



SOUTH CAROLINA
STATE UNIVERSITY
ACADEMIC REVIEW

FINAL REPORT
JULY, 2007

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South Carolina State University Academic Review

FINAL REPORT

OVERVIEW

Through a contract with the South Carolina State University Board of Trustees, The Education Commission of the States has worked closely with university administration, staff, faculty, students, alumni and community leaders to conduct an academic review of the programs available at South Carolina State University.

In a time of limited financial resources and competitive forces impacting South Carolina State University, the Trustees want to ensure the academic offerings of the institution are of a high quality and are relevant in a knowledge-based global economy. Assessing the current productivity of programs within the institution and their alignment with workforce demand provides a valuable set of data which can result in an appropriate balance of postsecondary academic programs that have value to students, employers and the broader community.

Overall, the academic review reveals that the quality of its academic offerings will depend on a variety of factors to include the academic preparation of students, the extent that the university is able to ensure students are proficient in the essential academic skills necessary to be successful in the academic fields that are in greatest demand, unproductive programs are able to make the necessary changes to improve their success, and the skills and knowledge taught at the university are consistent with what employers demand of their employees.

Some of the key findings of this report include:

- ◆ Enrollment increases have resulted in a higher number of first-time freshmen who are not optimally prepared for college-level coursework.
- ◆ First-time freshmen retention rates have begun to decline, as overall enrollment has increased.
- ◆ South Carolina State University is a net-exporter of transfer students among South Carolina postsecondary institutions with a high number of students transferring to two-year institutions.
- ◆ South Carolina State University offers 71 different degrees and certifications at the undergraduate and graduate levels.
- ◆ 19 of 53 programs reviewed by the South Carolina Commission on Higher Education did not meet either state enrollment or completion standards for the period between fall 2000 and fall 2005.

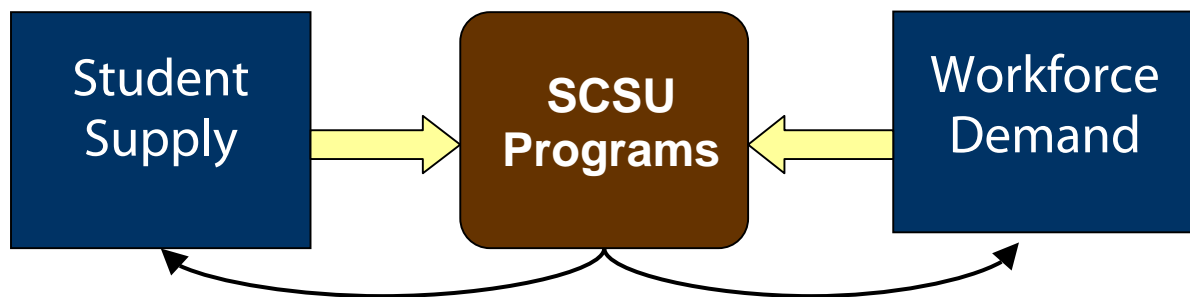
- ◆ Four programs (Art Education, Industrial Education, Social Sciences and Physics) currently have provisional approval from the state because of their lack of compliance with both state enrollment and completion standards.
- ◆ Competition from like academic programs at other South Carolina postsecondary institutions is not related to the productivity of academic programs.
- ◆ Academic fields in education, business, health sciences and technology are aligned with many of the fastest-growing and highest-demand jobs available in South Carolina.

SETTING THE CONTEXT

Since November 2006, the Education Commission of the States and an Ad Hoc Academic Review Committee appointed by the South Carolina State University Board of Trustees has explored how to prepare South Carolina State University students for an increasingly competitive, knowledge-based global economy.

The challenge for South Carolina State University (SCSU) is to align its academic programs to industry demand and to the unique academic and social needs of future South Carolina State University students. As a result, South Carolina State University should see itself as an arbiter of both the supply of students entering its institution and the demand for their skills and knowledge once they enter the workforce. The Ad Hoc Academic Review Committee conducted its analysis of SCSU's academic programs with a firm understanding of how the institution should address student supply and workforce demand as represented in Figure 1.

Figure 1: South Carolina State University as Arbiter of Supply and Demand



KEY QUESTIONS FOR THE ACADEMIC REVIEW

The Ad Hoc Academic Review Committee engaged in a discussion of the critical questions that South Carolina State University must answer to position its academic programs as the critical bridge to the economic prosperity of its students in a changing global economy. The committee identified the following five questions to frame the academic review:

- 1) Who are the South Carolina State University students of the future?
- 2) Which opportunities do South Carolina State University Students need preparation for upon graduation?
- 3) How should South Carolina State University academic programs be delivered to students?
- 4) How do South Carolina State University's academic programs compare with other like institutions?
- 5) What is the "value added" South Carolina State University offers its students and the larger community?

The academic review conducted an environmental, institutional and stakeholder analysis to address each of the key questions from the academic review framework. The environmental analysis examined current demographic, economic and education policy trends in South Carolina to determine how outside forces are presenting unique opportunities and challenges that South Carolina State University should address to maximize both the relevance and productivity of current academic programs. The institutional analysis examined data regarding the current productivity of academic programs and how those programs align with demand from students and employers. The stakeholder analysis collected the unique perspectives of various constituent groups from within the university and the larger community. Stakeholders were able to articulate their perceptions of the institution as well as areas of growth that the university should consider as it moves into the future.

WHO ARE THE SOUTH CAROLINA STATE UNIVERSITY STUDENTS OF THE FUTURE?

The question, "Who are the SCSU students of the future?" results in a wide range of responses from the various stakeholders invested in South Carolina State University. Working students, international students, culturally diverse students, adult students, first-generation students, technologically savvy students and academically prepared students were just a few of the responses we heard from those who we spoke to about South Carolina State University. Overall, the constituents believed that South Carolina State University should preserve its unique history of providing educational opportunity to low-income, first generation African American students while reaching out to new student populations who would benefit from the educational opportunities that South Carolina State University provides.

In particular, South Carolina State University should seek to have a more diverse student population that includes students from other cultural/ethnic backgrounds to include international students and the growing number of students of Hispanic origin that are entering South Carolina. In addition, the college must find a way to attract both high achieving students and adult students who have very different expectations about the quality and flexibility of academic programs.

Reaching these populations will be a unique challenge to South Carolina State University at a time when enrollment growth has been primarily confined to the traditional populations that SCSU has served.

SCSU COMMITMENT TO ACCESS INFLUENCES COLLEGE ENROLLMENTS

SCSU has prided itself on providing access to a four-year college degree for students from a wide range of academic backgrounds. As the institution looks to its future, it is important to look at current enrollment trends by considering the academic preparation of current students entering SCSU and projecting the impact of those trends on academic programs.

HIGH SCHOOL GRADUATES ON THE RISE

South Carolina, like many southern states, anticipates growing numbers of high school graduates for years to come. Unfortunately, many of the students who will drive these increases have been traditionally underserved by education. These enrollment increases present both an opportunity and challenge for South Carolina State University. To the extent that increases in the number of high school graduates result in more candidates for enrollment in postsecondary education, SCSU can potentially reach its goals to increase enrollment. On the other hand, the institution will undoubtedly be faced with larger numbers of applicants who are not adequately prepared to enroll in college-level work.

Research indicates that between 2002 and 2018 in South Carolina the number of high school graduates is projected to increase by almost 19%.¹ The projected increase is due in large part to current immigration of people into the state, many of Hispanic origin. According to the Southern Regional Education Board:

- ◆ The percent of white high school graduates will decline from 59% in 2006 to approximately 48% in 2018.
- ◆ African American students will drop from 38% to 30% of high school graduates.
- ◆ Conversely, the percentage of Hispanic students graduating from South Carolina high schools will increase from 2% of all graduates in 2006 to 21% in 2018.²

These data suggest that Hispanic students will become a significant percentage of the pool that South Carolina State University will need to draw from to fill its classrooms. Meanwhile, African American high school graduates will become a smaller percentage of total graduates.

Hispanic students represent a “new market” for SCSU. However, Hispanic students are more likely to be lower income and often lack basic skills, particularly in English proficiency. This reality is evidenced by the fact that increasing numbers of South Carolina K-12 students qualify for Limited English Proficiency (LEP) services. In 2006, over 23,000 South Carolina K-12 students were eligible for LEP services, which represent a 176% increase over the number of students eligible for services in 2002-03.

If SCSU is to serve the growing number of Hispanic high school graduates, it will need to offer academic support services to Hispanic students, particularly in English language acquisition and proficiency.

ACADEMIC PREPARATION OF K-12 STUDENTS INADEQUATE, BUT IMPROVING

The growing number of Hispanic high school graduates complicates an already challenging environment for postsecondary institutions where a large percent of South Carolina high school students fail to graduate from high school in four years. Of those who do graduate, many are lacking the academic skills necessary to excel at the postsecondary level.

The National Assessment of Educational Progress (NAEP) is widely regarded as a sound measure of academic proficiency and progress toward postsecondary preparation. South Carolina students' performance on the NAEP indicates that most are not on track to graduate from high school academically prepared for postsecondary education. The 2005 NAEP results reveal that:

- ◆ 30% of South Carolina 8th-grade students are proficient in mathematics
- ◆ 25% of South Carolina 8th-grade students are proficient in reading.

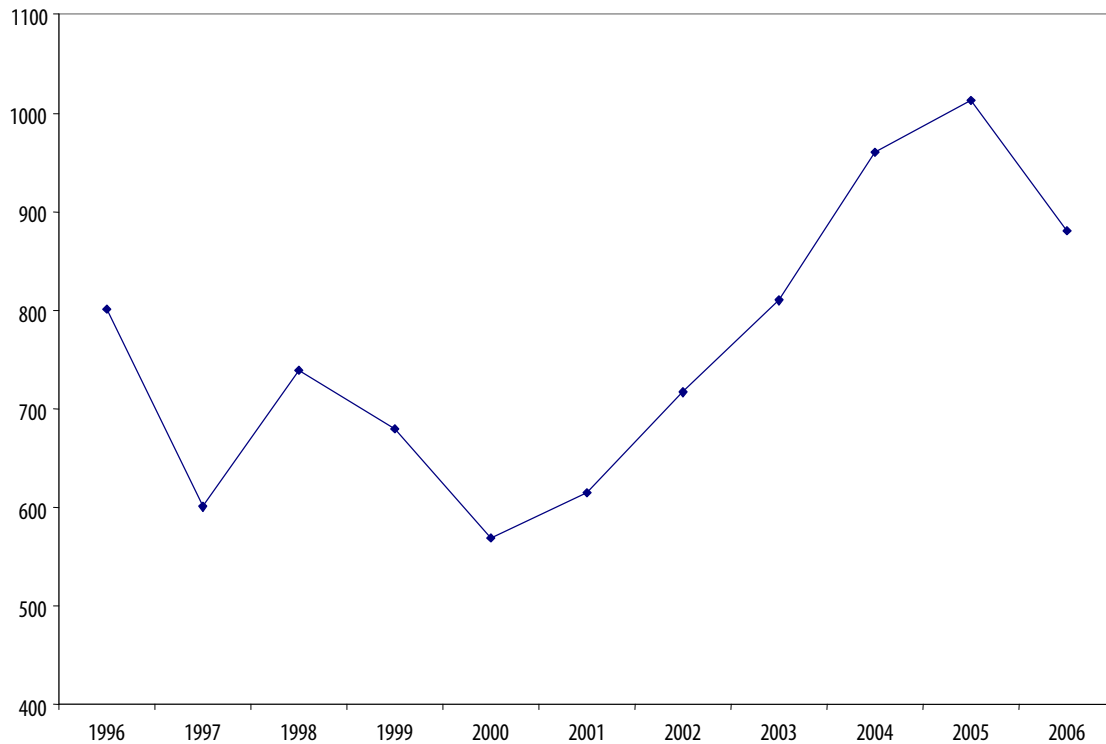
While these results show considerable room for improvement, South Carolina has made a commitment to address the weaknesses in its education system by setting some of the most rigorous academic standards in the country. According to *Education Week*, South Carolina ranks third in the nation for raising academic standards and improving school accountability.³

Even with the implementation of higher standards, there is still a great deal of work to be done. It will be important for SCSU to consider the role it will play in cultivating its future enrollment through its teacher preparation program and by partnering with K-12 schools to academically prepare South Carolina K-12 students for college level work.

SOUTH CAROLINA STATE'S STUDENT POPULATION

Since 1996, SCSU's undergraduate enrollments have steadily increased. The enrollment increases are largely due to an increase in the number of first-time freshmen admitted to the college. As a result, SCSU students have become younger and are more likely to be enrolled full time. Figure 2 represents the increase in first-time freshmen enrollment since 1996.

Figure 2: South Carolina State University First-Time Freshmen Enrollment, 1996-2006.



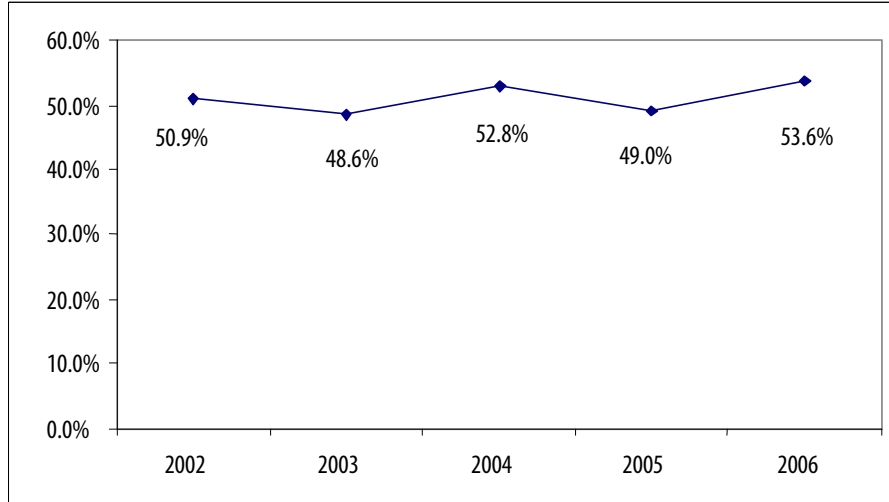
South Carolina State University Institutional Research

Increasing enrollments have not had a significant impact on the demographics of the student population. Since 2002, 78 to 82% of undergraduate enrollments are students who are from South Carolina and approximately 97% of undergraduate enrollments have been African American.

AS ENROLLMENT INCREASES, STUDENT RETENTION IS DECLINING

South Carolina State University has had a tradition of graduating approximately 50% of its first-time freshmen in six years or less. Figure 3 reveals that the undergraduate completion rates were at approximately 50% when first-time freshmen enrollments were lower in the late 1990's.

