

College of Charleston

Program Proposal for New Program

Title of Program: Bachelor of Science (BS), Artium Baccalaureatus (AB)
Major: Supply Chain Management

Date of Submission:

A handwritten signature in black ink, reading "Dr. George Benson", is written over a horizontal line.

Dr. George Benson, President

Program contact:

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(Effective July 1, 2014)
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2. Classification

a)	Program Title	Supply Chain Management
b)	Concentrations, options, and tracks	N/A
c)	Academic unit in which the program resides	Department of Supply Chain and Information Management (Effective July 1, 2014)
d)	Designation, type, and level of degree (if baccalaureate, specify 4- or 5-year)	Bachelor of Science, Artium Baccalaureatus; 4 year
e)	Proposed date of implementation	August 2015
f)	CIP code from the current U.S. Department of Education Classification of Instructional Programs	52.0203
g)	Site	College of Charleston-downtown campus
h)	Palmetto Fellowes Scholarship and LIFE Scholarship qualification	No
i)	Delivery mode	Traditional instruction

3. Institutional Approval

a) Titles of institutional approvals and b) date of each approval.

Date	Evaluating/Approving Unit
November 14, 2013	Department of Marketing and Supply Chain Management
December 10, 2013	School of Business Undergrad Curriculum Committee
December 27, 2013	School of Business faculty
December 28, 2013	Dean of the School of Business
February 13, 2014	Academic Planning Committee
February 21, 2014	Undergraduate Curriculum Committee
February 21, 2014	Provost
March 11, 2014	Faculty Senate
March 21, 2014	President
March 21, 2014	College of Charleston Board of Trustees
April 30, 2014	Faculty Senate Budget Committee

4. Purpose

a) Purpose of the program

Responding to calls from many at the College of Charleston and the community at large, the overarching purpose of this proposed major in supply chain management is to provide College of Charleston students with the opportunity to acquire the foundational knowledge and the skills necessary to assist organizations in managing the flow of raw materials into the production process and finished goods to the final customer in a way that will provide a sustainable competitive advantage to the firm.

Building on the success of a long-standing and well-received concentration/minor in Global Logistics and Transportation offered at the College of Charleston, this proposed major extends the current curriculum in logistics and transportation with a portfolio of courses that together, represent the broader area of supply chain management. The American Productivity and Inventory Control Society (APICS) dictionary defines supply chain management as *the design, planning, execution, control, and monitoring of supply chain activities with the objective of creating net value, building a competitive infrastructure, leveraging world-wide logistics, synchronizing supply with demand, and measuring performance globally*¹. In line with its definition, supply chain management is characterized as an interdisciplinary field that emphasizes cross-functional linkages and inter-connected systems. These inter-connected systems ultimately form the foundation for the provision of goods and services to the end customer. The discipline of supply chain management draws heavily from the areas of procurement, operations management, logistics, management information systems, and statistics.

The proposed major combines existing coursework in logistics and transportation with coursework from the other areas of supply chain management including: supply chain planning and analysis, business process improvement, and procurement. In doing so, this proposed major will offer a 60-hour degree program in the broader area of supply chain management, while maintaining the integrity of the existing concentration/minor in logistics and transportation. Moreover, this approach will allow the College to leverage the strengths and lessons learned from the existing concentration/minor in this broader supply chain management curriculum.

b) *Objectives of the program*

- ***Provide students with a strong liberal arts foundation as part of a supply chain management program.*** The proposed program will produce graduates that understand and can apply various quantitative and analytical supply chain management techniques. With a strong liberal arts foundation, these graduates will also have knowledge of the wider world and a sense of social responsibility; will be able to communicate professionally both orally and in writing; and will understand the value of cultural diversity. Together, these knowledge bases and skill sets result in a capable, ready-to-work graduate that embraces diversity and understands the impact of his/her actions on the world.
- ***Provide students with a professional degree that leads to full employment directly after graduation.*** Supply chain management is an area of professional study that benefits from consistently high demand in industry. As such, average starting salaries for supply chain graduates are approximately \$49,500, but can rise quickly as graduates obtain work experience in the area, with

¹ American Production and Inventory Control Society (APICS) Dictionary 12th Edition, American Production and Control Society, Inc., Falls Church, VA.

professionals holding up to five years of experience earning an average of \$83,689². In fact, a recent U.S. News and World Report career guide predicts that supply and value chain management will be one of the 20 hottest career paths in this century. This proposed major will prepare those students interested in pursuing a career with historically healthy demand and projected future demand by building the specific knowledge and skills required for success in this area.

- ***Grow the educational and career opportunities for students attending the College of Charleston.*** A survey of students currently enrolled in the global logistics and transportation concentration/minor indicated that almost every student presently enrolled would have considered taking advantage of a major in supply chain management, had it been made available to them. We believe this interest will be even more pronounced as students learn about employment opportunities in the area. As South Carolina Secretary of Commerce Bobby Hitt touched on in the 2013 Supply Chain Summit held at the College of Charleston, there are more jobs in supply chain management and operations than there are qualified graduates to fill them. This proposed major is an effort toward filling that gap, in a way that strongly complements the liberal arts tradition of the College of Charleston, as well as the existing degree programs and concentrations offered at the School of Business.

