



theRPgroup

the Research & Planning Group
for California Community Colleges

perspectives

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Hello, !

It isn't breaking news that change is a constant in our lives. As a bibliophile who deeply appreciates the printed word (on paper), I lamented the demise of the bookstore (at least the shrinkage of the brick and mortar sites). Who could foresee the downfall of a corporate heavyweight like Borders? As I recently reflected on this evolution, I learned of yet another shift in society and the marketplace. Two national chains for sporting goods announced, in the space of a few weeks, that they will close down their stores. I suppose I'll need to focus more effort on shopping at small local sports shops or go online (like the rest of the world?). I guess I'll survive these changes because I'm a consumer who can find substitutes for these dying market channels or declining products.

The question for all of us working in community college education, however, is what's next on our horizons? Few of us get paid to serve as prognosticators (unlike weather forecasters, land development speculators, and financial market gurus), and if we banked all our incomes on guesses about the future, we'd need a robust insurance policy. But we can't afford to ignore the future. The price for not preparing for scenarios of change is pretty high. We may go bankrupt or unemployed if we cannot adapt to seemingly inevitable and ubiquitous change in our environments. The lesson I see in the recent corporate crashes is that strategic planning is critical for us in the higher education industry (yes, industry) to adapt to change that we may be too busy or blind to sense is unfolding around us. Moreover, a strategic plan that we formulated a decade ago may apply more to our rearview mirror (where we have traveled) than the road ahead (where we're headed soon).

In this issue of *Perspectives*, we get a glimpse of some forward thinking that some of our colleagues shared at the recent RP Conference. The contributing authors touch on (1) predicting student success for STEM; (2) recognizing progress in the Common Assessment Initiative; (3) identifying different student groups related to levels of student success; (4) predicting student loan default; (5) using an unorthodox strategy for strategic planning; and (6) exploring leadership and management in institutional research (a book review).

To conclude this issue, we highlight recent recipients of the RP Group Lifetime Achievement Awards, Bob Gabriner and Linda Umbdenstock, two dedicated leaders who have shown us all how

to marry a vision for the future with a thoughtful, practical plan.

Sincerely,
Willard Hom

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Session Spotlight | Analyzing Qualitative and Quantitative Data to Predict and Increase Student Success within a Critical STEM Sub-population



Chaffey College

Authors: *Jacob Biggs, Research Assistant; Nicole Gores, Administrative Assistant; Linda Lamp, Educational Program Assistant; Karen Olsen, Administrative Assistant School of Math and Science; and Ted Younglove, Dean of Mathematics and Science, Chaffey College*

The goal of this study was to identify key factors that might predict student success in third attempt courses so that the Math and Science (M&S) Dean's Office at Chaffey College could advise students accordingly. Informed advising would then have the potential to increase successful completion of STEM courses and improve Chaffey's graduation/transfer rates. According to state regulations, students wishing to repeat a course in which they have received two substandard grades must petition the dean for permission to register for the course for a third and final time. The M&S Dean's Office receives over 200 course repeat petitions per semester; thus, it is imperative that the office staff and dean know the factors that might affect student success on repeat course attempts. In pursuit of this knowledge, the M&S Dean's Office collected and analyzed data from over 850 course repeat petitions for the period of spring 2013 through summer 2015.

The M&S Dean's Office collected and recorded data from each student's petition packet, Datatel, and campus MIS data. Some examples of the recorded variables include student GPA, demographics, grade on third attempt, number of registered units during third attempt, elapsed time between second and third attempt, length of written statement, and third attempt course type (i.e., fast-track or full-term). Using stepwise discriminant analysis in SPSS, all quantitative and qualitative data were evaluated and variables were selected and included in a statistically significant model

($p < 0.0001$). The final model predicted that a student was more likely to succeed on their third attempt if s/he:

- Received a "D" grade on the second attempt
- Took fast-track on the third attempt
- Had a higher GPA at the time of the third attempt
- Wrote more lines on the personal statement
- Registered in fewer units during the third attempt
- Had more than 12 months between the second and third attempts

