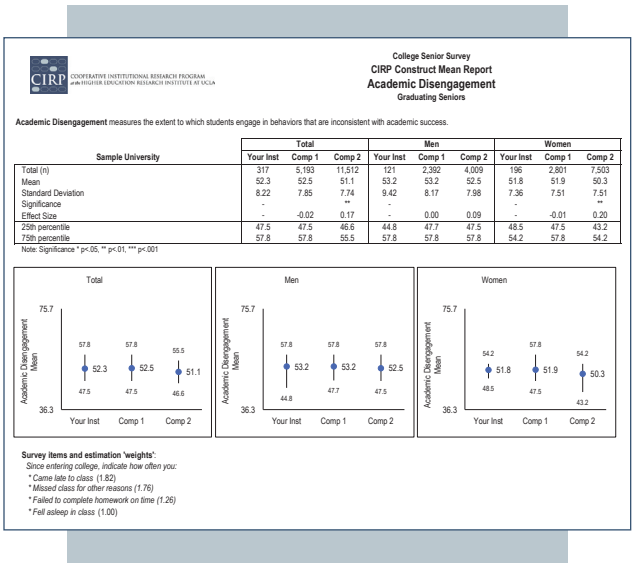
Rigorous Methodology Facilitates Ease of Use

CIRP Constructs are designed to capture the rich student experiences and outcomes that institutions are often most interested in understanding. Because of the complex and multifaceted nature of the student experience, however, gathering accurate information can present a challenge. To measure these areas more precisely, we use Item Response Theory (IRT), which combines individual survey items into a single measure representative of the underlying concept. CIRP Constructs are more than a summation of related items. In essence, IRT uses response patterns to derive construct score estimates, using data to provide greater weight to survey items that tap into the construct more directly. Constructs are particularly useful for benchmarking. They allow you to determine if the experiences and outcomes for your students change over time and/or differ from your comparison groups. Included in the CIRP Construct Reports are the weighted scores, means and statistical tests that facilitate group comparisons.

The CIRP Constructs are based on decades of research on college students, and employ state-of-the-art rigorous statistical methods.



College Senior Survey
CIRP Construct Mean Report
Academic Disengagement
Graduating Seniors

Academic Disengagement measures the extent to which students engage in behaviors that are inconsistent with academic success.

Sample University	Total			Men			Women		
	Your Inst	Comp 1	Comp 2	Your Inst	Comp 1	Comp 2	Your Inst	Comp 1	Comp 2
Total (n)	317	5,193	11,512	121	2,392	4,009	196	2,801	7,503
Mean	52.3	52.5	51.1	53.2	53.2	52.5	51.8	51.9	50.3
Standard Deviation	8.22	7.85	7.74	9.42	8.17	7.98	7.36	7.51	7.51
Significance	-		**	-			-		**
Effect Size	-	-0.02	0.17	-	0.00	0.09	-	-0.01	0.20
25th percentile	47.5	47.5	46.6	44.8	47.7	47.5	48.5	47.5	43.2
75th percentile	57.8	57.8	55.5	57.8	57.8	57.8	54.2	57.8	54.2

Note: Significance * p<.05, ** p<.01, *** p<.001

Survey items and estimation 'weights':
Since entering college, indicate how often you:
* *Came late to class* (1.82)
* *Missed class for other reasons* (1.76)
* *Failed to complete homework on time* (1.26)
* *Fell asleep in class* (1.00)

"The new CIRP Constructs make it much easier to have a high-level conversation about how your institution compares with others."