5. Justification

- a) *Need for the program in the state and explanation of how graduates will contribute to the economic development of the state.*

The state's need for such a program can be recognized by observing the rapidly changing industrial landscape of South Carolina. Drawn in part by the Port of Charleston, one of the busiest container ports along the Southeast and Gulf coasts, a number of world class manufacturing, retail, and logistics firms have located in South Carolina. Companies including BMW, Michelin North America, Bridgestone Americas, and Boeing have moved and/or expanded operations here. While these companies directly create demand for professionals with knowledge and skills in supply chain management, demand is also generated by the broader networks of firms that co-locate with these large companies. Boeing, for example, is currently working with over 300 different businesses in the state of South Carolina, many of them suppliers and/or vendors for the products Boeing manufactures³. Many of these 300 businesses desire college graduates with the knowledge and skills delivered in a supply chain management program. As another example, past research conducted by the University of South Carolina suggests that the "auto cluster," which comprises of auto assemblers and manufacturers, supports as many as 84,935 full-time equivalent jobs within the state⁴. Many of these jobs require the knowledge and skills that students can acquire in this proposed major.

² <http://www.businessweek.com/business-schools/supply-chain-management-the-next-big-thing-09122011.html>, accessed 9/21/2012

³ http://www.boeing.com/assets/pdf/aboutus/govt_ops/state_cards/card_SC.pdf

⁴ http://mooreschool.sc.edu/UserFiles/moore/Documents/rev1_19.pdf

In March 2013, the College of Charleston School of Business hosted the South Carolina Supply Chain Summit where representatives from BMW, Michelin North America, Boeing, Horizon Lines, MVP Group International and other key South Carolina businesses met with faculty and administrators in higher education to discuss mutual needs and interests. SC Secretary of Commerce Bobby Hitt challenged higher education to fill a critical gap: there are more jobs in supply chain management and operations than there are qualified graduates to fill them. This proposed major is an effort to address that need, in a way that strongly complements the liberal arts tradition of the College of Charleston and the existing degree programs and concentrations offered at the School of Business.

Burgeoning demand in supply chain management is not just within the state. Bureau of Labor Statistics (BLS) ten-year employment projection data (2010-2020) demonstrates stronger than expected growth in a number of supply chain management areas including logistics (+26%), operations management (+18%), operations research (+15%), distribution (+10%) and purchasing (+6%)⁵. Similarly, U.S. News and World Report career guide predicts that employment in supply chain management will increase 25.5% by 2020.⁶

b) *Centrality of the program to the Commission-approved mission of the institution.*

The CHE approved Mission Statement for the College of Charleston is as follows:

The College of Charleston is a state supported comprehensive institution providing a high quality education in the arts and sciences, education and business. Consistent with its heritage since its founding in 1770, the College retains a strong liberal arts undergraduate curriculum. Located in the heart of historic Charleston, it strives to meet the growing educational demands primarily of the Lowcountry and the state and, secondarily, of the Southeast. A superior quality undergraduate program, enrolling 9000 to 10000 students, is central to the mission of the College.

This proposed program directly supports the College's mission by offering an interdisciplinary professional degree that leverages the knowledge and skills developed through the liberal arts curriculum. The proposed major will prepare students to solve complex problems that often cross organizational and national borders, involve diverse stakeholder groups, and impact a variety of interconnected systems.

Supply Chain Management fits very well within the College's liberal arts tradition. Supply chain management emphasizes cross-functional linkages and inter-connected systems, which form the foundation for the provision of goods and services to the end customer. A strong liberal arts education provides the ideal foundation for

⁵ Bureau of Labor Statistics, Selected Occupational Projections Data for Logistics 2013, <http://data.bls.gov/oepl/noeted>

⁶ <http://money.usnews.com/careers/best-jobs/rankings/the-100-best-jobs?page=8>

understanding problems that are systems-based. The liberal arts prepares students to deal with complexity, diversity, and change. While the required quantitative and analytical skills would be developed in this proposed major, a broad understanding and knowledge of the wider world, a sense of social responsibility, and superior communication skills are equally important to professionals in this field.

c) *Relationship of the proposed program to other programs within the institution.*

As an interdisciplinary degree program, the proposed major will complement many of the other programs in the School of Business, without creating unnecessary duplication. The proposed major is organized around a foundation of general business requirements as well as other foundational courses from the fields of Management, Finance, and Marketing. The proposed program will then introduce important specialized coursework in areas such as Lean and Six Sigma, Supply Chain Analysis and Design, Purchasing, and Logistics and Transportation. The proposed program would join six other specialized majors in the School of Business that reflect core functional areas of the firm: International Business, Accounting, Hospitality and Tourism Management, Economics, Finance, and Marketing.

The College of Charleston currently offers a concentration/minor in Global Logistics and Transportation (GLAT); however, this proposed major's extended focus on business process design, purchasing, planning, and analysis set it apart from the currently offered GLAT concentration/minor. Logistics and transportation represents one of many other areas of expertise that make up the field of supply chain management. Consistent with this understanding, the proposed major will leverage one of the foundation courses currently part of the GLAT concentration (TRAN 312); however, the remainder of the program expands well beyond the GLAT concentration. Further evidence of the distinctiveness of this proposed major is the fact that several of the specialized courses are not currently offered by the College of Charleston. In all, a total of three (3) new core supply chain courses and four (4) elective courses are being proposed as part of this new major.