The disadvantage of doing research from an instructional office is that it has to be done while also dealing with all of the regular duties required for running math and science classes. The advantage, however, is that the results can be used in operations immediately. The M&S Dean's Office now considers these results when advising petitioning students and making approval decisions. For example, petitioning students who have a low GPA will usually be required to complete more classes and raise their GPAs before the dean will approve their petitions. Also, in the past, many students were hesitant to take fast-track courses because they believed that the fast pace of these classes would likely make the class too hard for students who already struggle with the content. Based on the recent research, students are now advised that they could benefit from a fast-track class on their third attempt.

This project is unprecedented at Chaffey, and it has implications for student success. Because of the rapid implementation of some of the findings, independent data will be collected and used for validation of the model and of the procedural changes in the fall. Math and science courses play a key role in many fields of study and most are sequential. It is important that students succeed with good foundation in these courses. Math and science courses also satisfy various transfer/graduation requirements; therefore, failing math and science courses tend to hinder a student's ability to transfer/graduate.

This ongoing project will try to improve predictive power by bringing in additional variables such as employment hours, child care needs, and other 'life' factors that could affect success. It is recommended that other community colleges do similar research on petitioning students to see if the guidelines of this study are generalizable. At Chaffey, about 60% of students who do not pass a course on their third attempt do not go on to complete other classes. Therefore, it is important to understand how to help petitioning students succeed. Lastly, nearly 70% of all students who took a fast-track course on the third attempt successfully completed the course. Other community colleges may want to look into offering fast-track courses if they are not currently offered.

Resources:

- <http://www.chaffey.edu/fasttrack/>
- http://www.chaffey.edu/mathandscience/course_repetition.shtml



Authors: *Jennifer Coleman, Statewide Program Director CAI, CCC Technology Center, Butte College; Andrew LaManque, Associate Vice President of Instruction, Foothill College; and Erik Cooper, Dean of Planning, Research, and Resource Development, Sierra College*

Three years ago, it was almost unimaginable that California's community colleges would develop a consistent system-wide student assessment. Now, the new product from the Common Assessment Initiative (CAI) is in the field, and students are taking the first version of the assessment. Through collaboration with the Chancellor's Office, the ASCCC (Academic Senate for California Community Colleges), numerous stakeholders and statewide initiatives, faculty and staff representatives from seven workgroups, and the CCC Technology Center have made the new assessment, "CCCAssess," a reality.

The CAI goals are far reaching--to develop a comprehensive common assessment system that aligns with legislation, reduces unnecessary remediation, provides statewide efficiencies, and supports faculty and staff efforts for accurate student placement. The end game is to "Assess for Student Success."

We report that 1,342 students have already completed assessments. By the end of the spring 2016 semester, 14,000 tests are expected to be submitted and analyzed for validation. CAI psychometrician William Fisher is reviewing pilot assessment data. He will study linkages between testlets to ensure that the data sets connect as expected.

At April's RP Conference, attendees were interested in what CAI representatives had already learned from the pilot experience and what they can do to prepare their colleges for implementation. In terms of adoption, the CCCCO announced the [CAI adoption schedule](#) on April 18. To assist colleges with implementation, CAI will offer regional professional development sessions that it will announce through listservs, newsletters, and the website. In addition, people can refer to an [implementation guide](#) that identifies tasks, responsible parties, and a recommended timeline.

Colleges are encouraged to establish a multi-disciplinary team to plan for local implementation. For instance, administrators may apply for an implementation grant, while faculty work to complete competency mapping. Researchers can review related reports and prepare for validation of local placement models and for required disproportionate impact studies. By collecting best practices from the pilot experience, CAI will give colleges access to sample team meeting agendas, competency mapping tools, and other useful materials to support this adoption at the site level.