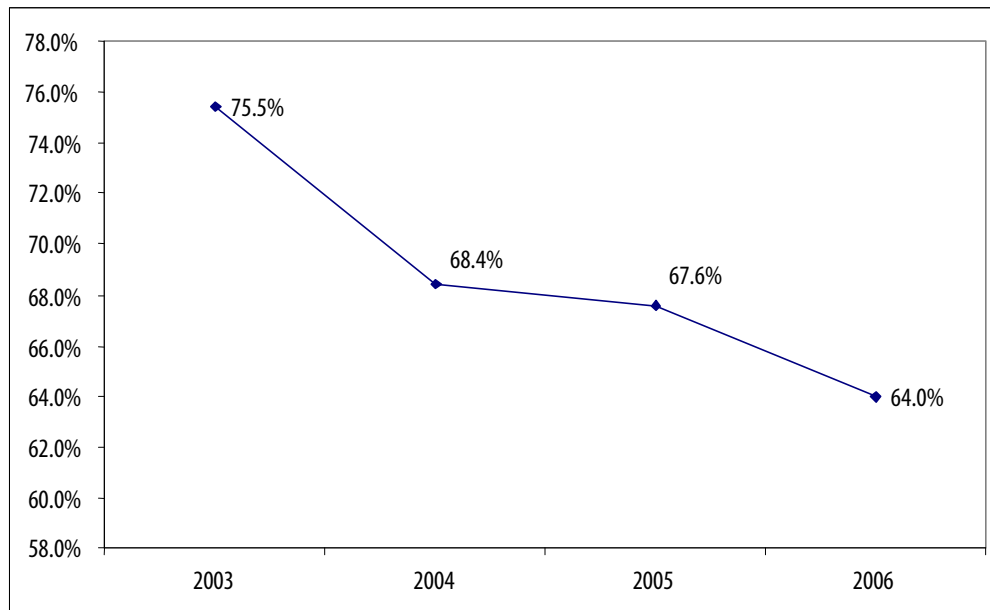
Figure 3: Six-year Graduation Rates for South Carolina State University Students, 2002-2006



South Carolina State University Institutional Research

However, as first-time freshmen enrollments have increased, the second-year retention rate for first-time freshmen has declined. Figure 4 demonstrates that between 2003 and 2006, the percentage of students who were still enrolled the fall immediately following their initial fall enrollment has begun to decline.

Figure 4: Second-Year Retention of First-Time Freshmen Enrollments, 2003-2006



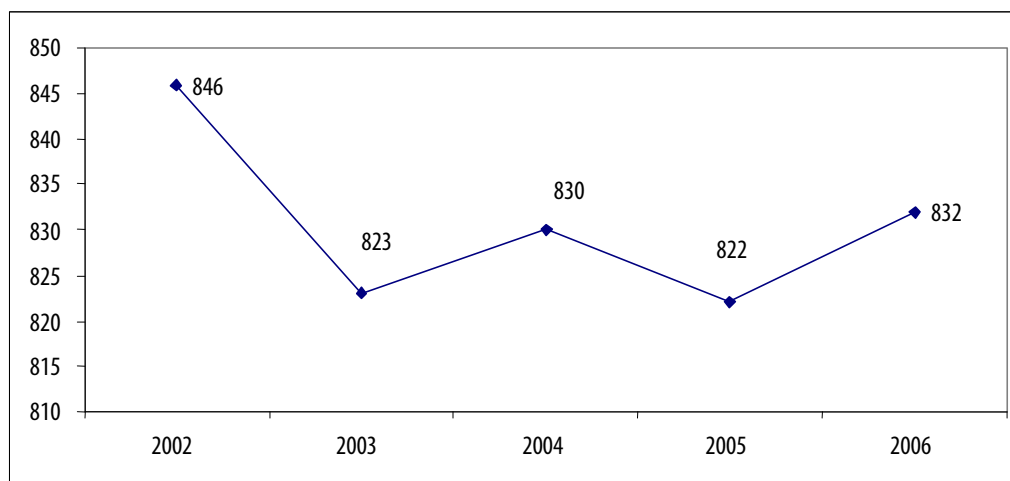
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ACADEMIC PREPARATION OF FIRST-TIME FRESHMEN

Determining the college readiness of entering students has always been an inexact science. State policy in South Carolina articulates that students who complete the state-approved college prep curriculum while in high school are deemed qualified for college-level work. While research does find that students who take a rigorous college prep curriculum are more likely to be successful in postsecondary education, there is a growing body of research finding that the content in college prep courses offered in high schools are not properly aligned with the skills and knowledge students need to be successful in college level work.⁴

At South Carolina State University, college entrance is generally based on the completion of the state-approved college prep curriculum and college entrance exam scores, which is typically the SAT. However, state law allows up to 15% of first-time freshmen to be admitted even though they have not completed the state approved high school curriculum. As a result, the only uniform measure of college readiness is the SAT exam. Figure 5 shows that the average SAT scores for first-time freshmen students have ranged between 820 and 830 from 2003-06.

Figure 5: Average First-Time Freshmen SAT Scores, 2002-06



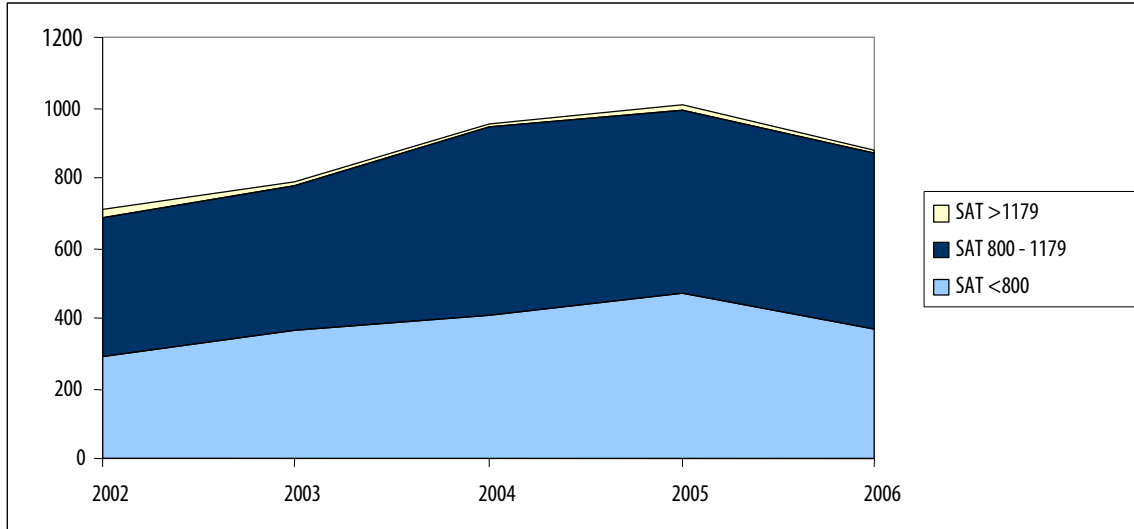
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The College Board, which administers the SAT, has recently studied the performance of first-time freshmen students at several universities to determine if the SAT has any predictive power over freshmen grade point average (FGPA). The College Board study determined the SAT scores in which students would have a 65% probability of earning a FGPA of 2.7 and 2.0.⁵ The analysis reveals that students who score an 1180 on the SAT have a 65% chance of earning a 2.7 FGPA and students who score an 800 on the SAT have a 65% chance of earning a 2.0 FGPA.

An analysis of SAT scores at South Carolina State University reveals that virtually all first-time freshmen score below 1180 on the SAT and a sizable number score below 800. As first-time enrollments have increased over the past five years, almost all enrollment increases have come from

students scoring below 1180 on the SAT. Figure 6 shows the growth in first-time freshmen who had SAT scores below 1180.

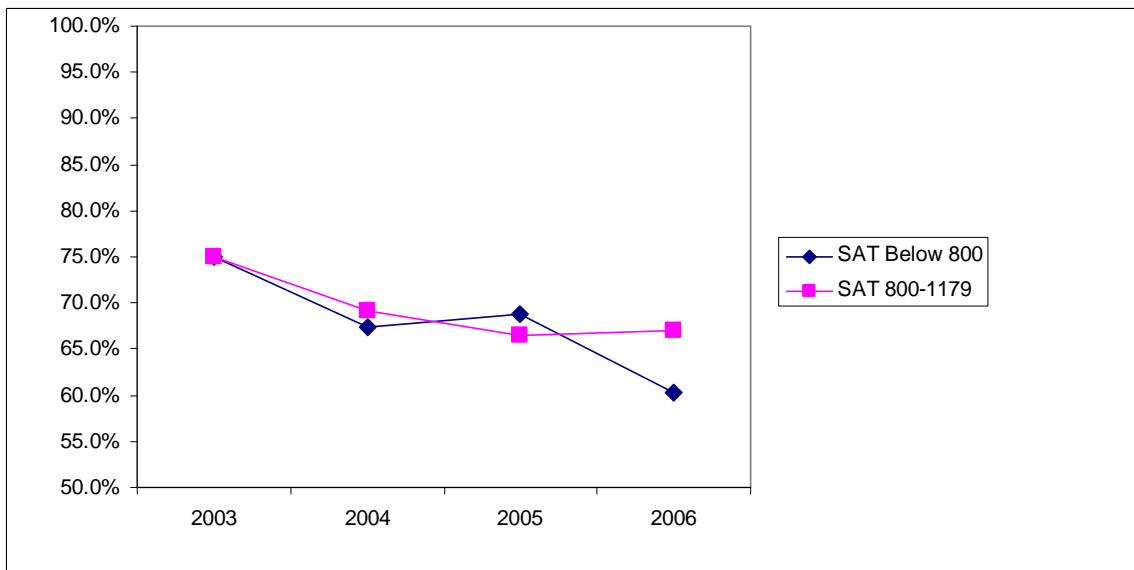
Figure 6: Distribution of SAT Scores for First-Time Freshmen, 2002-06



South Carolina State University Institutional Research

A further analysis of the performance of freshmen students shows lower second year retention rates and freshmen grade point averages that are consistent with the College Board research. Figure 7 shows that the second year retention rate of students who score below 800 declined to approximately 60% in 2006.

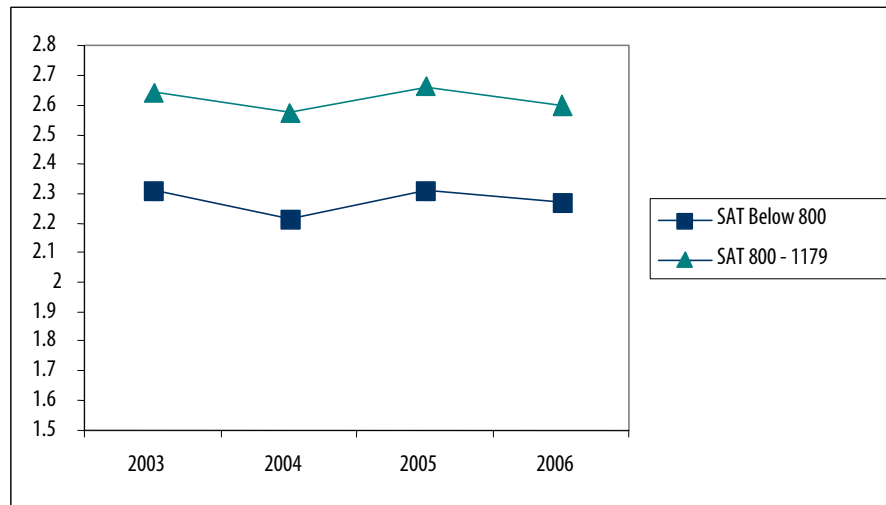
Figure 7: 2nd Year Retention Rates for South Carolina State Students by SAT Score, 2003-06



South Carolina State University Institutional Research

An analysis of freshmen grade point averages for students who were retained into their second year was fairly consistent with the College Board findings. Figure 8 shows students who scored between 800 and 1179 had an average FGPA of 2.6. Students who scored below 800 on the SAT had an average FGPA of around 2.3. It is important to note that students who were not retained into their second year are not included in the FGPA analysis. For example, because of the high attrition rate among students who scored below 800 on the SAT, over 40% of first-time freshmen with SAT scores below 800 are not included in this analysis.

Figure 8: Average Freshmen Grade Point Average for South Carolina State Students by SAT Score, 2003-06



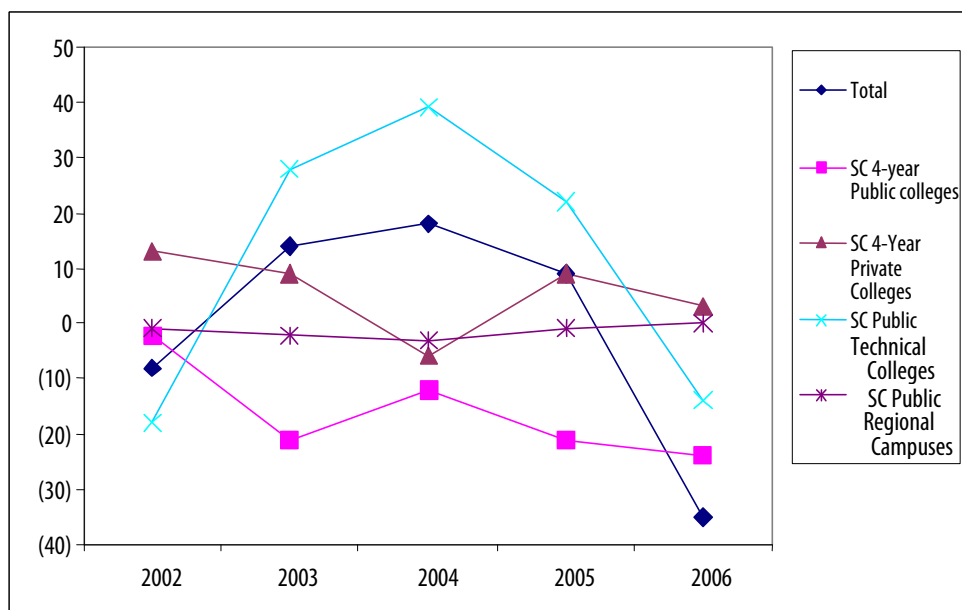
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STUDENT TRANSFER

South Carolina State University provides a wide range of opportunities for students from South Carolina's two-year colleges to transfer to SCSU to earn bachelor's degrees in areas such as teaching, engineering technology and nursing. As a result, you would expect that SCSU would have strong transfer rates into the institution from South Carolina technical colleges. In the recent past this was indeed the case, but more recently SCSU has become a net exporter of students to other South Carolina postsecondary institutions.

Figure 9 shows that the net student transfers into and out of South Carolina State University declined significantly between 2004 and 2006. In particular, the net transfer of students between South Carolina two-year technical colleges and SCSU has rapidly declined to the point where SCSU transfers more students out to state technical colleges than it transfers from technical colleges into the university.

Figure 9: Net Student Transfers with other South Carolina Postsecondary Institutions, 2002-06



South Carolina Commission on Higher Education

A further analysis of the data represented in Table 1 reveals that while the number of students transferring into SCSU from two-year technical colleges remained fairly constant between 2002 and 2006, the number transferring out of SCSU to two-year colleges rose rapidly.

Table 1: Net Transfer of SCSU Students with South Carolina Public Two-year Colleges, 2002-06

	Transfer Into SCSU		Transfer Out of SCSU		Net Transfer By Enrollment Status		Overall Net Transfers
	Full time	Part Time	Full Time	Part Time	Full Time	Part Time	
2002	82	19	65	54	17	(35)	(18)
2003	71	9	31	21	40	(12)	28
2004	92	11	27	37	65	(26)	39
2005	98	16	57	35	41	(19)	22
2006	91	14	65	54	26	(40)	(14)

South Carolina Commission on Higher Education

If South Carolina State University is to adequately prepare students for a competitive, knowledge-based economy that puts a premium on math, reading and writing skills; it will need to consider how to serve a growing number of students who are not optimally prepared for postsecondary education. This is particularly a challenge in majors such as nursing, teaching and engineering where the skills students must possess are more highly scrutinized because of licensing and certification exams.

The productivity of academic programs, particularly programs requiring higher skill sets, should be examined in light of the students being admitted to the university. This is not to suggest that SCSU

should revisit its long-standing mission of serving low-income, traditionally underserved students. Instead, SCSU should consider how it is going to create productive academic programs with the students they admit.