If approved, the proposed major and existing GLAT concentration/minor will complement one another very well, and provide College of Charleston students with a number of value-added options for pursuing education in supply chain management and/or transportation and logistics. Students interested in the field of supply chain management that also want to specialize in the area of logistics will be able to take the major in Supply Chain Management, with a concentration in Global Logistics and Transportation. Meanwhile, students interested in the field of supply chain management that are not interested in specializing in logistics do not have to complete the logistics concentration courses. Finally, for students that are not interested in the majoring in Supply Chain Management but would like to build some knowledge and skills in the area of logistics have the option to complete the logistics minor while pursuing a major in a different discipline. Together, these programs will add value by providing students with options that allow them to go as deep into supply chain management and logistics as their career aspirations drive them to go.

d) *Comprehensive list of similar programs in the state.*

Institution	Program similar to a B.S. with a major in Supply Chain Mgt.
USC Columbia	Global Supply Chain and Operations Management (GSCOM) concentration as part of the major in Management Science.
Clemson	Supply Chain Management emphasis as part of the bachelor of science in Management.
The Citadel	Supply Chain Pathway as part of a major in Business Administration
Francis Marion	Supply Chain and Operations Management track as part of the major in Management.

e) *Similarities and differences between the proposed program and those with similar objectives offered at other institutions in the state, the region, and the nation.*

Structurally, the proposed program is structurally different than other programs in the state in two important ways—course options (flexibility) and required hours (breadth). As a major in supply chain management (rather than a concentration), this proposed program offers students more flexibility in tailoring their education by combining any of a variety of minors offered at the College of Charleston, with the major in supply chain management. Students would have the option of obtaining a degree in supply chain management with a specialized minor in global logistics and transportation, finance, international business, or some other complementary area of study. This is an important difference from the other programs in the state, which require students seeking an education in supply chain management to earn a major in a specific broader field (e.g., Business Administration, Management, Management Science, etc.), limiting their ability to tailor their education. Furthermore, the proposed major will involve more hours of specialized coursework than any other program in the state—21 hours—15 hours of which are pre-defined and 6 of which can be customized to the student’s interests within the domain of supply chain management in the form of approved electives. The 6 hours of supply chain management electives is among the most in the state as part of a supply chain program (along with Clemson University and The Citadel). In addition, this program is the only one in the state with a non-substitutable capstone course. The Global Supply Chain and Operations Management (GSCOM) concentration offered in the University of South Carolina’s Management Science major offers a robust applied capstone course; however, this course is substitutable with another course.

Another important distinction of this proposed major relates to the liberal arts tradition of the College of Charleston. Specifically, if approved, this proposed major would differ from other programs in the state in that it builds directly on top of a strong liberal arts core. This proposed major will integrate the College’s liberal arts foundation with field-specific knowledge of the tools and techniques leveraged in the interdisciplinary, global, and increasingly complex world of supply chain management. Nationally, schools such as Bowling Green State University, Texas Christian University and the University of Missouri-St. Louis offer degrees in the

area of supply chain management. That said, the majority of these institutions lack the complementary liberal arts background provided at the College of Charleston.

A third distinction is geographic. There currently is no traditionally-delivered program with a major in supply chain management offered to citizens of the Lowcountry. Given the presence of the Port of Charleston, which is a major hub for supply chain activities in locally, nationally, and globally; there is a need for a supply chain management program that serves the Lowcountry directly.

Although, Georgia Southern University (GSU) offers a degree program in Logistics and Intermodal Transportation, it is very different than this proposed major in supply chain management. Almost all of the coursework required as part of GSU's Logistics and Intermodal Transportation major is dedicated to logistics and transportation. GSU's degree program does not address supply chain planning, supply chain analytics, purchasing, or lean/six sigma.

6. Admission Criteria

There are no separate admissions criteria for the Supply Chain Major. As of June 1, 2014, there will be no general admissions criteria for students majoring within the School of Business. Thus, students will be able to declare their major in the first semester of their freshman year.

7. Enrollment

a) *Projected Total Enrollment (Table A) for the first five years.*

Table A. PROJECTED TOTAL ENROLLMENT						
YEAR	FALL		SPRING		SUMMER	
	Headcount	Credit Hrs.	Headcount	Credit Hrs.	Headcount	Credit Hrs.
2015-16	10	150	10	150	0	0
2016-17	13	195	13	195	0	0
2017-18	17	255	17	255	0	0
2018-19	23	345	23	345	0	0
2019-20	30	450	30	450	0	0

b) *Process by which these estimates were made, including the academic origin of students to be served.*