One of the key attributes of the new assessment tool for math, English, and English as a Second Language (ESL) is that student results will be stored in a statewide data warehouse for use by any college to make local placement decisions. CCCAssess will integrate the Multiple Measures Assessment Project (MMAP) models as an option for colleges, and writing samples will be part of the English/ESL test. Recency and retesting discussions are also under way between the CAI Steering Committee and the ASCCC. Colleges will continue to control local placement and other related policies.

Resources:

- <http://cccassess.org/>
- [CAI Listserv](#)

- Contact Jennifer Coleman, CAI Statewide Program Director, 530-879-4165 or jcoleman@ccctechcenter.org

Session Spotlight | A Different Way to Look at Student Groups and Their Success



Article Authors: *Christina Leimer, PhD, Executive Director; and Holley Shafer, Senior Research and Evaluation Specialist, Planning, Research, and Institutional Effectiveness (PRIE), College of Marin*

Descriptive accountability metrics--both the required equity metrics for the Student Equity Plans and the Student Success Scorecard performance metrics--disaggregate data by student demographic groups. While doing so does highlight progress and success differentials between some demographic groups, these descriptive statistics do not address the reasons for the disparities. Further, they can leave the impression that the identified groups are uniform in their needs and progress. Not only is this not the case, but such an approach also does not lend itself to identifying at-risk students without over-generalizing. For these reasons, we used cluster analysis to make finer distinctions between student groups, taking into account demographics, college preparation, enrollment and course-taking patterns, educational goals, and short-term academic milestones--some of which are stronger influences on students' success than their gender, race, age, or other ascribed characteristics.

For our analysis, we matched the student data in our State Chancellor's Office SPAR completion report from 2004-2005 through 2008-2009--the degree-seeking cohorts used to calculate Scorecard metrics--to our MIS course-level records. We used SPSS two-step cluster analysis because it allows inclusion of categorical and numeric inputs to cluster cases. Our inputs included age, race/ethnicity, gender, economic disadvantage, first educational goal, three-term persistence, GPA, course success, classification as college prepared (lowest level math or English course is college-level), and the level of English or math courses taken in the first year of enrollment at College of Marin (COM).

Our results yielded five distinct clusters of students, with two groups at low risk of non-completion (completion rates >70%), two groups at moderate risk (completion rates 45%), and one at high risk of non-completion (completion rate 19%). College preparation, persistence, course success, and first year English and math course-taking patterns were more influential in defining the clusters than student demographic variables often used to identify and intervene with students. The high-risk group and one of the moderate risk groups were demographically comparable and diverse, with the main differences between the groups being behavioral patterns. Another moderate-risk group appeared to be seeking career development, not necessarily traditional completion. Among the two low-risk groups, students in one group appeared to need some remediation and enrolled for more terms, while those in the other quickly transferred.

Two-step cluster analysis is exploratory and does have its limitations--it is non-inferential, and cluster quality depends heavily on the data available and judgment used to select inputs. Binary categorical inputs (dummies) can swamp the model, yielding clusters defined solely by one input. Inputs that do not differentiate well dilute the model and negatively impact the cluster quality measure. However, when applied thoughtfully, the two-step method can provide a nuanced way to identify students who are at risk of failing to complete their community college education.

COM students, especially those who were unprepared, were using various strategies in college with different levels of success. The behavioral characteristics used in this analysis, while not predicting completion, suggest needs and issues that may influence these groups' outcomes. The ability to distinguish the multiple pathways our students take through college, and the different needs accompanying those pathways, can help us identify such patterns and intervene--for example, through early alert systems--to improve students' chances of success.