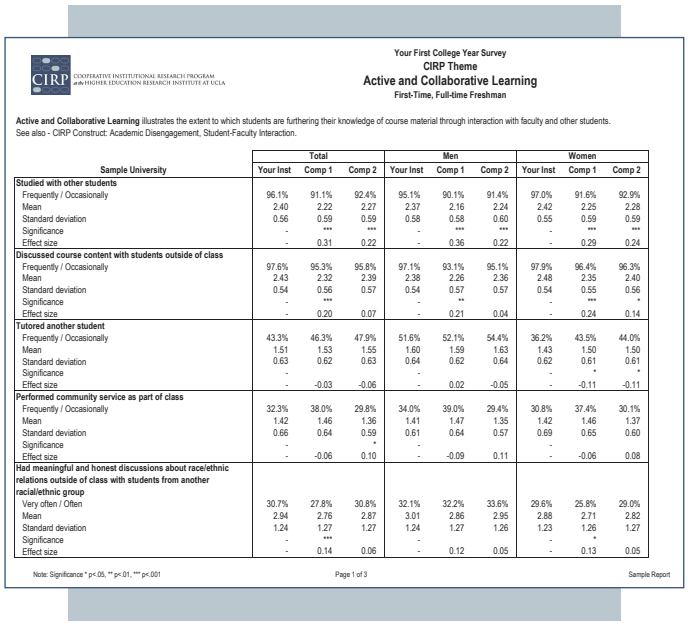
—Jim Fergerson, Director of Institutional Research and Assessment, Carleton College

CIRP Constructs	TFS	YFCY	DLE*	CSS
Habits of Mind	•	•	•	•
Academic Disengagement		•		•
Academic Adjustment		•		
Faculty Interaction: Contact and Communication		•		
Faculty Interaction: Mentorship				•
Satisfaction with Coursework		•		•
Overall Satisfaction		•		•
Sense of Belonging		•	•	•
Academic Self-Concept	•	•	•	•
Social Self-Concept	•	•		•
Pluralistic Orientation	•	•	•	•
Positive Cross-Racial Interaction		•	•	•
Negative Cross-Racial Interaction		•	•	•
Social Agency	•	•	•	•
Civic Awareness		•		•
Leadership		•		•
Civic Engagement	•	•	•	•
College Reputation Orientation	•			
Likelihood of College Involvement	•			
General Interpersonal Validation		•	•	
Academic Validation in the Classroom		•	•	
Institutional Commitment to Diversity			•	
Critical Consciousness and Action			•	
Harassment			•	
Discrimination and Bias			•	
Conversations Across Difference			•	
Curriculum of Inclusion			•	
Co-Curricular Diversity Activities			•	
Integration of Learning			•	

TFS: The Freshman Survey; **YFCY**: Your First College Year;
DLE: Diverse Learning Environments; **CSS**: College Senior Survey
*The DLE has factors; DLE Constructs are in development.

How Can I Use the Constructs?

In IRT, a construct and its meaning are independent of the items in a given survey. This means that CIRP Constructs offer more flexibility of interpretation. A high level of interaction between students and faculty at your institution would be reflected in a high CIRP Construct score for that area. Your CIRP Construct Report compares your institution's scores with those of your institutional comparison groups, allowing you to determine if the traits and experiences of your students differ in a statistically significant way from the average student at other institutions. CIRP Constructs can also be used to compare different groups of students at your institution. For instance, you might expect that students with high scores in student-faculty interaction would show greater gains in educational goals. In addition, since the CIRP Constructs are included in your final data set, you can use the scores in statistical analyses of your own design.



CIRP COOPERATIVE INSTITUTIONAL RESEARCH PROGRAM at the HIGHER EDUCATION RESEARCH INSTITUTE AT UCLA

Your First College Year Survey
CIRP Theme
Active and Collaborative Learning
First-Time, Full-time Freshman

Active and Collaborative Learning illustrates the extent to which students are furthering their knowledge of course material through interaction with faculty and other students.
See also - CIRP Construct: Academic Disengagement, Student-Faculty Interaction.