Forecasts are based on enrollment data for the global logistics and transportation concentration and past major introductions within the School of Business. Specifically, the forecast was derived by first calculating a flat average of enrollment numbers in the global logistics and transportation concentration over the past 10 years, resulting in a value of 15 students per year. Next, we conducted a qualitative analysis of current student sentiment regarding this proposed major. A survey of the 30 currently enrolled global logistics concentration/minor students revealed that

over 90% would have considered the major had it been available. To maintain a conservative forecast however, we applied a 66% proportion to the flat average of 15 students per year to estimate first year enrollment, rounding up to the nearest integer. This process led to a forecast for 2015 enrollment of 10 students per year. After establishing the 2015 enrollment projection, we estimated year-over-year growth by analyzing enrollment growth over the past 5 years for the global logistics and transportation concentration/minor. This analysis suggested an average growth rate of 60% year-over-year is appropriate; however, a more conservative estimate of 30% was used for this analysis, rounding enrollment numbers up to the nearest integer. Applying our growth-rate estimate to the 2015-16 (year 1) enrollment estimate leads to a 2019-20 (year 5) enrollment estimate of 30. A qualitative comparison of these projected numbers with historical data from the introduction periods of other majors in the School of Business suggests that our forecast is safely conservative. We expect that the vast majority of students enrolling in this program would have previously majored in Business Administration, which is consistent with results of previously introduced majors in Finance and Marketing.

- c) *Number of new students projected to enroll; the number projected to transfer from other degree programs within the institution; effect on those degree programs.*

Students are admitted to the College of Charleston, not to a school or academic program. Therefore there are no truly new students in this calculation. We believe that the majority of the students who will enroll in this program would have otherwise been business administration majors who are drawn to the opportunity to follow a more specific curriculum path focused on supply chain management. Since the business administration major is currently the largest major offered within the School of Business, we do not expect this shift to have a significant impact on this current major program. Also, we do not expect the new major program in supply chain management to significantly impact enrollments in the global logistics and transportation program since students will still have the option of completing a minor in logistics while working towards the major in supply chain management.

8. Curriculum

- a) *Sample curriculum.*

The proposed program requires completion of 39 hours of general business curriculum, 15 hours of core supply chain curriculum, and 6 hours of approved electives. The complete curriculum is provided below.

Required Business Courses

ECON 200 ~or~ HONS 211 Principles of Microeconomics (3 credit hours)

ECON 201 ~or~ HONS 212 Principles of Macroeconomics (3 credit hours)

MATH 104 Elementary Statistics (3 credit hours)

OR

MATH 250 Statistical Methods I (3 credit hours)

MATH 105 Calculus for Business and Social Sciences (3 credit hours)

OR

MATH 120 Introductory Calculus (4 credit hours)

ACCT 203 Financial Accounting (3 credit hours)
ACCT 204 Managerial Accounting (3 credit hours)
DSCI 232 Business Statistics (3 credit hours)
MGMT 301 Management and Organizational Behavior (3 credit hours)
MKTG 302 Marketing Concepts (3 credit hours)
FINC 303 Business Finance (3 credit hours)
BLAW 205 Legal Environment of Business (3 credit hours)
DSCI 304 Production and Operations Management (3 credit hours)
DSCI 320 Management Information Systems (3 credit hours)

Required Supply Chain Core Courses

SCIM 366 Lean and Six Sigma (3 credit hours) *
SCIM 373 Supply Chain Planning and Analysis (3 credit hours) *
TRAN 312 Global Logistics & Transportation (3 credit hours)
MKTG 333 Purchasing and Supply Chain Management (3 credit hours)
SCIM 424 Supply Chain and Operations Strategy (3 credit hours) *

Upper-Level Elective Courses (Notes: Must complete 6 hrs of coursework from this list; Students minoring in GLAT may apply a maximum of 6 hrs from the GLAT program to the major)

SCIM 360: Special Topics in Supply Chain Management (3 credit hours) *
SCIM 371: Green Supply Chain (3 credit hours) *
SCIM 420 Independent Study (1-3 credit hours) *
SCIM 444: Internship in Supply Chain Management (3 credit hours) *
DSCI 406 Quantitative Methods and Decision Making (3 credit hours)
FINC 382 International Financial Markets (3 credit hours)
MKTG 326 International Marketing (3 credit hours)
TRAN 360 Special Topics in Intermodal Transportation (1-3 credit hours)
TRAN 431 Issues in Global Logistics (3 credit hours)
TRAN 432 Global Logistics Systems Management (3 credit hours)

* Indicates a new course

Note: Students majoring in Supply Chain Management may not double major in Business Administration.

b) All new courses with catalog type descriptions that are to be added to the institution's course catalog within five years.

SCIM 366: Lean and Six Sigma (3) This course will provide students with an introduction to Lean Six Sigma and the tool sets of Team Work and Time Management, Statistical Analysis, Elimination of Waste, process mapping, dashboards and other business improvement techniques. There is emphasis on voice of the customer and tools needed to measure those needs.

SCIM 373: Supply Chain Planning and Analysis (3) Covers the primary methods of analysis required for supply chain planning, with a special emphasis given to the quantitative modeling techniques used in developing and managing the performance of supply chain systems. Students will gain experience using the tools (e.g., analytical models) that generally qualify decision-making in supply chain environments.

SCIM 424 Supply Chain and Operations Strategy (3) This capstone course provides an opportunity for students to synthesize the knowledge gained in their previous coursework to integrate supply chain management, production and operations management, logistics and enterprise solutions to develop supply chain and operations strategies.