Resources:

- [2016 RP Conference Presentation](#)
- [College of Marin PRIE Report](#)
- [SPSS Two-Step Cluster Component \(SPSS\)](#)

Session Spotlight | An Integrated Approach to a Cross-Functional Problem: Using Predictive Analytics to Understand Student Loan Default



San Joaquin Delta College

Article Authors: *Tina Merlino, Research Analyst, Lindsay Brown, Research Analyst; and Tina Lent, Director of Financial Aid, Scholarships and Veteran's Services, San Joaquin Delta College*

In 2014, the student loan default rate for the San Joaquin Delta Community College District was at an all-time high, (29% for the 2010, three-year cohort). At that time, the college's financial aid department recognized that there was a need to take action to better educate the college community in order to reduce student loan default. In an effort to be more data-driven and implement targeted interventions, our office of Planning, Research, and Institutional Effectiveness (PRIE) was enlisted to conduct a study to help identify common characteristics of defaulted students. The financial aid department has begun using this information to plan proactive student support strategies to help reduce the student loan default rate.

In collaboration with the Director of Financial Aid and the Student Loan Default Specialist, we developed a list of potential predictor variables of student loan default. The variables fit into three broad categories: demographics (e.g., age at enrollment, gender, ethnicity), academic history (e.g., total units attempted, full-time status, initial assessment level), and academic outcomes (e.g., completion of degree or certificate, transfer, cumulative GPA). Using multiple loan repayment cohorts comprising over 1,900 students, we conducted preliminary analyses and incorporated the variables into a logistic regression model that would identify the strongest predictors of student loan default.

Utilizing the percentage point gap methodology as outlined in the CCCCO Student Equity Plan template (2015), we examined disproportionate impact in student loan default for the demographic variables. Similar to what our campus-based research shows for many student success indicators, we found that African-American (21%) and male (26%) students have higher default rates than the overall population (18%). In addition, students who were age 18-24 at first enrollment had an 18% higher default rate than the overall cohort rate. The final logistic regression model was statistically significant with five significant predictors showing that the odds of defaulting on a student loan were:

(a) 4% higher for students who assessed at level one in any subject; (b) 5% higher for students who attempted fewer than 60 units; (c) 10% higher for students who earned a cumulative GPA below 2.0; (d) 10% higher for males; and (e) 9% higher for students who do not complete a degree, certificate, or transfer.

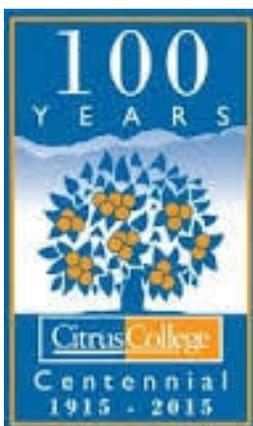
With these findings, the financial aid department has planned proactive approaches to reduce student loan default, including targeted outreach to the students most at risk. The college has adopted a financial literacy training e-course for any faculty and staff who are interested. This empowers all employees who come in contact with students, beyond the financial aid office, to educate students about student loans and finances (see [Beyond Financial Aid](#) guidebook and college self-assessment). In addition, the college is planning financial literacy workshops for students that will be conducted in alignment with New Student Group Advising/Orientation. These workshops will include topics such as simple budgeting, banking basics, understanding credit history, and financial aid 101.

While we would like to collect additional predictor variables (e.g., major of study, high school of origin) and strengthen the predictive model, the current results align with the many strategic plans and initiatives at the college, reinforcing the value of district-wide collaboration in a shared responsibility for student success.

Resources:

- [2016 RP Conference Presentation](#)
- [Beyond Financial Aid Guidebook and Self-Assessment](#)

Session Spotlight | Dream Big: An Innovative, Unorthodox Strategy for Strategic Planning

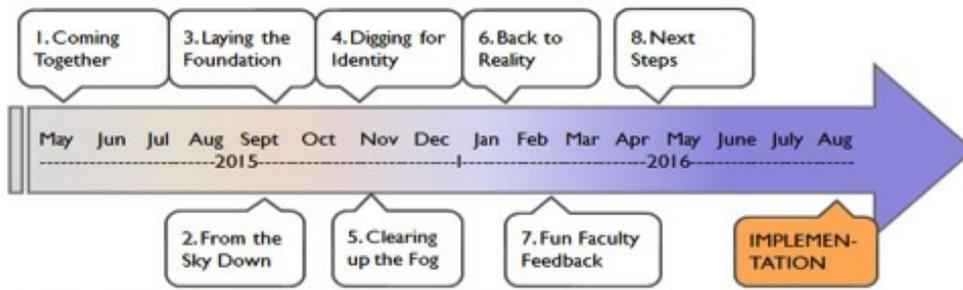


Article Authors: *Yueyi Huang, Research Analyst; Gabe Avakian Orona, Research Analyst; and Claire Stallard, Research Analyst, Citrus College*