Sample University	Total			Men			Women		
	Your Inst	Comp 1	Comp 2	Your Inst	Comp 1	Comp 2	Your Inst	Comp 1	Comp 2
Studied with other students									
Frequently / Occasionally	96.1%	91.1%	92.4%	95.1%	90.1%	91.4%	97.0%	91.6%	92.9%
Mean	2.40	2.22	2.27	2.37	2.16	2.24	2.42	2.25	2.28
Standard deviation	0.56	0.59	0.59	0.58	0.58	0.60	0.55	0.59	0.59
Significance	-	***	***	-	***	***	-	***	***
Effect size	-	0.31	0.22	-	0.36	0.22	-	0.29	0.24
Discussed course content with students outside of class									
Frequently / Occasionally	97.6%	95.3%	95.8%	97.1%	93.1%	95.1%	97.9%	96.4%	96.3%
Mean	2.43	2.32	2.39	2.38	2.26	2.36	2.48	2.35	2.40
Standard deviation	0.54	0.56	0.57	0.54	0.57	0.57	0.54	0.55	0.56
Significance	-	***		-	**		-	***	*
Effect size	-	0.20	0.07	-	0.21	0.04	-	0.24	0.14
Tutored another student									
Frequently / Occasionally	43.3%	46.3%	47.9%	51.6%	52.1%	54.4%	36.2%	43.5%	44.0%
Mean	1.51	1.53	1.55	1.60	1.59	1.63	1.43	1.50	1.50
Standard deviation	0.63	0.62	0.63	0.64	0.62	0.64	0.62	0.61	0.61
Significance	-			-			-	*	*
Effect size	-	-0.03	-0.06	-	0.02	-0.05	-	-0.11	-0.11
Performed community service as part of class									
Frequently / Occasionally	32.3%	38.0%	29.8%	34.0%	39.0%	29.4%	30.8%	37.4%	30.1%
Mean	1.42	1.46	1.36	1.41	1.47	1.35	1.42	1.46	1.37
Standard deviation	0.66	0.64	0.59	0.61	0.64	0.57	0.69	0.65	0.60
Significance	-		*	-			-		
Effect size	-	-0.06	0.10	-	-0.09	0.11	-	-0.06	0.08
Had meaningful and honest discussions about race/ethnic relations outside of class with students from another racial/ethnic group									
Very often / Often	30.7%	27.8%	30.8%	32.1%	32.2%	33.6%	29.6%	25.8%	29.0%
Mean	2.94	2.76	2.87	3.01	2.86	2.95	2.88	2.71	2.82
Standard deviation	1.24	1.27	1.27	1.24	1.27	1.26	1.23	1.26	1.27
Significance	-	***		-			-	*	
Effect size	-	0.14	0.06	-	0.12	0.05	-	0.13	0.05

Note: Significance * p<.05, ** p<.01, *** p<.001 Page 1 of 3 Sample Report

CIRP Themes

To facilitate discussion of your CIRP survey results at your institution, we have also organized the reports along themes. The CIRP Themes include items from the Constructs, but they cover the areas more broadly, as not every item in the survey would be theoretically appropriate in a construct. The CIRP Themes cover a wide range of topics that research has shown are impacted by the college experience, combining relevant survey items across questions. By examining these items together, the reports illustrate which items contribute to specific areas of interest on your campus.

CIRP Themes	TFS	YFCY	DLE	CSS
College Choice	•			
Transition to College		•		
Student Enrollment Mobility			•	
Academic Preparation	•			
Academic Outcomes		•	•	•
Interaction with Teachers	•			
Interaction with Faculty		•	•	•
Academic Enhancement Experiences	•	•	•	•
Active and Collaborative Learning	•	•	•	•
Satisfaction: Academic Support and Courses		•		•
Satisfaction: Services and Community		•		•
Satisfaction: Community and Diversity			•	
Written and Oral Communication	•	•		•
Diversity	•	•		•
Health and Wellness	•	•		•
Religiosity/Spirituality	•	•		•
Career Planning	•	•		•
Financing College	•			
Navigational Action		•	•	
Push/Pull Influences			•	
Voluntary System of Accountability				•

TFS: The Freshman Survey; **YFCY**: Your First College Year;
DLE: Diverse Learning Environments; **CSS**: College Senior Survey

For more information on CIRP Constructs, read our technical report:
www.heri.ucla.edu/PDFs/technicalreport.pdf