HOW SHOULD SOUTH CAROLINA STATE UNIVERSITY ACADEMIC PROGRAMS BE DELIVERED TO STUDENTS?

As the SCSU student body diversifies, there will be an expectation that academic programs will be delivered in a manner that meets the needs of those students. SCSU constituents expressed the need for the academic programs at South Carolina State University to be delivered with greater flexibility and with an emphasis on the use of emerging education technologies. Likewise, the content of the academic programs must meet the needs of students with a variety of skill levels and academic aspirations.

Because of the high percentage of first-time freshmen enrolling at SCSU without the essential skills in reading, writing and mathematics; constituents across the board expressed the need for academic programs, particularly in the freshman year, to be focused on students building their college-ready academic skills. Providing additional support to students who are lacking the academic skills required of the university's academic majors should be a focus of academic instruction.

In order to reach the growing numbers of non-traditional students who work full time, have families and other responsibilities; stakeholders believe it is important to provide greater flexibility in course offerings by increasing the number of online, evening and weekend courses. Data suggest that online courses are on the rise at SCSU, but that much more can be done to maximize online technology to deliver instruction.

Technology should also be utilized in the traditional classroom to enhance instruction and meet the needs of an increasingly tech-savvy student population. Evidence suggests that more courses at SCSU are integrating technology into their curriculum. Between 2005 and 2006 the number of courses offered online increased from 19 to 42 and the number of all courses that were technology supported increased from 89 to 325.⁶

While all these changes to program delivery may be warranted, the bottom line is that all academic programs must be of a high quality, must attract sufficient numbers of students and must graduate those students with degrees.

SOUTH CAROLINA STATE UNIVERSITY PROGRAMS

South Carolina State University offers a wide range of programs to both undergraduate and graduate students. In order for a program to operate, it must make an application to and receive approval from the South Carolina State Commission on Higher Education (SCCHE). As a result, the academic review chose to rely on the listing of approved programs listed at SCCHE to inventory SCSU programs.

According to SCCHE, South Carolina State University has 71 approved degree and certificate programs; 44 undergraduate degrees and 27 graduate degree or certificate programs. The breakdown of degrees and certificates is provided in Table 2:

Table 2: Breakdown of Approved Degree Programs at South Carolina State University, 2006-07

Degrees/Certifications	Number
Bachelor of Arts	10
Bachelor of Science	30
Bachelor of Science - Nursing	2
Bachelor of Social Work	2
Doctor of Education (EDd)	1
Doctor of Education (EdD)	1
Doctor of Education (EDs)	1
Master of Arts	2
Master of Arts - Teaching	5
Master of Education	11
Master of Science	4
Post-Baccalaureate	1
Post-Master's Certification	1
Total Degrees/Certificates	71

South Carolina Commission on Higher Education

SOUTH CAROLINA STATE UNIVERSITY PROGRAM PRODUCTIVITY

A key measure of program success carefully monitored by the state of South Carolina is the productivity of academic programs. Each public postsecondary institution in South Carolina must submit data on the number of students who enroll and complete state approved academic programs. The South Carolina Commission on Higher Education (SCCHE) evaluates program productivity against a set of minimum enrollment and completion standards set for each program. Every academic program must maintain five-year average program enrollments and completions that meet or exceed the state standards. Programs that do not reach the state enrollment and completion standards are reviewed by SCCHE to determine whether they will retain their program approval from the state. Productivity reports are developed for programs that have at least five years of enrollment and completion data. Programs that have been in existence for less than five years are not included in state productivity reports.

Program productivity is a logical starting point for looking at the quality of academic programs. Programs that are not meeting state standards or are at risk of falling below state standards, must be examined closely to determine whether they are achieving program goals and are worthy of institutional investment.

According to data provided by the SCCHE productivity report for the timeframe from the fall of 2000 to the fall of 2005, 19 out of 53 South Carolina State University academic programs evaluated

did not meet at least one of the productivity standards.¹ Table 3 shows the distribution of programs across South Carolina State University colleges and departments. There are programs in each college that have not met either the five-year average for enrollments or completions set by the state.

Of those 19 programs that do not meet state standards, four have been flagged by the South Carolina Commission on Higher Education as non-compliant with both the enrollment and completion standards for the period from fall 2000 through fall 2005, and as a result have undergone a review to determine their viability. The four programs currently under review are:

- ◆ Art Education K-12, Bachelor of Science
- ◆ Social Sciences, Bachelor of Arts
- ◆ Physics, Bachelor of Science
- ◆ Industrial Education, Bachelor of Science.⁷

South Carolina State University has requested and SCCHE staff is recommending that all four programs be granted provisional approval for the 2006 review cycle. Provisional approval is a probationary status granted non-compliant programs. If programs that receive provisional approval do not meet the enrollment and completion standards of the state for three consecutive biennial review cycles, the program will be eligible for termination by the state. Both the Physics and Art Education programs are receiving their second consecutive provisional approval, meaning if they do not meet state completion and enrollment standards when they are reviewed again in 2008, they will be eligible for termination by the state.

Enrollment and completion data should be viewed carefully and trends over the five-year timeline should be considered when assessing the viability of a given program. Programs that have seen a downward trend in enrollments and completions deserve further analysis. An examination of those trends finds that seven out of the eight programs that did not meet the enrollment standards have had either downward trends or no movement in the number of students enrolled in their program. Likewise, 13 out of the 17 programs that did not meet the program completion standards had either downward trends or no movement in the number of students completing their program.

¹ The SCCHE report does not include data from the 2005-06 academic year. Examination of the number enrollments and completions for programs from the 2005-06 academic year would be warranted.

Table 3: South Carolina State University Programs Not Meeting
South Carolina Commission on Higher Education Productivity Standards, 2005

College	Department	CIP Code	Major	Enrollment Standard			Completion Standard		
				Met/Not Met	Standard	Average 2000-05	Met/Not Met	Standard	Average 2000-05
College of Business and Applied Professional Sciences	Accounting, Agribusiness and Economics	01.0102	Agribusiness (MS)	Not Met	6	4.2	Met	3	3.6
		01.0102	Agribusiness (BS)	Met	12.5	13.4	Not Met	5	3.4
		52.0601	Economics/ Business Economics (BS)	Met	12.5	39	Not Met	5	4.4
	Business Administration	13.1303	Business Education (BS)	Met	12.5	35.8	Not Met	5	1.8
		50.0909	Music Merchandising (BA)	Met	12.5	32.4	Not Met	5	3.4
	Family and Consumer Sciences	13.1308	Family and Consumer Sciences Education (BS)	Met	12.5	14.2	Not Met	5	3.2
College of Education, Humanities and Social Sciences	Education	13.1001	Special Education (BS)	Met	12.5	30.4	Not Met	5	2.8
		13.1001	Special Education (MEd)	Not Met	6	5	Met	3	4.4
		13.1302	Art Education K-12 (BS)	Not Met	12.5	5	Not Met	5	0.2
		13.1312	Music Education (BS)	Met	12.5	46.2	Not Met	5	3.4
	Human Services	19.0701	Human Development Consultant (CERT)	Not Met	6	0	Not Met	3	0
		51.2399	Rehabilitation/ Therapeutic Services (PMCert)	Not Met	6	0	Not Met	3	0
	Social Sciences	45.1101	Sociology (BA)	Met	12.5	23.4	Not Met	5	4
		45.0101	Social Sciences (BA)	Not Met	12.5	1.2	Not Met	5	0.2
	Visual and Performing Arts	50.0702	Studio Arts (BA)	Met	12.5	42.2	Not Met	5	2.6
		50.0501	Dramatic Arts (BA)	Met	12.5	15.6	Not Met	5	3
College of Science, Mathematics and Engineering Technology	Biological and Physical Sciences	40.0501	Chemistry (BS)	Met	12.5	39.2	Not Met	5	4.2
		40.0801	Physics (BS)	Not Met	12.5	5	Not Met	5	1.2
	Industrial and Electrical Engineering Technology	13.1309	Industrial Education (BS)	Not Met	12.5	6.6	Not Met	5	1.4

South Carolina Commission on Higher Education

Academic programs that did not meet the enrollment productivity standard and did not show progress toward the enrollment standard during the 2000 and 2005 timeframe include:

- ◆ Agriculture and Agribusiness, Master of Science Degree
- ◆ Special Education, Master of Science Degree
- ◆ Art Education, Bachelor of Science Degree
- ◆ Industrial Education, Bachelor of Science
- ◆ Human Development Consultant, Certification
- ◆ Social Sciences, Bachelor of Arts
- ◆ Rehabilitation/Therapeutic Services, Certification.

Academic programs that did not meet the completion productivity standard and did not show progress toward meeting the completion standard during the 2000 and 2005 timeframe include:

- ◆ Agribusiness, Bachelor of Arts
- ◆ Economics/Business Economics, Bachelor of Science
- ◆ Business Education, Bachelor of Science
- ◆ Family and Consumer Sciences, Bachelor of Science (CIP 13308)
- ◆ Art Education K-12, Bachelor of Science
- ◆ Special Education, Bachelor of Science
- ◆ Music Education, Bachelor of Science
- ◆ Human Development Consultant, Certification
- ◆ Rehabilitation and Therapeutic Services, Certification
- ◆ Sociology, Bachelor of Arts
- ◆ Social Sciences, Bachelor of Arts
- ◆ Dramatic Arts, Bachelor of Arts
- ◆ Industrial Education, Bachelor of Science

Another level of analysis to consider is to examine the programs that met the enrollment and completion standards because their five-year average is at or above the state standard, but their enrollment and completion data for the last year available are below the state standards. In 2004-05 there were two programs that had five-year enrollment averages above the state enrollment standard but their 2004-05 enrollment numbers were below the standard. The two programs with 2004-05 enrollment numbers below the enrollment standard were:

- ◆ Agribusiness, Bachelor of Science
- ◆ Family and Consumer Science, Bachelor of Science (CIP 13308).

Similarly, in 2004-05 there were two programs that had five-year completion averages above the state completion standard but their 2004-05 completion numbers were below the standard. The two programs with 2004-2005 completion numbers below the completion standard were:

- ◆ Nutrition and Food Management, Bachelor of Science
- ◆ History, Bachelor of Arts.

When considering program productivity and overall academic quality, the two possible decisions to be made are program elimination or program improvement. Determining whether to invest in a program or to eliminate a program should include a variety of other factors. Other factors to consider are whether the program meets a unique need and if there are programs at other institutions that are capable of meeting that need.

HOW DO SOUTH CAROLINA STATE UNIVERSITY'S ACADEMIC PROGRAMS COMPARE WITH OTHER LIKE INSTITUTIONS?

South Carolina State University is a very unique institution when compared to other postsecondary institutions in South Carolina. As an 1890 land grant institution, it is involved in research and occupationally related education. As a historically black university, it has a unique mission to serve first-generation, low-income, African American students. As a teaching institution, it is expected to provide high-quality academic programs for students. This unique mission can raise the question of whether the institution is doing too much and should focus its efforts.

SCSU stakeholders have great pride in the university, but several of them questioned what the institution's academic niche is that distinguishes it from other institutions. The academic review took the first step in this process by examining the extent that SCSU academic programs have competitor programs at other South Carolina postsecondary institutions. Understanding where SCSU has a unique academic niche when compared to other institutions, particularly in academic programs related to high demand jobs, provides insight into how the institution might appropriate its academic resources.

PROGRAM COMPETITION

Examining academic programs in light of other similar program offerings available to students can provide a valuable piece of information when making decisions about investing or eliminating programs. Determining which programs are indeed “competitors” can be a bit more complicated than merely matching program titles and names. For the purposes of the academic review, data was collected from the South Carolina Commission on Higher Education to identify similar programs at other institutions through an analysis of Classification of Instruction Program (CIP) codes. CIP codes are assigned to academic programs and courses to comply with a U.S. Department of Education taxonomy of academic offerings that enables organized data collection for the National Center for Education Statistics. Competitive programs were classified as those programs at other South Carolina postsecondary institutions that shared the same CIP code as a program offered by South Carolina State University. The following tables show each of the programs offered by South Carolina State University and the number of programs at other South Carolina postsecondary institutions which offer the same or a similar degree.

Table 4 reveals the number of other options that South Carolina students have as they consider academic programs in the College of Business and Applied Professional Sciences (BPS).

Several programs in BPS have few counterparts at other institutions. Both the BS and MS degrees in Agribusiness, the Master in Business Administration, Business Education BS, Family and Consumer Science Education BS, Individual and Family Development MS, Nutrition and Food Management BS, Nutritional Sciences MS, and Speech Pathology and Audiology BA and MA are all fairly unique programs among South Carolina colleges and universities.

In the case of the Master in Business Administration (MBA) where there is only one other program identified as a direct competitor, it is important to note that the CIP for the MBA offered by South Carolina State University is qualified as an MBA in general business and commerce and indeed there is only one other program in the state with that CIP code. However, there are 11 MBA programs at other South Carolina colleges and universities with a CIP code qualified as Business Administration/Management.

You would expect that those academic programs in BPS that have limited competition from other postsecondary institutions would have robust student enrollments. However, the Agribusiness BS and MS degrees and the Music Merchandising BA are having difficulty meeting state enrollment standards despite having little competition from other South Carolina colleges and universities.

Other programs in BPS have a high degree of competition from other colleges. There are several programs that have competitors at both four-year and two-year universities. For example, the Accounting BS and the Nursing BSN have competition from two-year programs at the state technical colleges. The Business Management degree also has competition from two-year colleges as well as from different degree offerings at four-year institutions.

Table 4: Number of Programs at other South Carolina Postsecondary Institutions that offer the same or similar degrees as South Carolina State University College of Business and Applied Professional Sciences Programs

CIP Code	Major	Number of South Carolina Postsecondary Institutions Offering the Same Degree or Certification	
		Number of South Carolina Postsecondary Institutions Offering the Same Degree	Number of South Carolina Postsecondary Institutions Offering a Similar Degree or Certification
52.0301	Accounting (BS)	15	15
01.0102	Agribusiness (BS)	1	0
01.0102	Agribusiness (MS)	0	0
52.0101	Business Administration (MBA)	1	0
13.1303	Business Education (BS)	1	0
52.0601	Economics/ Business Economics (BS)	7	2
13.1308	Family and Consumer Sciences Education (BS)	1	0
19.0701	Individual and Family Development (MS)	1	0
52.0201	Management (BS)	21	16
52.1401	Marketing (BS)	7	2
51.1601	Nursing (RN TO BSN Completion) (BSN)	7	1
51.1601	Nursing (BSN)	7	11
19.0501	Nutrition and Food management (BS)	1	0
19.0501	Nutritional Sciences (MS)	1	0
31.0501	Physical Education (BS)	6	3
50.1204	Speech Pathology and Audiology (BA)	0	1
50.1204	Speech Pathology and Audiology (MA)	0	1
50.0909	Music Merchandising (BA)	1	0

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Table 5 shows data regarding College of Education, Humanities and Social Sciences (EHS) program offerings that can be found at other institutions. Once again there are several SCSU programs where there are few counterparts at other South Carolina postsecondary institutions. Most noteworthy is the number of master's degree programs in specific secondary education content areas and the doctorates in education administration. In the cases where the programs are qualified as similar, but not the same as degree offerings at SCSU, it usually is due to a program offering a BA degree rather than a BS degree in that program area.

The Art Education K-12 BS program is the one EHS program where there is little competition and is having difficulty meeting enrollment standards.