SCIM 360: Special Topics in Supply Chain Management (3) This subject presents a range of advanced topics in supply chain management providing a solid foundation of the theory and application of supply chain management techniques and practices for which no regular course is offered. This course may be repeated for credit if the content is different.

SCIM 371: Green Supply Chain (3) This course introduces students with tangible and intangible benefits of moving towards a green supply chain. The course prepares future supply chain managers with practical ways of building a socially and environmentally responsible strategy in their supply chains, by working with suppliers and customers.

SCIM 420 Independent Study (1-3) The student will select a reading or research project in consultation with a faculty member, who will guide the work and determine hours of credit to be allowed. A maximum of six credit hours of independent study may be applied toward business major elective requirement.

SCIM 444: Internship in Supply Chain Management (3) An internship is a supplemental source of learning designed to enhance the student's academic program and career objectives. The learning experience is guided by a learning contract outlining specific work and academic components. A total of three credit hours of supply chain management credit is awarded.

9. Assessment

Brief explanation of the assessments of student learning outcomes.

Program-level student learning outcomes will be assessed in a manner that is consistent with standards set forth by the Southern Association of Colleges and Schools (SACSCOC) and Association to Advance Collegiate Schools of Business (AACSB) accreditation bodies. Currently, the School of Business has a well-established approach to program assessment that has been evaluated by SACSCOC and AACSB. This process will be extended to include the proposed major. Program-level student learning outcomes will be assessed each year by the Department and the School of Business Assessment Committee. Similar to every other undergraduate program in the School of Business, assessment methods will include both direct and indirect measures. Examples include in-class assessment instruments (e.g., rubrics on communication and presentation skills, projects, course-embedded assessment, etc.); graduating student surveys; and feedback from internship and/or permanent employers; and the ETS Major Field Test for national benchmarking. The specific program-level student learning goals for the proposed major are:

1. Demonstrate the ability to use quantitative models in solving business-related problems in the field of supply chain management.
2. Demonstrate proficiency in the core areas of the supply chain management discipline (purchasing, logistics, planning, process control, supply chain integration) within a global context.
3. Demonstrate the ability to use current technology-based tools to acquire, store, retrieve, and analyze supply chain related information.

4. Demonstrate proficiency in both oral and written communication through the preparation and presentation of supply chain related information.
5. Demonstrate proficiency in the core business disciplines of accounting, finance, marketing, management, economics, and quantitative methods.

The following table presents a detailed mapping of specific program-level learning goals, onto the proposed program's curriculum.

	<u>Supply Chain Core Courses</u>					<u>Supply Chain Electives</u>				
	SCIM 366	SCIM 373	TRAN 312	MKTG 333	SCIM 424	SCIM 444	SCIM 360	SCIM 371	SCIM 420	SCIM 499
Ability to use quantitative models in solving business-related problems in the field of supply chain management.	I	R	--	R	D	D	R	--	R	D
Proficiency in the core areas of the supply chain management discipline within a global context.	I	I	I	I	D	R	R	R	R	D
Ability to use current technology-based tools to acquire, store, retrieve, and analyze supply chain related information.	R	R	--	--	D	--	R	--	D	D
Proficiency in both oral and written communication through the preparation and presentation of supply chain and related projects.	R	R	R	--	D	D	R	R	D	--

Notes: I=Introduced; R=Reinforced; D=Demonstrated. Learning goal #5 primarily addressed in required coursework that is beyond the scope of this table. As such, it has been left off.

In addition, the following table presents a mapping of some of the *in-class* assessment methods to be employed throughout the proposed program, to the stated learning outcomes of the program.

Program-Level Learning Outcomes	In-Class Assessment Method(s)		
	<i>How will each outcome be measured?</i>	<i>Who will be assessed, when, and how often?</i>	<i>How well should students do?</i>
Ability to use quantitative models in solving business-related problems in the field of supply chain management.	Quizzes/exams, case studies, and/or project work in almost all of the courses that make up the supply chain management major. Students should be able to identify the appropriate quantitative models to apply based on problem-related information and provide solutions using provided data.	100% of students majoring in supply chain management will be assessed at multiple points throughout the curricular path (DSCI 232, 304; MKTG 333; SCIM 366, 373, 424).	It is expected that on average, students will make a 70% or higher across these assignments.
Proficiency in the core areas of the supply chain management discipline within a	Case analysis and project required in the capstone course (SCIM 424). In SCIM 424, students will be required to produce case study reports and presentations,	100% of students majoring in supply chain management will be assessed in the capstone (SCIM	It is expected that at least 80% of students will get Acceptable in all levels of the associated rubric(s).

