty teaching, research and service?
  - Are we using multiple indicators to assess teaching quality (e.g., syllabi review, peer observation, samples of student work)?
  - Are the measures of instructional quality used properly aligned with the goal of promoting academic rigor and student learning outcomes (i.e., not simply measures of student satisfaction)?
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# Recommendations for Institutional Improvement – Administrative Support Services

- ▶ Institutional research required for ongoing assessment of student academic experiences and learning outcomes. [Since students move across programs, institutional-level mechanisms required to monitor overall student academic experiences/outcomes].
  - ▶ Institutional teaching and learning support services for faculty improvement efforts. [Since faculty often are not trained to teach].
  - ▶ Align student support services with goal of promoting student academic performance, not just social engagement or student retention, wellbeing and consumer satisfaction.
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# Recommendations for Institutional Improvement – Students

- ▶ Communicate clearly and consistently to students the value of academic engagement and the goal of promoting attitudes, dispositions and *higher order skills* (i.e., not just subject specific knowledge) essential for economic success, civic engagement and adult status.
  - ▶ Communicate clearly and consistently high expectations and that students ultimately have to take responsibility for their own learning.
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<http://higherred.ssrc.org/>

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