Table 5: Number of Programs at other South Carolina Postsecondary Institutions that offer the same or similar degrees as South Carolina State University College of Education, Humanities and Social Sciences

CIP Code	Major	Number of South Carolina Postsecondary Institutions Offering the Same Degree	Number of South Carolina Postsecondary Institutions Offering a Similar Degree or Certification
13.1302	Art Education K-12 (BS)	2	7
13.1101	Counselor Education (MEd)	3	1
43.0103	Criminal Justice (BS)	7	8
50.0501	Dramatic Arts (BA)	13	1
13.0121	Early Childhood Education (BS)	9	12
13.0121	Early Childhood Education (MAT)	5	1
13.0401	Education Administration (EdD)	2	0
13.0401	Education Administration (EdS)	4	0
13.0401	Educational Administration (EDd)	0	0
13.1202	Elementary Education (BS)	16	12
13.1202	Elementary Education (MAT)	5	0
13.1202	Elementary Education (MEd)	10	0
23.0101	English, Professional (BA)	30	0
54.0101	History (BA)	27	0
19.0701	Human Development Consultant (CERT)	1	0
13.1203	Middle Level Education (BS)	5	5
16.0101	Modern Languages (BA)	6	0
13.1312	Music Education (BS)	3	12
13.1314	Physical Education (BS)	13	0
45.1001	Political Science and Government (BA)	20	1
42.0101	Psychology, General (BS)	15	8
51.2399	Rehabilitation Counseling (MA)	0	2
51.2399	Rehabilitation/ Therapeutic Services (PMCert)	0	2
13.1205	Secondary Education and Teaching, Business (MEd)	0	0
13.1205	Secondary Education and Teaching, Chemistry (MEd)	0	0
13.1205	Secondary Education and Teaching, English (MAT)	2	1
13.1205	Secondary Education and Teaching, English (MEd)	1	0
13.1205	Secondary Education and Teaching, Mathematics (MAT)	3	1
13.1205	Secondary Education and Teaching, Mathematics (MEd)	1	0
13.1205	Secondary Education and Teaching, Science (MAT)	1	0
13.1205	Secondary Education and Teaching, Science (MEd)	1	0
13.1205	Secondary Education and Teaching, Social Studies (MEd)	1	2
13.1205	Secondary Education, General (MEd)	5	2
13.1101	Secondary School Counseling (MEd)	3	1
45.0101	Social Sciences (BA)	3	3
44.0701	Social Work (BSW)	3	0
44.0701	Social Work and Helping Services (BSW)	3	8
45.1101	Sociology (BA)	15	4
13.1001	Special Education (BS)	9	5
13.1001	Special Education (MEd)	6	0
50.0702	Studio Arts (BA)	9	0

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The College of Mathematics, Science and Engineering Technology (SME) has many programs where there is a high degree of competition from other programs as well as several programs where SCSU's offerings are quite unique. Table 6 illustrates the competition for SME programs. Examples of programs that are unique are the various engineering technology programs where there are no other comparable BS programs in South Carolina. However, there are several two-year programs at state technical colleges that are similar in content area to these programs. Other programs that are unique to SCSU include: Industrial Education, Nuclear Engineering and Transportation.

The Industrial Education program is the one degree offering in SME that has little competition from other South Carolina postsecondary institutions and yet is struggling to meet state standards for enrollment.

Table 6: Number of Programs at other South Carolina Postsecondary Institutions that offer the same or similar degrees as South Carolina State University College of Mathematics, Science and Engineering Technology

CIP Code	Major	Number of South Carolina Postsecondary Institutions Offering the Same Degree	Number of South Carolina Postsecondary Institutions Offering a Similar Degree or Certification
26.0101	Biology (BS)	28	2
40.0501	Chemistry (BS)	23	1
15.0201	Civil Engineering Technology (BS)	0	7
11.0101	Computer Science (BS)	14	1
15.0303	Electrical Engineering Technology (BS)	0	11
3.0103	Environmental Science/ Studies (PB)	3	0
19.0101	Family and Consumer Sciences Business (BS)	0	0
13.1309	Industrial Education (BS)	1	0
15.0612	Industrial Engineering Technology (BS)	0	0
27.0101	Mathematics (BS)	24	3
15.0805	Mechanical Engineering Technology (BS)	0	5
14.2301	Nuclear Engineering (BS)	0	1
40.0801	Physics (BS)	12	0
52.0209	Transportation (MS)	0	0

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Taken together, the level of productivity of academic programs and the amount of competition those programs have from other postsecondary institutions provides a great deal of information about the viability of programs and whether they are worthy of further investment or possible elimination. However, it should not go unstated that many programs which are not meeting state productivity standards and also are in competition with other programs throughout the state should not be dismissed as simply ineffective programs. In the case of traditional academic areas such as sociology, history, chemistry and physics; there may be larger systemic issues that negatively impact their success. In particular, the poor academic preparation of students entering many programs can negatively impact the success of these programs. In programs that require strong skills in mathematics, reading and writing; there may be a significant disincentive for students to enroll in those programs because of the difficulties they will have to complete degrees. The data on academic

preparation of South Carolina State University is an important dimension to the success and failure of various programs.

WHICH OPPORTUNITIES DO SOUTH CAROLINA STATE UNIVERSITY STUDENTS NEED PREPARATION FOR UPON GRADUATION?

One of the most often repeated phrases during conversations with SCSU stakeholders was their desire to see SCSU educate “well-rounded students.” While what was meant by “well-rounded” differed slightly from group to group, there were remarkable similarities across most of the groups. According to those who we met with, a “well-rounded” student is someone who has:

- ◆ Strong reading and writing skills
- ◆ Life skills such as personal financial management, decisionmaking skills and an understanding of what needs to be done to have a high quality of life
- ◆ Public speaking skills
- ◆ Workforce readiness skills to include interviewing, presentation skills, appropriate dress for a workplace and proper etiquette
- ◆ A global perspective to include an understanding of different cultures and ideally second language skills.

While students who possess these skills are always in high demand, the alignment of the skills and knowledge gained from the various academic programs at SCSU with regional workforce demand is a necessary exercise for assessing academic program quality.

ACADEMIC PROGRAM ALIGNMENT WITH WORKFORCE DEMAND

The alignment of academic programs with the occupations in South Carolina that are in most demand and are the fastest growing provides yet another way to consider the future viability of programs.

Data on both the fastest growing jobs in South Carolina from 2004-14 and the jobs in South Carolina with the largest number of openings in 2004 were compiled from the Bureau of Labor Statistics Office of Occupational Statistics and Employment Projections. The parameters of the data collection were to include jobs that are projected to grow by at least 10% by 2014 and where there were 20 or more jobs available in 2004. The jobs that met either of these parameters were then aligned with South Carolina State University academic program offerings using the Occupation Crosswalk Database developed by the National Center for Education Statistics. The Occupation Crosswalk Database aligns Bureau of Labor Statistics job titles with the CIP codes representing postsecondary academic program areas. The result is a direct link between high demand jobs in South Carolina and the academic program offerings at SCSU.

ALIGNMENT WITH HIGH DEMAND JOBS IN SOUTH CAROLINA

The first measure examines the alignment of academic programs to the number of job openings that require a bachelor's degree or higher reported in 2004 to the U.S. Bureau of Labor Statistics. This measure will typically reveal the larger occupations in the state of South Carolina and is not necessarily a measure of growth in a particular job sector.

Table 7 illustrates the alignment of academic programs in the College of Business and Professional Sciences (BPS) with the highest demand jobs in 2004. The analysis reveals that 10 of the 18 academic programs have at least one occupation strongly aligned to it. In particular, business related programs showed strong alignment with available opportunities.

Table 7: College of Business and Professional Sciences Academic Programs Aligned with Highest Demand Jobs in South Carolina that Require a Bachelor's Degree, 2004

CIP Code	Major	Bureau of Labor Statistics Job Title	Employment 2004	Job Openings
52.0301	Accounting (BS)	Accountants & Auditors	12,470	110
		Credit Analysts	540	20
52.0101	Business Administration (MBA)	Social & Community Service Managers	1,050	30
		Chief Executives	10,000	140
		Sales Managers	5,070	160
		Management Analysts	5,400	150
		Administrative Services Managers	5,420	120
		Construction Managers	7,260	110
13.1303	Business Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	380
52.0601	Economics/ Business Economics (BS)	Market Research Analysts	1,000	10
13.1308	Family and Consumer Sciences Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	380
		Middle School Teachers, Except Special & Vocational Education	8,270	170
52.0201	Management (BS)	Social & Community Service Managers	1,050	30
		Chief Executives	10,000	140
		General & Operations Managers	30,340	1,080
		Sales Managers	5,070	160
		Management Analysts	5,400	150
		Administrative Services Managers	5,420	120
52.1401	Marketing (BS)	Construction Managers	7,260	110
		Marketing Managers	1,710	30
		Sales Managers	5,070	160
51.1601	Nursing (BSN), (RSN to BSN)	Advertising & Promotions Managers	790	10
		Registered Nurse	31,390	1,650
19.0501	Nutrition and Food management (BS)	Dietitians & Nutritionists	790	10
19.0501	Nutritional Sciences (MS)	Dietitians & Nutritionists	790	10

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There are two caveats to the data that should be considered. Data on education programs in specific content areas do not illustrate the number of job openings in those specific content areas. Instead, the data only reveal the total number of teaching jobs available in South Carolina for the relevant grade levels for the listed academic programs. In the case of the Business Education BS and Family and Consumer Sciences Education BS degrees, the data do not reveal a direct demand for business education or family and consumer science teachers. The data merely reveal the demand for secondary school teachers and middle school teachers in general.

A second caveat to the data was the inclusion of registered nurses in the analysis despite the fact that a bachelor's degree is not required for that position. As a result, this analysis does not reflect the demand for bachelor's of science degrees in nursing (BSN) and instead represents demand for Associate's degrees in nursing. The rationale for breaking from the standard methodology for nursing was that the number of jobs available and the growth of jobs in nursing that will ensue are so great, it was logical to assume that the management skills and knowledge taught in the BSN program would also be in high demand.

There were several academic programs that were not represented in the highest-demand job analysis for BPS. Among them were the Agribusiness BS and MS degrees, Individual and Family Development MS, Physical Education BS, Speech Pathology and Audiology BA and MA, and the Music Merchandising BA. Of particular note are the Agribusiness degrees that the previous analysis revealed have not met productivity targets despite the fact that there is no direct competition for those degrees from other postsecondary institutions.

Table 8 demonstrates the alignment of College of Education, Humanities and Social Sciences (EHS) academic programs with South Carolina workforce demand. Twenty-five of the 41 academic programs are aligned with high demand jobs in South Carolina. A large number of the degree programs that are aligned with workforce demand are the various education programs. Once again it should be noted that with regard to education programs in specific content areas, the data do not reflect specific demand for teaching jobs in those content areas and instead reflect demand for teaching jobs in general. The only exception to this analysis is the demand for special education degrees where the data reveal specific demand for special education teachers.

Table 8: College of Education, Humanities and Social Science Academic Programs Aligned with Highest Demand Jobs in South Carolina that Require a Bachelor's Degree, 2004

CIP Code	Major	Bureau of Labor Statistics Job Title	Employment 2004	Job Openings
13.1101	Counselor Education (MEd)	Educational, Vocational, & School Counselors	3,410	160
50.0501	Dramatic Arts (BA)	Producers & Directors	570	20
13.1202	Elementary Education (BS), (MAT), (MEd)	Elementary School Teachers, Except Special Education	16,470	730
13.1302	Art Education K-12 (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	680
		Middle School Teachers, Except Special & Vocational Education	8,270	370
13.1203	Middle Level Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	680
		Middle School Teachers, Except Special & Vocational Education	8,270	370
13.1312	Music Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	680
		Middle School Teachers, Except Special & Vocational Education	8,270	370
13.1314	Physical Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	680
		Middle School Teachers, Except Special & Vocational Education	8,270	370
42.0101	Psychology, General (BS)	Clinical, Counseling, & School Psychologists	2,250	100
13.1205	Secondary Education and Teaching, Business (MEd)	Secondary School Teachers, Except Special & Vocational Education	13,410	680
13.1205	Secondary Education and Teaching, Chemistry (MEd)			
13.1205	Secondary Education and Teaching, English (MAT)			
13.1205	Secondary Education and Teaching, English (MEd)			
13.1205	Secondary Education and Teaching, Mathematics (MAT)			
13.1205	Secondary Education and Teaching, Mathematics (MEd)			
13.1205	Secondary Education and Teaching, Science (MAT)			
13.1205	Secondary Education and Teaching, Science (MEd)			
13.1205	Secondary Education and Teaching, Social Studies (MEd)			
13.1205	Secondary Education, General (MEd)			
13.1101	Secondary School Counseling (MEd)			
44.0701	Social Work (BSW) and Social Work and Helping Services (BSW)	Child, Family, & School Social Workers	3,450	130
		Probation Officers & Correctional Treatment Specialists	530	20
13.1001	Special Education (BS), (MEd)	Special Education Teachers, Secondary School	1,090	50
		Special Education Teachers, Preschool, Kindergarten, & Elementary School	2,670	120
		Special Education Teachers, Middle School	950	40

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According to the analysis, there are several EHS academic programs that are not identified with high demand jobs in South Carolina, they include:

- ◆ Criminal Justice, Bachelor of Science
- ◆ Early Childhood Education, Bachelor of Science and Master of Arts in Teaching
- ◆ English, Professional, Bachelor of Arts
- ◆ History, Bachelor of Arts
- ◆ Human Development, Certification
- ◆ Modern Languages, Bachelor of Arts
- ◆ Political Science and Government, Bachelor of Arts
- ◆ Rehabilitation Counseling, Master of Arts
- ◆ Rehabilitation and Therapeutic Services, Post Master's Certification
- ◆ Social Sciences, Bachelor of Arts
- ◆ Sociology, Bachelor of Arts
- ◆ Studio Arts, Bachelor of Arts.

A number of the programs that are not aligned with high demand jobs are among those that have had difficulties meeting state productivity standards. Programs that fall into this category include: Human Development certification, Rehabilitation and Therapeutic Services PMCert, Sociology BS, Social Sciences BA and Studio Arts BA.

Table 9 illustrates the alignment of College of Mathematics, Science and Engineering Technology (SME) programs with South Carolina workforce demand. Five of the 13 academic programs in SME are aligned with the South Carolina jobs in highest demand. The Transportation MS and the Industrial Education BS are aligned with occupation categories that are broader than the specific content area of their degree. Further analysis would need to be done to assess the specific demand for Industrial Education and Transportation degrees.

Table 9: College of Science, Mathematics and Engineering Technology Academic Programs Aligned with Highest Demand Jobs in South Carolina that Require a Bachelor's Degree, 2004

CIP Code	Major	Bureau of Labor Statistics Job Title	Employment 2004	Job Openings
40.0501	Chemistry (BS)	Chemists	1,170	40
11.0101	Computer Science (BS)	Network & Computer Systems Administrators	2,160	60
		Computer & Information Systems Managers	2,790	90
		Network Systems & Data Communications Analysts	2,860	80
		Computer Systems Analysts	3,980	100
		Database Administrators	700	20
13.1309	Industrial Education (BS)	Vocational Education Teachers, Secondary School	1,540	80
		Secondary School Teachers, Except Special & Vocational Education	13,410	680
		Vocational Education Teachers, Middle School	490	20
		Middle School Teachers, Except Special & Vocational Education	8,270	370
14.2301	Nuclear Engineering (BS)	Nuclear Engineers	1,220	50
		Engineering Managers	2,700	80
52.0209	Transportation (MS)	Chief Executives	10,000	340

South Carolina Commission on Higher Education and U.S. Bureau of Labor Statistics

SME academic programs that are not aligned with high demand jobs in South Carolina which require a bachelor's degree include:

- ◆ Biology, Bachelor of Science
- ◆ Civil Engineering Technology, Bachelor of Science
- ◆ Electrical Engineering Technology, Bachelor of Science
- ◆ Environmental Science/Studies, Bachelor of Science
- ◆ Industrial Engineering Technology, Bachelor Science
- ◆ Mathematics, Bachelor of Science
- ◆ Mechanical Engineering Technology, Bachelor of Science
- ◆ Physics, Bachelor of Science.