global context.	complete an exam, and produce a supply chain management project.	424).	
Ability to use current technology-based tools to acquire, store, retrieve, and analyze supply chain related information.	Measured via comprehensive technology-use exam in DSCI 320. Later measured via project required in the capstone course (SCIM 424). In SCIM 424, students will be required to produce a supply chain management project, requiring the collection and analysis of supply chain related information via technology based tools.	100% of students majoring in supply chain management will be assessed at both points in the curricular path (DSCI 320 and SCIM 424).	It is expected that at least 80% of students will get Acceptable in all levels of the associated rubric(s). These rubrics will be applied to the technology-use exam and subsequently in the capstone course.
Proficiency in both oral and written communication through the preparation and presentation of supply chain and related projects.	Measured via instructor and peer evaluation of student-prepared documents and student-delivered presentations, leveraging established rubrics on communication and presentation skills.	100% of students majoring in supply chain management will be assessed in SCIM 366, 373, and the capstone (SCIM 424).	It is expected that at least 80% of students will get Acceptable in all levels of the associated written/oral communication rubrics from instructor and peer evaluation.
<i>Notes: The information provided in this table relates only to direct and indirect in-class assessment methods. These in-class assessment methods will be coupled with multiple out-of-class measures including graduating student surveys; feedback from internship and/or permanent employers; and the ETS Major Field Test for national benchmarking.</i>			

- a) *Plan for programmatic assessment with a description of the program learning outcomes to be assessed and identification of multiple data to be collected.*

Programmatic assessment will also use both direct and indirect measures, and will target the learning outcomes detailed in 9a. Examples of these measures include employment data for graduates of the program, alumni feedback, and feedback from employers of graduates from the program. The overarching goal of this measurement will be to assess the extent to which the program is meeting the needs of the local community, as well as the broader market. Programmatic assessment will be handled, in part, by a newly created Supply Chain and Information Management Advisory Board, comprising local and regional business professionals, economic development officials, and/or alumni.

- b) *Explanation of how program evaluation and student performance assessment data will be used to initiate changes to the program, if needed.*

On an annual basis, assessment results will be provided to the School of Business Undergraduate Curriculum Committee for review and discussion. Focal points of the evaluation of assessment results will be on how well the program is performing at meeting the stated learning goals, as well as if/whether the program's learning goals continue to align with the needs of the local community and the broader market. For example, ETS Major Field Test scores will provide a national benchmark assessment for how well students are performing relative to their peers related to learning goals 1 and 5 as listed in 9a. This test is broken into a number of detailed sections representing key knowledge and skills in areas such as accounting, finance, marketing, management, economics, and quantitative methods. National benchmarking is available at very detailed levels, allowing the School to identify

specific areas of deficiency to target program changes. Rubrics, internship feedback, and in-class assessment will also allow for targeted changes to the program based on developmental goals at specific points in the curriculum. Employment data, employer feedback, and alumni feedback can inform assessment of the program's performance in accomplishing the stated learning goals *and* whether or not the stated learning goals continue to align with industry needs. If/when assessment data indicates the need to initiate changes, the department chair will work in conjunction with the School of Business Undergraduate Curriculum Committee and the School of Business Assessment Committee to propose, evaluate, and approve changes to the program.

10. Faculty

- a) *Faculty List table detailing the rank (not name) and academic qualifications of each faculty member who will be involved in the proposed program (Table B).*

Rank	Highest Degree Earned	Field of Study	Teaching in Field (Yes/No)
Professor #1	DBA	Logistics/Transportation	Y
Professor #2	DBA	Quantitative Analysis	Y
Associate Professor #1	Ph.D.	Mfr. Mgmt & Engineer.	Y
Associate Professor #2	Ph.D.	Industrial Engineering	Y
Associate Professor #3	Ph.D.	Mgt. Science/MIS	Y
Associate Professor #4	Ph.D.	Mgt. Science/MIS	Y
Associate Professor #5	Ph.D.	Intl Prod/ Ops Mgt	Y
Assistant Professor #1	Ph.D.	Ops/Supply Chain Mgt.	Y
New Hire #1	--	--	--
New Hire #2	--	--	--

- b) *Enumeration and discussion of the necessary qualifications of new faculty and staff who will be added in support of the proposed program.*

The required qualification for the two new faculty hires (listed in Table 10a) is a Ph.D. in Supply Chain Management or a related field such as Data Analytics or Information Management. As an AACSB-accredited School, this will help to ensure we maintain the required percentage of Scholarly Academics in the classroom in the supply chain management program. Per AACSB's guidelines, these individuals generally must possess a terminal degree in the primary area of their teaching responsibilities and maintain their status by engaging regularly in scholarship and related activities. No new staff hires will be necessary.

- c) *In the case of currently-employed faculty and administrators, an explanation of proposed changes in assignment and of the extent to which each new assignment may require the addition of new positions to fulfill the former assignment.*

The vast majority of teaching assignments for current faculty are for courses that are part of the proposed major in supply chain management. As such, while existing faculty will be responsible for covering some of the new courses offered in the program, the inclusion of this major will not result in significantly different assignments for any current faculty. This is due to the fact that, over the past two years, two additional faculty lines were allocated to supply chain management faculty, in order to develop and teach new courses in the area of supply chain management. As it stands, one of the lines is filled and we are currently in the process of filling the second. In addition to these two lines, we are currently in the process of filling a third line which will also be leveraged in the supply chain management program. Moreover, existing faculty in the School offer expertise in the different areas of supply chain management, including: Logistics, Quantitative Methods, Manufacturing, Industrial Engineering, and Management Science.

With the inclusion of these new faculty members, the School of Business possesses the capacity and expertise necessary to deliver a successful curriculum in the area of supply chain management. We are positioned such that existing faculty will be able to cover all of the coursework involved in this proposed major.

d) Institutional plan for faculty development.