Strategic planning is a comprehensive process used to develop a focus that provides the overall direction and guiding principles for the college. Our RP Conference presentation sought to highlight Citrus College's experience in order to introduce researchers to this process, as well as provide a framework to assist colleges in their strategic planning efforts.

Strategic planning at Citrus College started approximately 15 months prior to the implementation of our five-year plan (fall 2016 to spring 2021). In retrospect, we identified eight steps that demarcate key phases in the planning process. The major steps and timeline are illustrated in the graph below.

Major Steps and Timeline



1. Coming Together	Forming the 32-member strategic planning workgroup
2. From the Sky Down	Visualizing our future and understanding our current students
3. Laying the Foundation	Analyzing the college's strengths, weaknesses, opportunities and threats (SWOT)
4. Digging for Identity	Re-examining our mission statement
5. Clearing up the Fog	Developing goals
6. Back to Reality	Writing SMART (specific, measurable, attainable, relevant, and time-bound) objectives
7. Fun Faculty Feedback	Soliciting faculty feedback
8. Next Steps	Creating annual implementation and progress report plans

In May 2015, faculty, students, supervisor/confidential staff, and administrators formed a 32-member workgroup representing the totality of collegiate personnel. The group members familiarized themselves with the integrated planning model and reviewed progress reports from the previous years. In August, strategic planning officially started with two activities. First, the group members participated in a speech exercise where they each put forward a hypothesis about the future direction of the college after receiving a prestigious national award. Following the "dream speech" activity, an in-depth presentation highlighting demographic and performance trends was delivered to provide an up-to-date appraisal of the college's past and present status. The objectivity brought forth from examining the data, coupled with the aspirations of the dream speech, provided a clear trajectory for the future of Citrus College.

To develop a plan that effectively assists the college in reaching its desired destination, the group conducted a comprehensive environmental scan that analyzed the strengths, weaknesses, opportunities, and threats (SWOT) facing Citrus. With the knowledge gained in the SWOT analysis, the group spent the next two months re-examining the college's mission statement, identifying focal areas, developing goals, and writing objectives. At the college's spring FLEX day, faculty members participated in an interactive workshop designed to integrate their feedback and ideas with the goals and objectives. Strategic planning at Citrus College is still in progress. After the five-year plan is finalized, the work group will begin to develop annual implementation plans for each of the next five years.

Assimilating a 32-member workgroup into the planning process brought forth several learning opportunities. Namely, the holistic medium used to vet constructs, goals, and objectives ensured that team-building was an integral part of moving forward. We learned that constructive criticism can come in many forms, and this "public vetting" procedure allowed for a commune approach to both confirming and altering, or even rejecting, ideas and perspectives. Additionally, we learned how to bring theoretical ideas to practical applications. This was most notably expressed when generating objectives. A conceptual understanding of the acronym "SMART" is helpful, but it requires a new set of skills when one must weave specific, measurable, accurate, relevant, and time-phased elements into an existing budget. Furthermore, the mutual collaboration produced a camaraderie that enabled the college mission to supersede divisional agendas. The inclusion of college faculty, staff, and management facilitated didactic discussions that helped shape perspectives as well as encourage the workgroup to consider the experiences of every constituent group on campus.