Noticeably missing from the list of majors aligned with workforce demand are the various engineering technology programs. The jobs aligned with the engineering technology degrees typically require an Associate's degree as the minimum educational credential required for employment and, as a result, those occupations are not surfaced through this analysis.

The Physics BS is the one academic program in SME that has not met state productivity standards that is not aligned with the highest demand jobs in South Carolina.

ALIGNMENT WITH FASTEST GROWING JOBS IN SOUTH CAROLINA

The second measure of demand for SCSU academic programs examines the alignment of SCSU academic programs with the fastest growing jobs in South Carolina. The analysis reveals those academic programs that are well positioned to meet the needs of occupations that are expected to grow at least 10% between 2004 and 2014. Different from the highest demand jobs, this analysis projects future need and also is focused on those programs that will have the highest percent increase relative to the current number of jobs available in that occupation. As a result, this analysis will surface smaller niche occupations that may not have a large number of jobs available, but are a growing industry in South Carolina.

Table 10 describes the extent that the academic programs in the College of Business and Applied Professional Sciences (BPS) aligned with the fastest growing jobs in South Carolina that require at least a bachelor's degree. Thirteen of the 18 academic programs in BPS are aligned with the fastest-growing jobs in South Carolina. Many of the same academic programs and jobs that were present in the analysis of high-demand jobs are present in this analysis. Academic programs that are represented in the fastest-growing jobs analysis that were not among the highest-demand jobs include: Economics/Business Economics BS, Family and Consumer Sciences Business BS and Music Merchandising BA.

Table 10: College Business and Applied Professional Sciences Academic Programs Aligned with the Fastest Growing Jobs in South Carolina that Require a Bachelor's Degree, 2004-14

CIP Code	Major	Bureau of Labor Statistics Job Title	2004 Employment	2014 Employment	Percent Change
52.0301	Accounting (BS)	Accountants & Auditors	12,470	14,230	14%
		Budget Analysts	430	490	16%
		Credit Analysts	540	620	14%
		Financial Examiners	220	280	27%
		Tax Examiners, Collectors, & Revenue Agents	330	380	17%
52.0101	Business Administration (MBA)	Administrative Services Managers	5,420	6,580	21%
		Chief Executives	10,000	11,470	15%
		Construction Managers	7,260	9,050	25%
		Management Analysts	5,400	6,120	13%
		Sales Managers	5,070	5,780	14%
		Social & Community Service Managers	1,050	1,320	26%
13.1303	Business Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
52.0601	Economics/ Business Economics (BS)	Economists	140	170	18%
		Market Research Analysts	1,000	1,160	16%
19.0101	Family and Consumer Sciences Business (BS)	Farm & Home Management Advisors	230	270	20%
13.1308	Family and Consumer Sciences Education (BS)	Middle School Teachers, Except Special & Vocational Education	8,270	10,120	23%
		Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
52.0201	Management (BS)	Administrative Services Managers	5,420	6,580	21%
		Chief Executives	10,000	11,470	15%
		Construction Managers	7,260	9,050	25%
		General & Operations Managers	30,340	35,390	17%
		Management Analysts	5,400	6,120	13%
		Sales Managers	5,070	5,780	14%
		Social & Community Service Managers	1,050	1,320	26%
52.1401	Marketing (BS)	Advertising & Promotions Managers	790	940	19%
		Marketing Managers	1,710	1,960	15%
		Sales Managers	5,070	5,780	14%
50.0909	Music Merchandising (BA)	Music Directors & Composers	320	390	23%
51.1601	Nursing (BSN), (RN to BSN)	Registered Nurse	31,390	41,320	32%
19.0501	Nutrition and Food management (BS)	Dietitians & Nutritionists	790	1,000	26%
19.0501	Nutritional Sciences (MS)	Dietitians & Nutritionists	790	1,000	26%

South Carolina Commission Higher Education and U.S. Bureau of Labor Statistics

The five programs that are not represented in either the highest-demand jobs or the fastest-growing jobs in South Carolina are: Agribusiness BS and MS, Individual and Family Development MS, and the Speech Pathology and Audiology BA and MA. The Agribusiness and Individual and Family Development Degrees are also among those programs that have not met state productivity standards.

Table 11: College of Education, Humanities, Social Science Academic Programs Aligned with the Fastest Growing Jobs in South Carolina that Require a Bachelor's Degree, 2004-2014

CIP Code	Major	Bureau of Labor Statistics Job Title	2004 Employment	2014 Employment	Percent Change
13.1101	Counselor Education (MEd)	Educational, Vocational, & School Counselors	3,410	4,210	24%
50.0501	Dramatic Arts (BA)	Producers & Directors	570	700	23%
13.1202	Elementary Education (BS), (MAT), (MEd)	Elementary School Teachers, Except Special Education	16,470	20,180	23%
13.1302	Art Education K-12 (BS)	Middle School Teachers, Except Special & Vocational Education	8,270	10,120	23%
		Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
13.1203	Middle Level Education (BS)	Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
		Middle School Teachers, Except Special & Vocational Education	8,270	10,120	23%
13.1312	Music Education (BS)	Middle School Teachers, Except Special & Vocational Education	8,270	10,120	23%
		Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
13.1314	Physical Education (BS)	Middle School Teachers, Except Special & Vocational Education	8,270	10,120	23%
		Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
13.1205	Secondary Education and Teaching; Business (MEd),	Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
13.1205	Secondary Education and Teaching, English (MAT)				
13.1205	Secondary Education and Teaching, English (MEd)				
13.1205	Secondary Education and Teaching, Mathematics (MAT)				
13.1205	Secondary Education and Teaching, Mathematics (MEd)				
13.1205	Secondary Education and Teaching, Science (MAT)				
13.1205	Secondary Education and Teaching, Science (MEd)				
13.1205	Secondary Education and Teaching, Social Studies (MEd)				
13.1205	Secondary Education, General (MEd)				
13.1101	Secondary School Counseling (MEd)	Educational, Vocational, & School Counselors	3,410	4,210	24%
42.0101	Psychology, General (BS)	Clinical, Counseling, & School Psychologists	2,250	2,800	24%
44.0701	Social Work (BSW) and Social Work and Helping Services (BSW)	Child, Family, & School Social Workers	3,450	4,180	21%
		Marriage & Family Therapists	120	150	32%
		Probation Officers & Correctional Treatment Specialists	530	620	17%
13.1001	Special Education (BS), (MEd)	Special Education Teachers, Middle School	950	1,160	22%
		Special Education Teachers, Preschool, Kindergarten, & Elementary School	2,670	3,270	23%
		Special Education Teachers, Secondary School	1,090	1,340	23%

South Carolina Commission on Higher Education and U.S. Bureau of Labor Statistics

Table 11 represents the alignment of academic programs in the College of Education, Humanities and Social Sciences (EHS) with the fastest growing jobs in South Carolina. Twenty-five of 41 academic programs in EHS are aligned with jobs that are among the fastest growing in South Carolina. The programs and jobs represented in this analysis are the same as the jobs and programs identified in the alignment of academic programs with high demand jobs. As a result, the same programs that were not represented among the highest demand jobs analysis are not represented among the fastest growing jobs.

Table 12: College of Science, Mathematics and Engineering Technology Academic Programs Aligned with the Fastest Growing Jobs in South Carolina that Require a Bachelor's Degree, 2004-14

CIP Code	Major	Bureau of Labor Statistics Job Title	2004 Employment	2014 Employment	Percent Change
11.0101	Computer Science (BS)	Computer & Information Scientists, Research	230	270	18%
		Computer & Information Systems Managers	230	270	18%
		Computer Systems Analysts	3,980	4,520	14%
		Database Administrators	700	810	15%
		Network & Computer Systems Administrators	2,160	2,490	16%
		Network Systems & Data Communications Analysts	2,860	3,310	16%
13.1309	Industrial Education (BS)	Middle School Teachers, Except Special & Vocational Education	8,270	10,120	23%
		Secondary School Teachers, Except Special & Vocational Education	13,410	16,430	23%
		Vocational Education Teachers, Middle School	490	600	23%
		Vocational Education Teachers, Secondary School	1,540	1,880	23%
27.0101	Mathematics (BS)	Statisticians	130	150	18%
14.2301	Nuclear Engineering (BS)	Nuclear Engineers	1,220	1,360	11%
52.0209	Transportation (MS)	Administrative Services Managers	5,420	6,580	21%
		Chief Executives	10,000	11,470	15%

South Carolina Commission on Higher Education and U.S. Bureau of Labor Statistics

Table 12 represents the alignment of College of Science, Mathematics and Engineering Technology (SME) academic programs with the fastest growing jobs in South Carolina. Five of 14 academic programs in SME are aligned with the fastest growing jobs. Four of the five programs aligned with the fastest growing jobs were also aligned with high demand jobs. The Mathematics BS is the one program that is represented in the fastest growing professions that was not on the high demand list. The Chemistry BS, which was represented on the high demand list, is not represented on the list of academic programs in the fastest growing analysis.

The three engineering technology programs and the Physics BS programs are not represented on the fastest growing jobs academic program analysis.

DEMAND IN EDUCATION, ENGINEERING AND NURSING

The Bureau of Labor Statistics analysis reveals the need to conduct further study in the areas of education, engineering technology and nursing.

TEACHER EDUCATION SUPPLY AND DEMAND

While the analysis of Bureau of Labor Statistics data provides some general trends about the demand for teachers in South Carolina, further analysis is required to understand the demand for the specific programs offered by SCSU. To better understand demand for the various teacher education programs offered by SCSU, the annual Supply and Demand Survey conducted by the Center for Educator Recruitment, Retention & Advancement (CERRA) was consulted. The Supply and Demand Survey annually reports on the number of new hires and vacancies that exist in South Carolina school districts.⁸ Table 13 illustrates vacancies for various teaching positions that are aligned with SCSU academic programs.

Table 13: 2006-07 Job Vacancies in South Carolina School Districts for SCSU Teacher Education Program Disciplines, by Grade Level

CIP Code	Major	Teaching Position	Elementary	Middle	Secondary	Total
13.1202	Elementary Education (BS), (MAT), (MEd)	Early Childhood/Elementary	86.5			86.5
13.1302	Art Education K-12 (BS)	Art	6	0	3	9
13.1308	Family and Consumer Sciences Education (BS)	Family and Consumer Science		1	2	3
13.1309	Industrial Education (BS)	Industrial Technology		1	0	1
13.1312	Music Education (BS)	Music/Band/Chorus	16	7	5.5	28.5
13.1314	Physical Education (BS)	Physical Education	7	0	2	9
13.1205	Secondary Education and Teaching, Business (MEd)	Business Education - including Accounting, Keyboarding and Marketing				
13.1303	Business Education (BS)			2	3	5
13.1205	Secondary Education and Teaching, Chemistry (MEd)	Chemistry			3	3
13.1205	Secondary Education and Teaching, English (MAT), (Med)	English/Language Arts		27	23	50
13.1205	Secondary Education and Teaching, Mathematics (MAT), (MEd)	Mathematics		24.5	51	75.5
13.1205	Secondary Education and Teaching, Science (MAT), (MEd)	Science		32	27.8	59.8
13.1205	Secondary Education and Teaching, Social Studies (MEd)	Social Studies		16	12.5	28.5
13.1101	Secondary School Counseling (MEd)	Guidance		5.5	6	11.5
13.1001	Special Education (BS), (MEd)	Special Education - All Categories*	56.3	49	47	152.3
		TOTALS	171.8	165	185.8	522.6

CERRA, 2007

The CERRA data provides a great deal more specificity to the current demand for teacher education graduates in South Carolina. Not surprisingly, mathematics, science and special education were disciplines in high demand. In addition, music, English and social studies have a reasonable level of demand. The data also suggests sufficient demand for early childhood educators, although specific demand remains difficult to gauge given that early childhood educators are combined with elementary educators in the Supply and Demand survey.

The Supply and Demand Survey reveals that the two education programs, Art Education and Industrial Education, which have had low enrollment and completion rates at SCSU, have limited demand for their graduates. In the case of Industrial Education, the data is inconsistent with the Bureau of Labor Statistics data that did show demand for vocational educators.

Programs that had relatively low demand for 2006-07 include:

- ◆ Art Education K-12, Bachelor of Science
- ◆ Family and Consumer Sciences Education, Bachelor of Science
- ◆ Industrial Education, Bachelor of Science
- ◆ Physical Education, Bachelor of Science
- ◆ Secondary Education and Teaching-Business, Master of Education/
Business Education, Bachelor of Science
- ◆ Secondary Education and Teaching, Chemistry, Master of Education.

The CERRA survey should be a valuable resource for SCSU to track demand for teacher education programs into the future.

ENGINEERING TECHNOLOGY SUPPLY AND DEMAND

Demand for engineering technology is represented in the Bureau of Labor Statistics, but not in the category of professions that require a bachelor's degree. With several engineering technology options available at state technical colleges, there is a need to understand the specific niche that SCSU engineering technology programs fill in the South Carolina and larger regional economy.

Further analysis needs to be done to understand the demand for the bachelor's degree programs in engineering technology to determine if students with engineering technology bachelor's degrees earn higher wages and fill higher-level positions than their technical college counterparts. In addition, some assessment should be done to determine if bachelor's degree engineering technology graduates eventually transfer into full engineering programs and graduate from those programs at the same or higher rate than technical college graduates.

It is clear that many students are choosing engineering technology as a major at SCSU, what is unclear are the benefits that their degree affords them once they graduate.

SUPPLY AND DEMAND IN NURSING

Registered nurses are one of the highest-demand professions in South Carolina and the nation as a whole. But like engineering technology, a technical college degree is sufficient to find a job in the nursing profession. What is unclear is the demand for nurses with a bachelor's of nursing degree (BSN). The emphasis on managerial and administrative responsibilities that are featured in the BSN suggests that there is a career ladder for a nurse that includes management responsibilities. What is unclear is the level of demand for those skills. It is reasonable to assume that demand does exist for BSN degrees. However, a clearer picture of demand for BSN graduates may help market and make the case for further investment in the SCSU nursing program. Nursing could be a signature program at SCSU if it is able to maximize its value as a high demand field.

Further analysis should include an examination of the demand for BSN graduates, the market of individuals who desire this degree and the delivery models that would best reach those individuals.

SOUTH CAROLINA STATE UNIVERSITY FACULTY

College faculty are critical to the education process. Their experience as educators and expertise in their disciplines must be aligned with the needs of the students and the economic opportunities they will face when they enter the workforce. As we have seen, the supply of students entering South Carolina State University will require faculty to be highly engaged in the fundamental college skills that students need to be successful. Unfortunately, most colleges and universities do not measure the quality of their faculty based on their ability to graduate students with a measurable set of skills, knowledge and dispositions that they will need to be successful. As a result, it is difficult to measure the extent that any given faculty member is ideally suited for the students that enter his or her classroom.