Faculty will be encouraged to take advantage of all of the opportunities for professional development provided by the College and with the business community.

e) Institutional definition of full-time equivalent (FTE).

The institutional definition of FTE is requiring a minimum commitment of 40 hours per week. Roster faculty workload is based on a “four-course” workload equal to 100% or 1.0 FTE per semester, or 24 credits per year.

f) Unit Administration, Faculty, and Staff Support Table (Table C).

UNIT ADMINISTRATION/FACULTY/STAFF SUPPORT						
YEAR	NEW		EXISTING		TOTAL	
	Headcount	FTE	Headcount	FTE	Headcount	FTE
Administration						
2014-15			1	.25	1	.25
2015-16			1	.25	1	.25
2016-17			1	.25	1	.25
207-18			1	.25	1	.25
2018-19			1	.25	1	.25
Faculty						
2014-15			10	7.83	10	7.83
2015-16			10	7.83	10	7.83
2016-17			10	7.83	10	7.83

2017-18			10	7.83	10	7.83
2018-19			10	7.83	10	7.83
Staff						
2014-15			1	.5	1	.5
2015-16			1	.5	1	.5
2016-17			1	.5	1	.5
2017-18			1	.5	1	.5
2018-19			1	.5	1	.5
<i>Notes: Faculty & staff numbers include time & effort allocated to courses dedicated to the proposed major as well as courses taught by supply chain faculty that are shared with other programs. The proposed major comprises of 15 hrs of "new" coursework (SCIM 366, 373, 424; Elective 1; Elective 2) and 15 hrs of "shared" coursework (DSCI 232, 304, 320; TRAN 312; MKTG 333).</i>						

11. Physical Plant

- a) *Extent to which existing physical plant will be adequate to provide space for the proposed program for at least the first five years and b) explanation of how any additional physical plant requirements are to be financed.*

We do not anticipate any new space requirements as a result of the new program for five years. Existing facilities can be used to accommodate teaching and research requirements for the new program for the foreseeable future. In addition, there is no equipment needed that is unique to the proposed program.

12. Equipment

There is no unique equipment needed for the program for at least five years.

13. Library Resources

- a) *Qualitative and quantitative (i.e., number of monographs, number of serials, etc.) assessment of current holdings in view of the new program being proposed.*

The Association of College and Research Libraries' Standards for Libraries in Higher Education encourages using existing institutional peer groups for quantitative comparisons. The College of Charleston Office for Institutional Research and Planning provided a list of Institutional Peers which includes our South Carolina Peers, Aspirational Peers, Top Competitors, and National Peers. Gobi software from our library services book vendor, Baker & Taylor, allows the library staff to compare our collection against those of our peers. For the Library of Congress subject heading, business logistics, which includes supply chain management and related subjects, there have been 283 titles purchased by our peers in the last 10 years. Of these titles, 114 or 40% have been acquired by College of Charleston Libraries. Remaining funds in this year's library budget may be used to purchase additional titles already selected by the School of Business faculty.

- b) *Quantitative estimate of independent acquisitions needed annually for at least the first five years and the estimated additional cost of these acquisitions.*

In addition to the books already in our collection and those that can be purchased with existing allocations in the coming year, 259 additional titles are available through PASCAL. The core journals needed for the program are already available in the College of Charleston Libraries' ejournal collection. In addition, current database resources are sufficient to support the proposed major.

Book titles: For the Library of Congress subject heading, business logistics, which includes supply chain management and related subjects, there have been 283 titles purchased by our peers in the last 10 years. Of these titles, 114 or 40% have been acquired by College of Charleston Libraries. Remaining funds in this year's library budget may be used to purchase additional titles already selected by the School of Business faculty. An additional 259 titles are available through PASCAL. Core journals available electronically include:

1999- Now	Journal of Supply Chain Management
3/1/2000-Now	Supply Chain Management Review
1996-Now	Supply Chain Management
2003- Now	Supply Chain Forum
1995- Now	Journal of Operations Management
1994- Now	International Journal of Operations and Production Management
3/1/78- Now	Journal of Business Logistics
1990- Now	International Journal of Logistics Management

Databases:

Business Abstracts with Full Text Offers a multitude of business magazines and scholarly journals: this comprehensive database contains the full text of articles from more than 510 key publications dating back to 1995, and provides access to product evaluations, interviews, biographical sketches, corporate profiles, obituaries, surveys, statistical rankings, book reviews and reports from associations, societies, trade shows, conferences and more.

Business Insights: Essentials Combines all of the content formerly found in *Business & Company Resource Center* with a new interface designed around the research goals and workflows of your diverse business research community.

Business Source Complete Provides full text for over 2,300 scholarly business journals covering management, economics, finance, accounting, international business and much more.

Emerald Full Text Full text access to current journal articles covering numerous aspects of management including accounting, business management, environmental management, library science, marketing, professional development, and more.

IBISWorld - US Industry Reports Since 1971 IBISWorld has provided thoroughly researched, accurate and current business information. IBISWorld's unrivalled range of industry analysis is available online whenever you need it.