Resources:

- [Integrated Planning Model](#)
- [Who Are Citrus College Students?](#)

Book Review | Leadership and Management in Institutional Research: Enhancing Personal and Professional Effectiveness



Reviewer: James Sass, Research Analyst, Rio Hondo College

Editor's Note: This book was released in 2015 by the Association for Institutional Research (AIR) as an online volume in .pdf, accessible by AIR members.

William Knight and the Association for Institutional Research (AIR) present *Leadership and Management in Institutional Research: Enhancing Personal and Professional Effectiveness*-a valuable guide for the new institutional research (IR) director. Beyond the intended audience, virtually any IR professional can find important insights and practical wisdom in its pages. The book distinguishes itself from many other statements on IR management by emphasizing the reader's personal effectiveness and human element in IR work.

Knight focuses on higher-order knowledge and skills in IR. Of the book's five sections, the latter three are "Managing and Developing Staff," "Understanding Campus Culture," and "Developing Yourself as a Leader." These sections include chapters on professional development, campus politics, effective use of IR information, and self-development. Setting the foundation for these topics are earlier chapters on budgeting, time management and planning meetings, operating an effective IR office, and emotional intelligence. Chapter 4, "Emotional Intelligence: The Foundation of Leadership," is the longest and central chapter. Knight applies principles from Daniel Goleman's research to concrete experiences in the IR office and makes a strong case for the powerful role of emotional intelligence in IR work.

The book's assets are many. Primary among these are the sources of content. Knight draws on information from his original research on IR work, experiences as a national leader in the field, extensive readings in IR and organizational management, and 25 years' experience as an IR professional. (Knight's first full-time position was as an analyst with a group of regional campuses similar to a community college system.) Additional assets include reproductions of many documents and forms that would be useful to any IR office and realistic scenarios at the end of each chapter that challenge the reader to apply the chapter's content. One of the most important assets is Knight's conversational writing style. The book feels as though the reader is behind a closed door in Knight's office, listening to him speak candidly about his successes and mistakes across 25 years in IR.

Although the book is distinctive in its emphasis on personal and relational dynamics, it often lacks depth in this area. For example, the chapter on performance appraisal speaks to policies and paperwork, but does not address the appraisal meeting itself or principles for effective feedback. In other places, general advice such as "operate with strong emotional intelligence" (p. 99) and

"cultivating emotional intelligence is the key" (p. 120) stops short of addressing actual skills in self-awareness, conflict management, listening, or nonverbal communication. *Perspectives* readers could fill this gap by consulting textbooks in psychology, communication, and management.

Leadership and Management in Institutional Research is an important addition to any IR practitioner's professional library. Knight provides an amazing amount of useful information and ideas in a relatively short volume that is an easy read. The book offers a practical overview to the IR field, a clear approach to IR effectiveness, steps toward improving an IR office's role on campus, and many avenues for the reader's personal and professional development. It provides trustworthy guidance applicable to any stage in an IR professional's career.

Resources:

- [*Leadership and Management in Institutional Research: Enhancing Personal and Professional Effectiveness*](#)

Honorees | Congratulations to the RP Group Lifetime Achievement Award Winners



Award Recipients: *Dr. Robert Gabriner and Dr. Linda Umbdenstock*

Dr. Robert Gabriner and Dr. Linda Umbdenstock shared the limelight at the RP Conference for their decades of vision, leadership, and contributions in research and planning with the RP Group. These two highly dedicated individuals received the Lifetime Achievement Award, which the RP Group Board created this year to honor the accomplishments and service of individuals directly related to their work with our organization. While Gabriner recently retired from his post as professor of educational leadership and director of the Educational Leadership Doctoral Program at San Francisco State University, he built most of his legacy during his 19 years at City College of San Francisco and 22 years at the Peralta Community College District. Umbdenstock worked in education for four decades and retired from her post as Dean of Planning at Long Beach City College. Both Gabriner and Umbdenstock furthered the agenda for community colleges with their leadership in the RP Group and elsewhere. We invite you to learn more about their achievements by clicking the link below.

Resources:

- [RP Group Lifetime Achievement Award Winners](#)

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