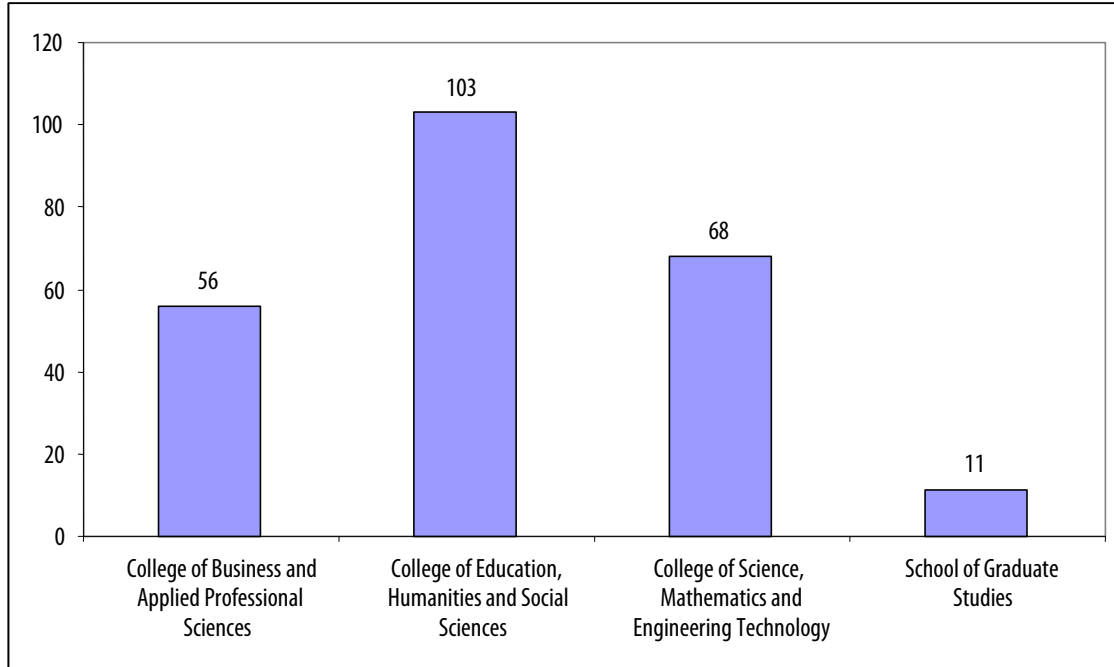
Given the limitations of the data available to us, it is important, nevertheless, to be familiar with the data available about a college's faculty.

DISTRIBUTION OF FACULTY

DISTRIBUTION OF FACULTY PER COLLEGE

Figure 10 reveals the number of faculty with appointments at South Carolina State University by college. The faculty included in this count include faculty with permanent appointments and visiting appointments.

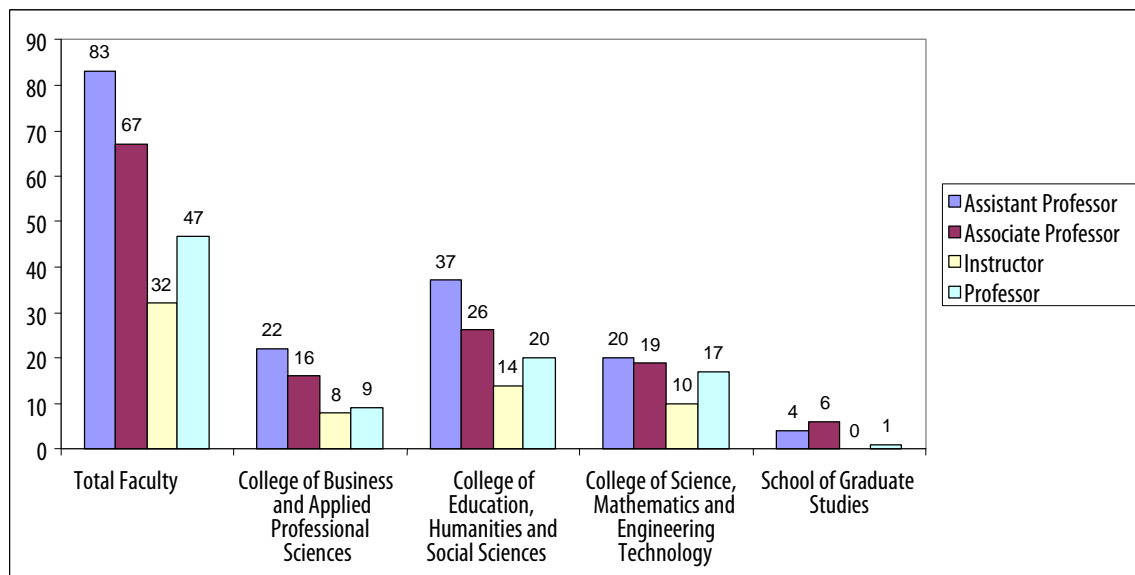
Figure 10: Faculty Count by College, Fall 2006



South Carolina State University, Academic Affairs

Of the faculty who are on permanent appointments, the distribution by faculty status is represented in Figure 11. The data reveal that the largest segment is faculty who are qualified as Assistant Professor, followed by Associate Professor and Professor. The College of Science, Mathematics and Engineering Technology has the most even distribution of faculty by status.

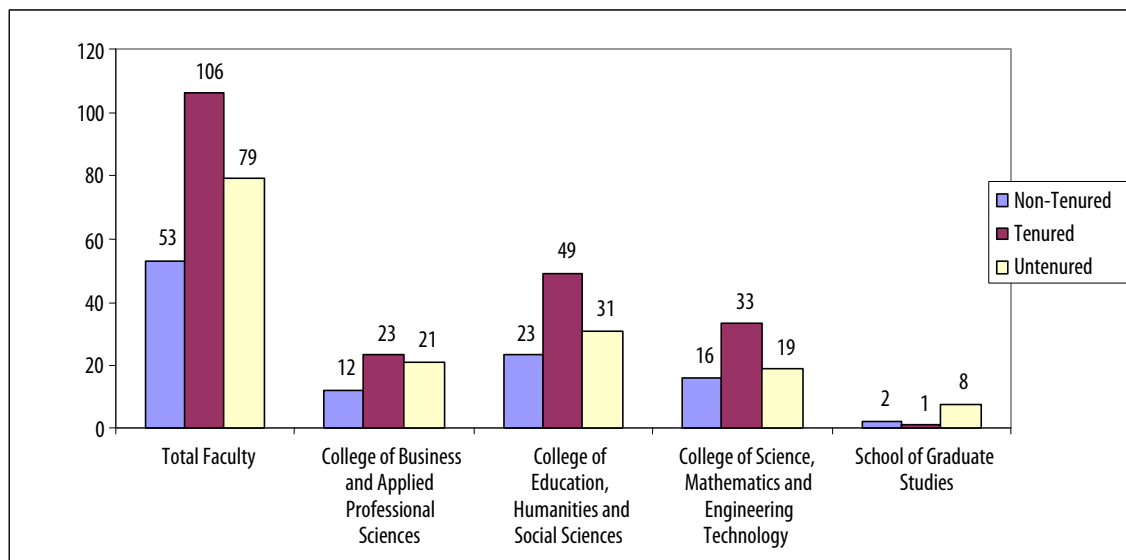
Figure 11: Faculty, by Faculty Status, Fall 2006



South Carolina State University, Academic Affairs

Figure 12 highlights the distribution of faculty by tenure status and college. All colleges, with the exception of the School of Graduate Studies, have tenured faculty as their largest faculty group.

Figure 12: Faculty, by Tenure Status and College, Fall 2006



South Carolina State University, Academic Affairs

The distribution of faculty by status and tenure appears to be fairly consistent across the various colleges. The size of the faculty appears to be consistent with the number of students served by those colleges with the College of Education, Humanities and Social Sciences boasting the largest faculty because of the number of programs in the college and its responsibility for providing general education courses to students.

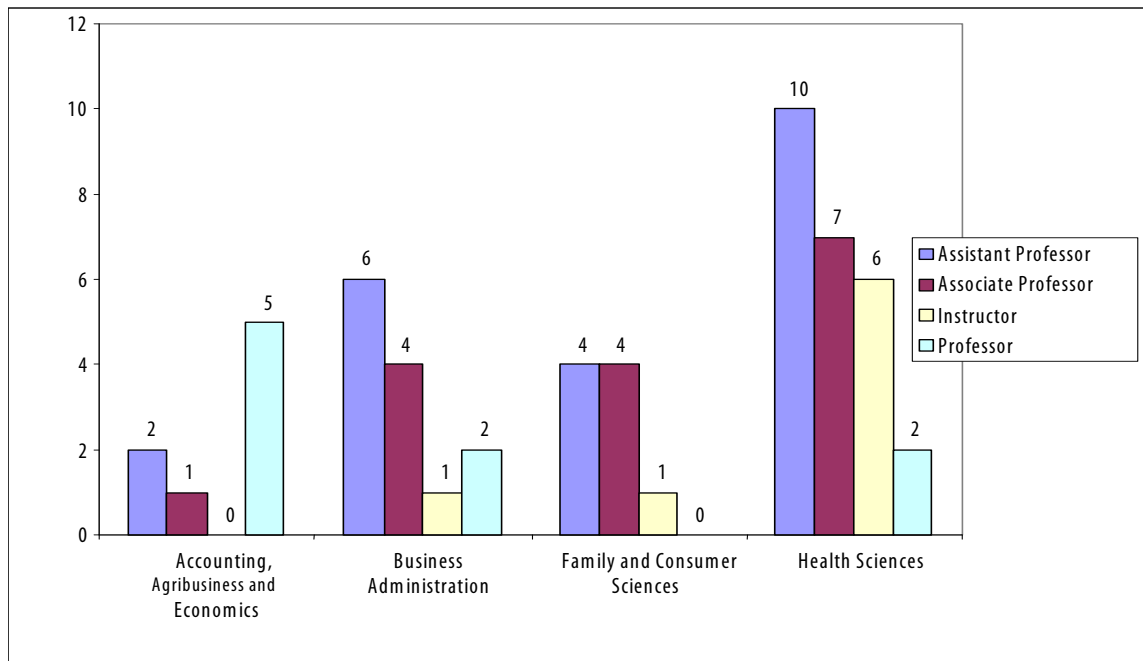
DISTRIBUTION OF FACULTY BY DEPARTMENT

In an effort to explore any connection between the productivity of programs and the faculty in those programs, the analysis now shifts to the distribution of faculty by department. The data will focus on faculty status, tenure status and the specific expertise of faculty.

College of Business and Applied Professional Sciences

Figure 13 shows the faculty status by department in the College of Business and Applied Professional Sciences (BPS). It is interesting to note the high number of full professors in the Accounting, Agribusiness and Economics Department relative to other appointments in the department.

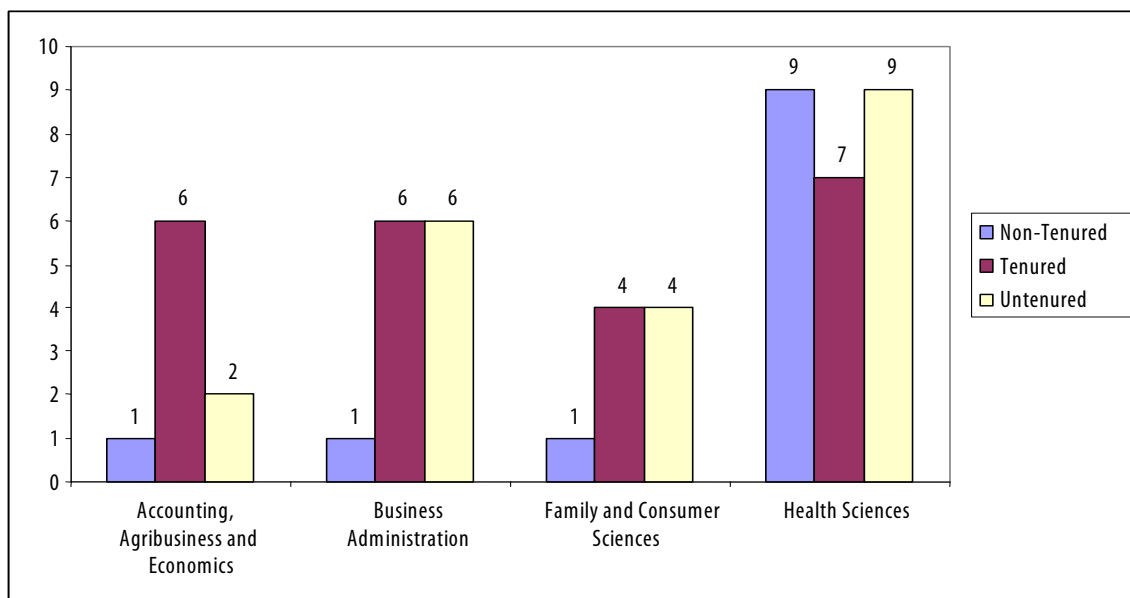
Figure 13: College of Business and Applied Professional Sciences Faculty, by Faculty Status and Department, Fall 2006



South Carolina State University, Academic Affairs

Figure 14 represents the tenure status of faculty in BPS by department. With the exception of the Accounting, Agribusiness and Economics department, there is balance in the number of tenured and untenured faculty. It is not surprising, given the earlier finding of a large number of full professors in the Accounting, Agribusiness and Economics department, that the department would also have a disproportionate number of tenured faculty as well.

Figure 14: College of Business and Applied Professional Sciences Faculty, by Tenure Status and Department, Fall 2006



South Carolina State University, Academic Affairs

Table 14 shows the disciplines of faculty as derived from their occupational title as categorized by the CIP taxonomy.

Table 14: Faculty Discipline by Department, Fall 2006

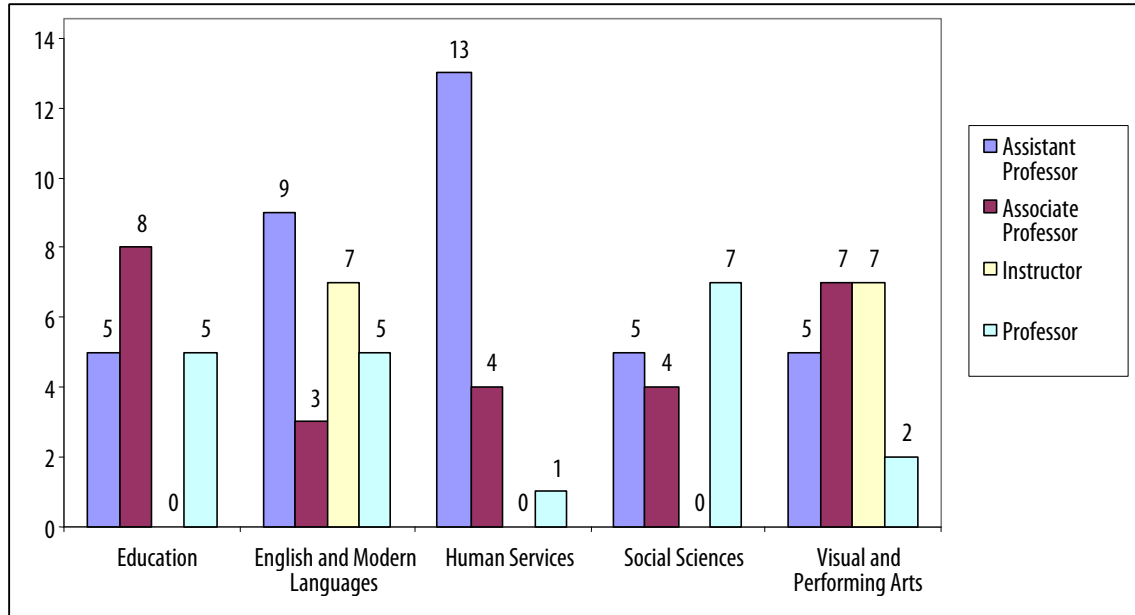
Accounting, Agribusiness and Economics	
Faculty Discipline	Number of Faculty
Accounting	3
Agribusiness/Agricultural Business Operations	2
Business/Managerial Economics	2
Civil Engineering Technology/Technician	1
Business Administration	
Faculty Discipline	Number of Faculty
Business Administration/Management	5
Human Resources Management/Personnel Administration, General	2
Marketing/Marketing Management, General	6
Family and Consumer Sciences	
Faculty Discipline	Number of Faculty
Family & Consumer Sciences/Human Sciences, General	2
Foods, Nutrition, & Wellness Studies, General	2
Human Development & Family Studies, General	2
Human Development, Family Studies, & Related Services, Other	2
Social Studies Teacher Education	1
Health Sciences	
Faculty Discipline	Number of Faculty
Audiology/Audiologist & Speech-Language Pathology/Pathologist	6
Health & Physical Education, General	3
Health Teacher Education	4
Nursing - Registered Nurse Training (RN, ASN, BSN, MSN)	8
Physical Education Teaching & Coaching	2

South Carolina State University, Academic Affairs

College of Education, Humanities and Social Sciences

Figure 15 shows the distribution of faculty by their faculty status in each department of the College of Education, Humanities and Social Sciences (EHS). English and Modern Languages and Visual and Performing Arts have a high number of instructors, whereas Social Sciences has a high number of full professors. The Education department has a higher ratio of associate professors relative to the other departments.

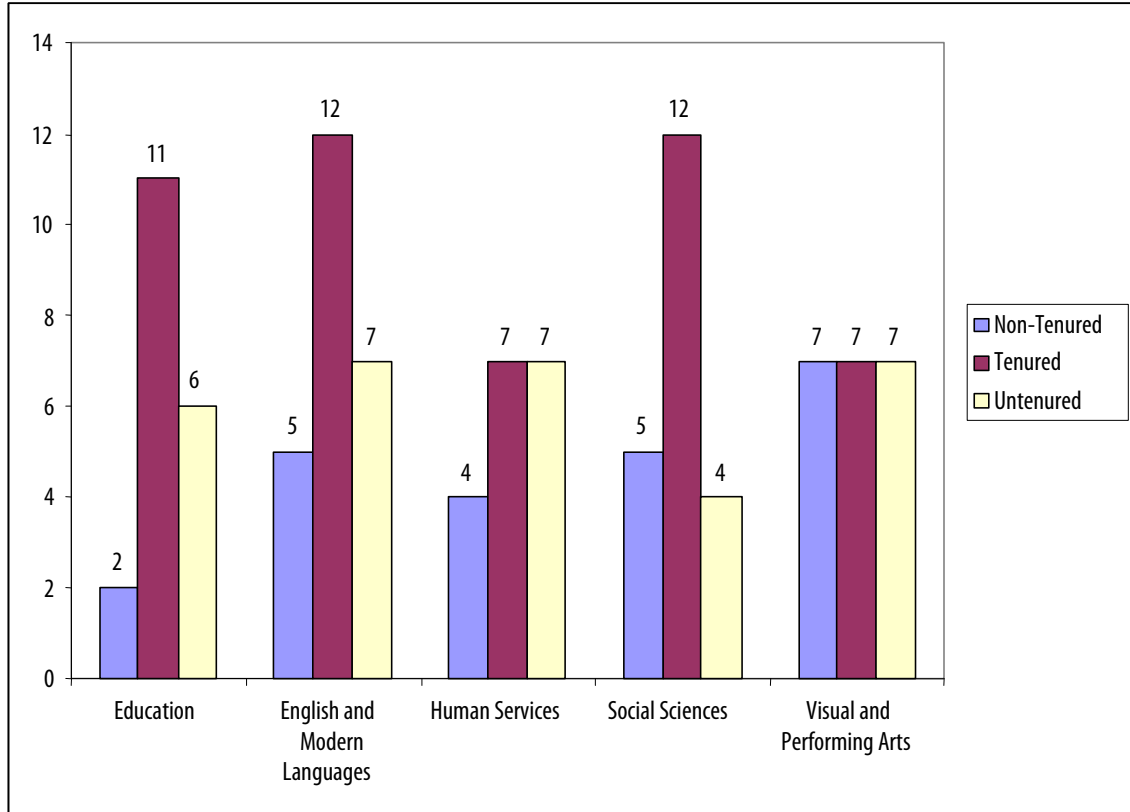
Figure 15: College of Education, Humanities and Social Science Faculty, by Faculty Status and Department, Fall 2006



University of South Carolina, Academic Affairs

Figure 16 shows the distribution of faculty by tenure status in each department. With the exception of Human Services and Visual and Performing Arts, tenured faculty is the largest faculty group in each department. In Human Services and Visual and Performing Arts, there is an equal number of tenured and untenured faculty.

Figure 16: College of Education, Humanities and Social Science Faculty, by Tenure Status and Department, Faculty, 2006



South Carolina State University, Academic Affairs

Table 15 illustrates the disciplines of faculty by department. It is interesting to note the high number of faculty with expertise in English Language and Literature in the English and Modern Language Department.

Table 15: College of Education, Humanities and Social Sciences Faculty Disciplines by Department

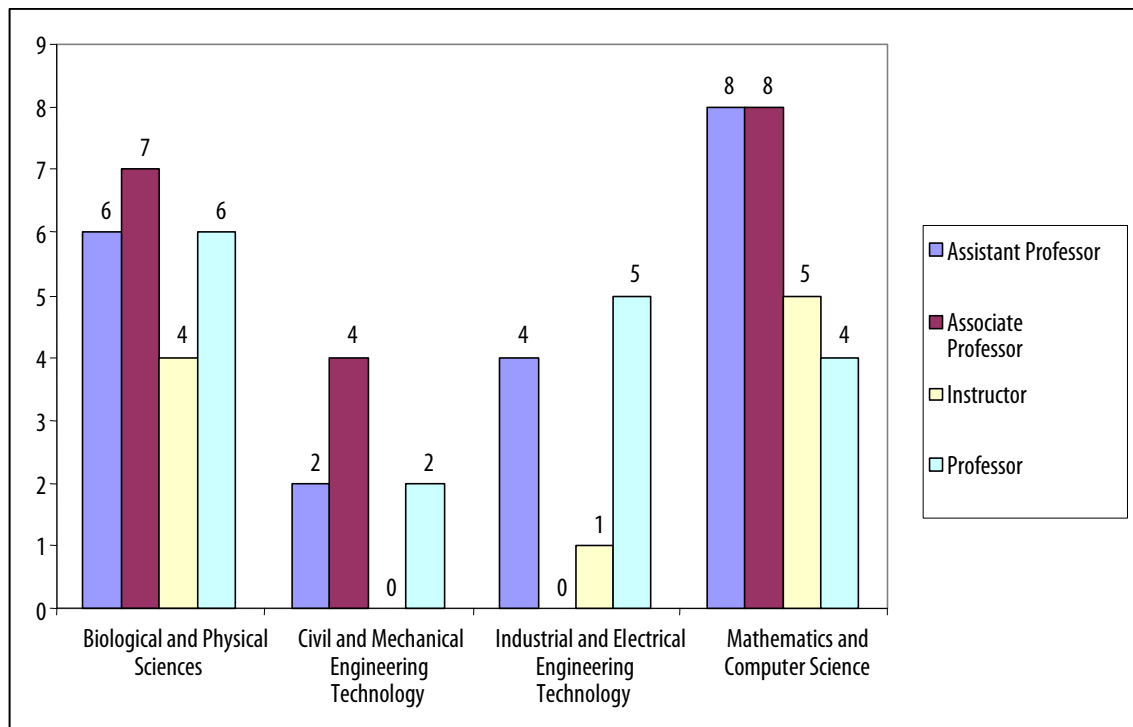
Education	
Faculty Discipline	Number of Faculty
Education, General	3
Elementary Education & Teaching	3
Reading Teacher Education	2
Science Teacher Education/General Science Teacher Education	1
Special Education, General	4
Teacher Education & Professional Development, Specific Levels & Methods, Other	1
Teacher Education, Multiple Levels	3
English and Modern Languages	
Faculty Discipline	Number of Faculty
Communications Studies/Speech Communication & Rhetoric	1
English Language & Literature, General	16
French Language & Literature	1
Journalism	1
Spanish Language & Literature	2
Speech & Rhetorical Studies	3
Human Services	
Faculty Discipline	Number of Faculty
Counselor Education/School Counseling & Guidance Services	4
Criminal Justice/Law Enforcement Administration	3
Rehabilitation & Therapeutic Professions, Other	5
Social Work	6
Social Sciences	
Faculty Discipline	Number of Faculty
History, General	5
Philosophy	1
Political Science & Government, General	4
Psychology, General	4
Social Sciences, General	1
Sociology	3
Visual and Performing Arts	
Faculty Discipline	Number of Faculty
Art Teacher Education	1
Drama & Dramatics/Theatre Arts, General	2
Fine/Studio Arts, General	1
Music Performance, General	6
Music Teacher Education	1
Music, General	4
Printmaking	5

South Carolina State University, Academic Affairs

College of Science, Mathematics and Engineering Technology

Figure 17 shows the distribution of faculty by their faculty status in the College of Science, Mathematics and Engineering Technology (SME). Industrial and Electrical Engineering Technology have a higher ratio of full professors than the other departments and do not have any associate professors. Assistant and associate professors are the predominant faculty in the other departments. The Mathematics and Computer Science; and Biological and Physical Sciences departments make use of instructors as well.

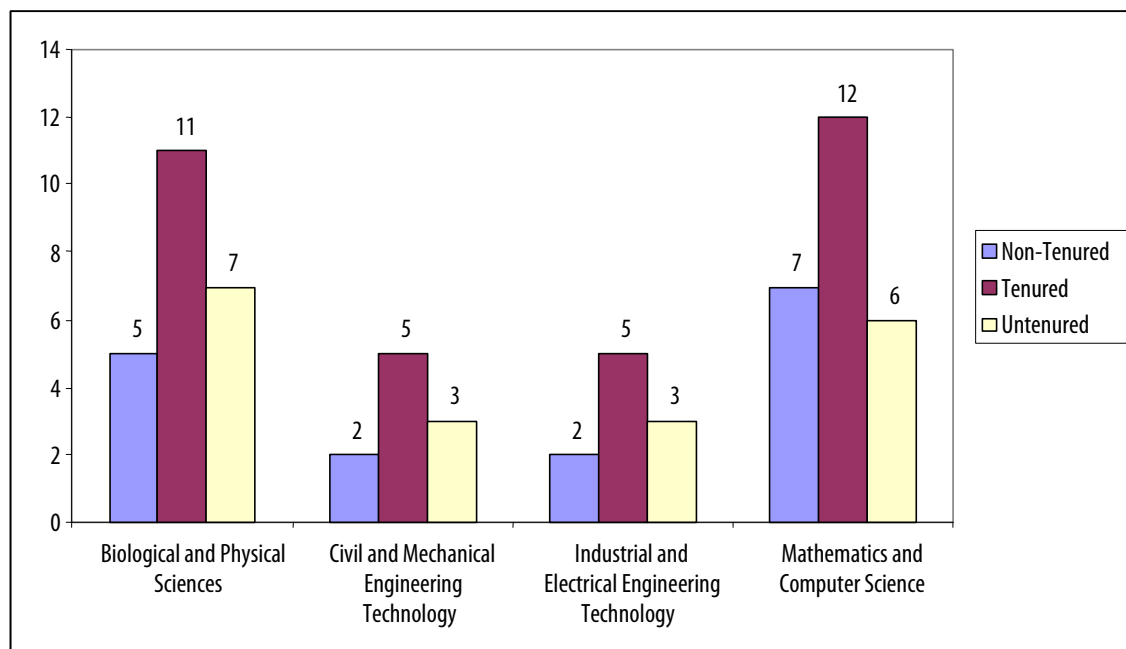
Figure 17: College of Science, Mathematics and Engineering Technology Faculty, by Status and Department, Fall 2006



South Carolina State University, Academic Affairs

Figure 18 describes the distribution of faculty in SME by tenure status. In all departments, tenured faculty is the largest faculty group. Mathematics and Computer Science have a higher ratio of non-tenure faculty than the other departments.

Figure 18: College of Science, Mathematics and Engineering Technology Faculty, by Tenure Status and Department, Fall 2006



South Carolina State University, Academic Affairs

The disciplines of faculty in SME are represented in Table 16. The various disciplines of the faculty appear consistent with the academic programs offered by the college. The number of faculty involved in Industrial Education seems high given the low productivity of the program.

Table 16: College of Science, Mathematics and Engineering Technology Faculty Disciplines by Department, Fall 2006

Biological and Physical Sciences	
Faculty Discipline	Number of Faculty
Biology/Biological Sciences, General	10
Chemistry, General	7
Physics, General	6
Civil and Mechanical Engineering Technology	
Faculty Discipline	Number of Faculty
Civil Engineering Technology/Technician	4
Mechanical Engineering/Mechanical Technology/Technician	4
Nuclear Engineering	2
Industrial and Electrical Engineering Technology	
Faculty Discipline	Number of Faculty
Electrical, Electronic & Communications Engineering Technology/Technician	7
Technology Teacher Education/Industrial Arts Teacher Education	2
Mathematics and Computer Science	
Faculty Discipline	Number of Faculty
Computer & Information Sciences, General	12
Mathematics, General	13

South Carolina State University, Academic Affairs

STUDENT/FACULTY RATIO

The distribution of faculty throughout the institution and the appropriate ratio of faculty to students enrolled is an important, but often complicated measure of academic quality. The National Center for Higher Education Management Systems (NCHEMS) provided an in-depth analysis of faculty workload, distribution and student/faculty ratio in its April, 2006 report for South Carolina State University.⁹ The NCHEMS analysis provides helpful insight that should continue to be consulted as the university continues its review process. The following analysis provides a broader analysis than the NCHEMS review, but attempts to address concerns about the counting of faculty that was raised with the previous review.

The faculty data collected for the academic review was provided by Academic Affairs at South Carolina State University and represents faculty with teaching assignments for the fall 2006 term. Excluded from the analysis are college faculty who because of administrative appointments, sabbaticals or for other reasons did not teach a course for the fall 2006 term. Table 17 shows the comparison of total faculty and total full-time equivalent faculty dedicated to teaching for the fall 2006 term.

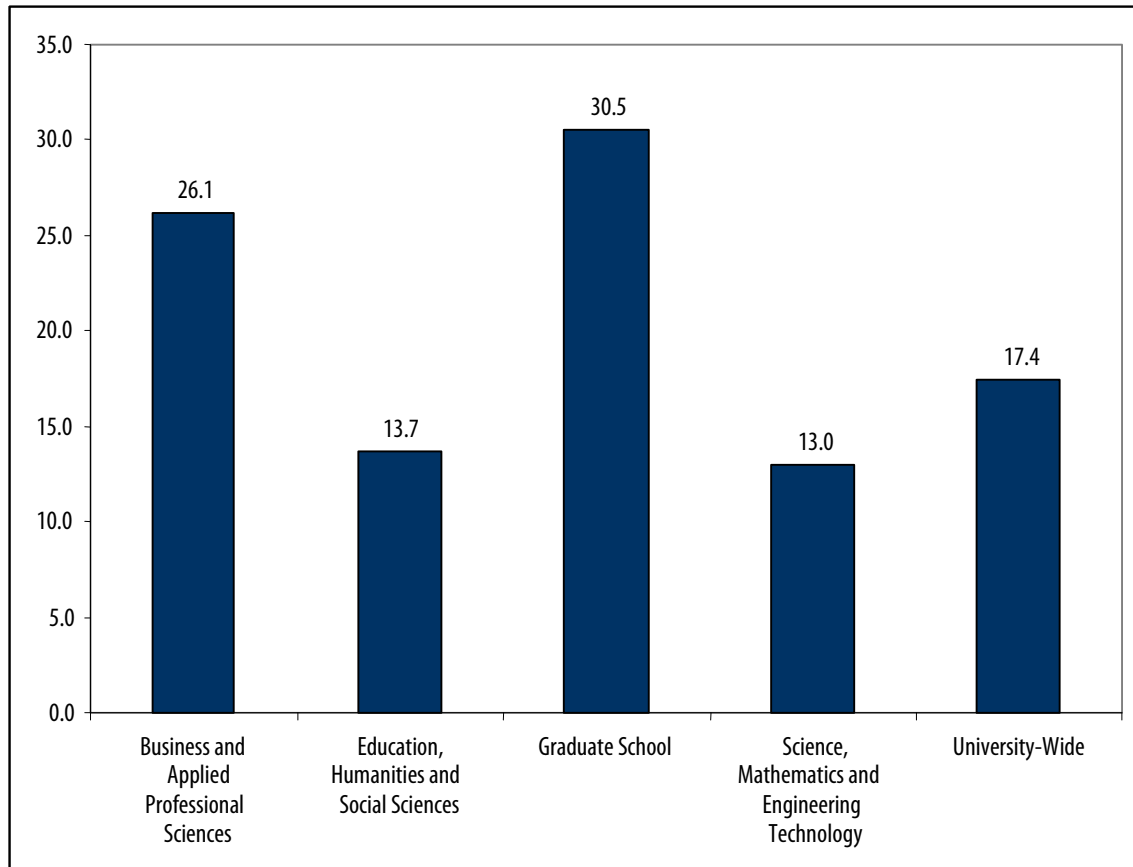
Table 17: Fall 2006, Faculty Total Headcount vs. FTE, by College

College	Total Faculty	Total FTE
College of Business and Applied Professional Sciences	56	52
College of Education, Humanities and Social Sciences	103	98.75
College of Science, Mathematics and Engineering Technology	68	66
School of Graduate Studies-Educational Leadership	11	11
TOTAL TEACHING FACULTY	238	227.75

South Carolina State University Academic Affairs

An analysis of student/teacher ratios from fall 2006 based on full-time equivalent (FTE) student enrollments by college compared to faculty (FTE) in Figure 19 reveals the differences across each of the colleges at SCSU.

Figure 19: FTE Students per FTE faculty, by College, Fall 2006



South Carolina State University Academic Affairs and Institutional Research

The analysis reveals the Graduate School and the College of Business and Applied Professional Sciences have the largest student/faculty ratio. The Graduate School ratio should be examined more carefully given that the calculation used for FTEs might not be ideal for the students enrolled in the Graduate School where there is a very high percentage of part-time students.

The overall student/teacher ratio has actually declined from the fall 2007 ratio that was reported in the NCHEMS report.

WHAT IS THE “VALUE ADDED” SOUTH CAROLINA STATE UNIVERSITY OFFERS ITS STUDENTS AND THE LARGER COMMUNITY?

The economic and cultural benefits SCSU provides its students and the larger community are critical to the health of Orangeburg, the rural communities of central South Carolina and the state as a whole. Stakeholders spoke of the opportunity for SCSU to reach out beyond its walls to better serve students and the broader community.

Providing added value to students resulted in a wide range of responses from SCSU stakeholders. Providing workforce and graduate school preparation was often mentioned as one way that SCSU can provide added value to current students. Expanding internship opportunities and other field experiences for students was frequently mentioned. Providing students the opportunity to engage in research activities and to get advising on graduate school opportunities was also mentioned as a service that the institution could provide students. Faculty, particularly in small departments, were concerned that their teaching and research responsibilities often make it difficult to provide more expansive out of classroom experiences for students.

Stakeholders also mentioned the need for SCSU to reach back into high schools and middle schools to better prepare students for college-level work. Working closely with high schools to expand access to dual credit opportunities, offering summer academic camps, and partnering with high schools to provide access to the institution were all mentioned as ways to both prepare students for college and to build stronger relationships with the schools and communities which are sending students to SCSU.

Partnerships with business to provide training opportunities for their employees was mentioned as yet another strategy that the university could employ to provide added value to the community. Creating satellite sites where SCSU courses could be delivered in partnership with local businesses could be a source of revenue for the college as well as a way to better promote the institution. One participant mentioned their interest in providing courses in a local hospital to help their employees access the courses they need to earn bachelor's in nursing or other health related degrees.

One key statistic that speaks to the need for SCSU to provide added value to its students and graduates was the low percentage of students who are registered with the SCSU career development center. According to staff from the Career Center, only 20% of SCSU students are registered with the center. This statistic suggests that most SCSU students are not taking advantage of internship opportunities, career counseling services, workforce readiness services and other important offerings that many SCSU stakeholders articulated as critical to preparing graduates for the workforce.

SCSU needs to consider how the various support services available on campus can be better targeted to students to ensure that all graduates leave SCSU with all of the skills and knowledge they need to be successful in the workforce.

ENGAGING K-12 SCHOOLS AND REGIONAL EDUCATION COUNCILS

There are many new opportunities for South Carolina State University to engage K-12 schools, particularly middle and high schools, to prepare students for college and the workforce. The recently adopted Education and Economic Development Act (EEDA) is one of the most far-reaching secondary school reform measures in the country. EEDA requires all secondary students beginning as early as middle school to identify areas of career interest. In 10th grade, South Carolina students will declare an academic major which will provide the context for their studies until high school graduation. Each high school in South Carolina is required to offer at least three separate academic majors for students to pursue. The majors that will be offered at South Carolina high schools fall into the following career clusters:

- ◆ Agriculture, Food and Natural Resources
- ◆ Architecture and Construction Arts
- ◆ A/V Technology and Communication Business
- ◆ Management and Administration
- ◆ Education and Training
- ◆ Finance
- ◆ Government and Public Administration
- ◆ Health Science
- ◆ Hospitality and Tourism
- ◆ Human Services
- ◆ Information Technology
- ◆ Law, Public Safety, Corrections and Security
- ◆ Manufacturing Marketing
- ◆ Sales and Service
- ◆ Science, Technology, Engineering and Mathematics
- ◆ Transportation, Distribution and Logistics.

EEDA provides a unique opportunity for South Carolina State University to engage communities throughout the state by aligning their academic programs with the various majors offered by South Carolina high schools. In addition, EEDA establishes regional education councils where colleges and universities partner with K-12 school districts, economic development agencies and social service entities to provide services to both traditional and non-traditional age students to improve student transitions into postsecondary education and the workforce. SCSU's ability to take advantage of the various innovations occurring as a result of EEDA could provide a competitive advantage vis-à-vis other colleges and universities. More importantly, EEDA provides a vehicle for SCSU to reach out to potential students, to help them prepare for higher education and to better prepare them for the workforce.

ENGAGING BUSINESS AND THE ECONOMIC DEVELOPMENT COMMUNITY

In addition to EEDA, the business community has mobilized to improve the regional economy of South Carolina by investing in industry clusters that reflect current economic strengths in the state. New Carolina is a partnership of the state of South Carolina and the business community that has resulted in greater collaboration among businesses in the following 10 industry clusters:

- ◆ Advanced Composites
- ◆ Automotive
- ◆ Agribusiness
- ◆ Aviation
- ◆ Apparel
- ◆ Distribution
- ◆ Hydrogen
- ◆ Nuclear
- ◆ Textiles
- ◆ Travel and Tourism.

A key strategy for New Carolina is to engage both K-12 education and higher education in efforts to improve the workforce preparation of South Carolina residents in each of the industry clusters. As a result, SCSU could develop partnerships with businesses within each of the industry clusters to provide internships and other opportunities to better prepare SCSU graduates for jobs in each of the New Carolina clusters. In addition, New Carolina could also lead to dynamic partnerships with K-12 school districts where SCSU and industry leaders can work closely with high school students to maximize college and workforce preparation for South Carolina residents.

Both New Carolina and EEDA represent a renewed commitment by state leaders to better educate South Carolinians. By engaging both of these opportunities, SCSU could make great strides in the academic quality of its programs.

NEXT STEPS

This academic review represents only the beginning of what should be a thoughtful and deliberate process. SCSU should consider a variety of next steps that will eventually lead to a coherent strategy for ensuring the academic quality of all of its programs. Those efforts involve further analysis, the examination of potential strategies and the opportunity to act immediately in ways that will better position SCSU into the future. Following are some suggested next steps that SCSU should consider as part of the next phase of this effort.

- ◆ Examine ways to better assess the academic skills of entering freshmen. Requiring all students to take a student placement exam could allow entry-level courses in mathematics, reading and writing to be customized to meet student needs.
- ◆ Study the student to faculty ratio of students in freshmen composition, college algebra and other “gateway” courses that students must complete to enroll in high skilled academic majors.
- ◆ Assess the teaching experiences and knowledge of faculty in “gateway” courses to ensure they have the skills needed to teach these courses to students with a wide range of academic skills.
- ◆ Examine the freshmen year experience to determine the extent that freshmen take advantage of the academic and social support services that are created to improve transitions into college and promote second year retention.
- ◆ Conduct further analysis of the value of SCSU degrees by tracking employment and wage data for SCSU graduates.
- ◆ Consider how to better track student participation in various support services to include academic counseling and the career center.
- ◆ Continue analysis of various academic programs, with special consideration of academic programs that are not meeting state productivity standards.
- ◆ Further assess the demand for nursing and engineering technology degrees by tracking wages and employment rates of students with those degrees.
- ◆ Engage the various regional education councils established by EEDA to explore possible collaborative opportunities.
- ◆ Engage the leaders of the various industry clusters within the New Carolina regional economic development council to explore possible partnerships with

business leaders that will provide for better workforce preparation and transitions for SCSU students.

- ◆ Consider implementing other tools for assessing student learning and academic quality to include faculty evaluations and diagnostic learning assessments.
- ◆ Consult with other organizations and institutions with experience and expertise in the various issues surfaced through this report to identify other strategies that can be employed by the university to improve academic quality.

Appendix 1: Ad Hoc Academic Review Committee

Dr. John H. Corbitt

Co-Chair, Ad Hoc Academic Review Committee and Chair, Academic Affairs and Faculty Liaison Committee of the South Carolina State University Board of Trustees

Dr. Carl Carpenter

Co-Chair, Ad Hoc Academic Review Committee

Dr. Tony-Adams O. Aburime

Associate Professor, South Carolina State University

Mr. Deven D. Anderson

President, South Carolina State University Student Government Association

Dr. Mary E. Cheeseboro

Associate Vice President for Academic Affairs, South Carolina State University

Dr. M. Evelyn Fields

President, Faculty Senate, South Carolina State University

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Dr. Rita Jackson Teal

Associate Vice President for Institutional Effectiveness, South Carolina State University

Dr. Thomas E. Thompson

Dean, School of Graduate Studies, South Carolina State University

Appendix 2: Academic Review Framework

Who are the South Carolina State University students of the future?	<i>Who are the current South Carolina State students?</i>	<ul style="list-style-type: none"> • Which high schools and communities do SCSU students come from? • What is SCSU students' academic preparation for college? • What is SCSU students' race/cultural background? • How many SCSU students qualify for financial aid and how many have unmet financial need? • What is the success rate of SCSU students? • How many SCSU students transfer into the university? • Why do students choose SCSU?
	<i>Who are the high school graduates of the future?</i>	<ul style="list-style-type: none"> • Where do current South Carolina high school graduates enroll in postsecondary? • What is their race/ethnicity? • How many require remediation?
	<i>Who are the non-traditional students of the future?</i>	<ul style="list-style-type: none"> • Where do they enroll? • What are their attendance patterns?
Which opportunities do SCSU students need preparation for upon graduation?	<i>What are the job opportunities for SCSU graduates?</i>	<ul style="list-style-type: none"> • What are the fastest growing occupations? • What are the large foundation occupations in South Carolina?
	<i>How do South Carolina State programs compare with the highest demand jobs?</i>	<ul style="list-style-type: none"> • What is the overlap between state industry clusters and SCSU programs? • How many graduates are employed in their field? • How does SCSU measure the workforce readiness of its students? • What partnerships exist that provide career preparation for students?
How should SCSU academic programs be delivered to students?	<i>How are faculty involved in delivering academic programs?</i>	<ul style="list-style-type: none"> • Number of full-time faculty vs. part-time faculty teaching? • Average teaching load per faculty member? • What is the distribution of faculty? • To what extent are faculty pursuing grants to improve instruction? • Are faculty engaged in faculty development and/or research activities that ensure they remain current in their field?
	<i>What is the level of attention that students receive in SCSU classrooms?</i>	<ul style="list-style-type: none"> • What is the average class size? • What is the preferred class size for different courses and majors? • Do students evaluate instructors? If so, are these evaluations used to improve instruction?
	<i>How is technology utilized in instruction?</i>	<ul style="list-style-type: none"> • Number of courses offered via distance education and/or online? • Number/percent of faculty who are trained in the use of technology to deliver instruction?
How do academic programs compare with other like institutions?	<i>How does the productivity of SCSU programs compare with other SC institutions?</i>	<ul style="list-style-type: none"> • What programs does SCSU have in common with other SC institutions? • How does the productivity of SC programs compare with other institutions?
	<i>What are the emerging state policies and programs that will impact SCSU?</i>	<ul style="list-style-type: none"> • How do SCSU programs compare to the Career Clusters outlined in the state of South Carolina's Education and Economic Development Act? • Which high schools offer "majors" that are related to SCSU programs?
	<i>What has been the impact of transfer articulation agreements with other SC institutions?</i>	<ul style="list-style-type: none"> • Which colleges does SCSU have articulation agreements with? • How many students transfer from those institutions and into which programs?
What is the "value added" that SCSU offers its students and the larger community?	<i>What are the academic program offerings that are unique to SCSU?</i>	<ul style="list-style-type: none"> • What are the unique majors offered by SCSU and how can they be improved? • Do students take advantage of academic advising and other support programs?
	<i>How is SCSU engaged with the larger community?</i>	<ul style="list-style-type: none"> • How does SCSU partner with K-12 schools to prepare students for college? • How does SCSU provide leadership to the surrounding community? • What partnerships are SCSU engaged in with business, K-12 education, faith communities and the broader community?

ENDNOTES

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- ¹ Western Interstate Commission on Higher Education, *Knocking on the College Door: Projections of High School Graduates by State, Income and Race/Ethnicity*, December 2003.
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- ³ *Education Week*, “Quality Counts,” 2006.
- ⁴ Clifford Adelman, *The Toolbox Revisited*, U.S. Department of Education, 2006.; *ACT National Curriculum Survey 2005-06*, 2007.
- ⁵ Jennifer L. Kobrin, *Determining SAT Benchmarks for College Readiness*, Research Notes, Office of Research and Analysis, College Board, RN-30. January 2006.
- ⁶ F. Evans, *Cumulative data for technology supported courses for calendar years 2005 and 2006*, Department of Education Technology Services, South Carolina State University. April 2007.
- ⁷ *Report on Program Productivity Fall 2000 – Fall 2005*, South Carolina Commission on Higher Education, April 2007.
- ⁸ *2006-2007 Fall Teacher/Administrator Supply and Demand Survey – South Carolina*, CERRA, 2007.
- ⁹ National Center for Higher Education Management Systems, *Academic Program Review*, Submitted to South Carolina State University, April, 27, 2006.