Import Genius Collects and organizes hundreds of millions of shipping manifests and customs records from government agencies and private companies around the world. Students and faculty can now access these datasets to research private and public companies to find out what they import and export, learn who their trading partners are, analyze industry trends, and more.

LexisNexis Academic A leading global provider of content-enabled workflow solutions designed specifically for professionals in the legal, risk management, corporate, government, law enforcement, accounting, and academic markets.

Marketline A leading provider of quality information on companies, industries and countries. Offers a comprehensive & unique collection of information in a variety of user-friendly formats, including interactive reports & databases. Compiled by its global research team, these products are ideal for helping build a thorough understanding of markets, whether researching for qualifications, jobs or business.

Value Line Investment Survey -- Standard Edition Comprehensive source of information and advice on approximately 1,700 stocks, 90+ industries, the stock market, and the economy.

Wall Street Journal Full-text of the financial newspaper of record offering in-depth coverage of national and international finance. Covers from 1984 to the present.

- c) *Description of how statewide higher education electronic library (PASCAL) impacts the proposed program (include universal borrowing and electronic databases).*

The resources available through PASCAL will serve as a supplement to the existing resources available on location in the College of Charleston libraries and through existing e-journal collection and electronic databases. The number of book titles related to supply chain management available through PASCAL is noted in 13b.

14. Accreditation, Approval, Licensure, and Certification

- a) *Accreditation process and when accreditation may be reasonably expected.*

The proposed program is subject to accreditation by SACSCOC and AACSB. The information regarding the SACSCOC re-accreditation process is summarized from their website (www.sacs.org). The SACSCOC re-accreditation process involves a Compliance Certification document submitted by the institution demonstrating compliance with the Core Requirements, Comprehensive Standards, and Federal Regulations outlined in the SACSCOC Principles of Accreditation handbook. The institution must also develop a Quality Enhancement Plan (QEP) that describes a specific course of action to address one or more well-defined issues related to improving student learning. A SACSCOC committee examines the documents and recommends areas of interest to the on-site review team, who examine data and conduct interviews to determine the soundness of the QEP and the level of compliance with the Principles of Accreditation. The review team drafts a preliminary report and presents their findings to the appropriate administrators. The final report of the review team and the institution's responses are reviewed by the Committee on Compliance and Reports, who makes a recommendation to the Executive Council of the Commission, who then makes a recommendation to the Commission on Colleges.

The following information about the AACSB accreditation process is summarized from their website (www.aacsb.edu); information on the re-accreditation process is not readily available, so the initial process is discussed. The accreditation process starts when the school becomes a member of AACSB International and submits an Eligibility Application. The Pre-Accreditation Committee appoints a mentor and

provides direction to which will be used to help the school prepare an Accreditation Plan. The Accreditation Coordinating Committee reviews the revised Eligibility Application and rules on any remaining eligibility issues, at which time the mentor can help the school finalize the Strategic Plan containing the Accreditation Plan. The Pre-Accreditation Committee either approves the Accreditation Plan or suggests changes to be made before approval; once that approval is obtained, the Accreditation Plan is sent to the Initial Accreditation Committee, who either approves the plan or suggests changes that again must be made before approval. Accreditation must be obtained within five years of plan acceptance by the Initial Accreditation Committee, the school can continue to work with their mentor for another three years, and annual reports to AACSB detail progress toward, or delays in, achieving accreditation. Two years before the accreditation site visit, a Peer Review Team chair is appointed by AACSB to monitor progress over the last two years of the Accreditation Plan and to help the school prepare a Self-Evaluation Report. The remaining Peer Review Team members are appointed, asked to review the Self-Evaluation Report, and sent to conduct the site visit. After the site visit, the Peer Review Team provides a report to the school and the Initial Accreditation Committee with a recommendation regarding accreditation. As long as the Initial Accreditation Committee agrees with the team's recommendation, the decision is sent to the AACSB Board for final approval. Since the College of Charleston is already accredited by SACSCOC and the School of Business is already accredited by AACSB, the proposed program would be covered under these existing accreditations.

b) *Additional licensure or certification requirements.*

There are no obligatory certifications or licensures required for graduates of a baccalaureate degree program in supply chain management.

15. Articulation

- a) *Proposed associate-level programs should show a path for graduates to move into a related baccalaureate program.* b) *Proposed baccalaureate-level programs should show an entry path for students from two-year institutions, as appropriate.*

The Statewide Articulation Agreement requires that state four-year institutions provide the full agreement along with substantial supporting information on the institution's website, including a list of courses approved for transfer from two-year institutions and their institutional equivalents. According to that information, with careful course selection, a transfer student entering from a two-year institution can have all general education and lower-level business courses accounted for, with the exceptions of MATH 250 (should they choose this option) and DSCI 232. The table below outlines a typical course sequence for a student transferring to the College of Charleston as a from a two-year institution in South Carolina.

Typical Course Sequence for SCM Major Transferring from a State Two-Year Institution							
Freshman Year				Junior Year			
Fall		Spring		Fall		Spring	
Course	Hrs	Course	Hrs	Course	Hrs	Course	Hrs
ENG 101	3	ENG 102	3	DSCI 232	3	BLAW 205	3

HIS 101(4)	3	HIS 102(5)	3	MKTG 302	3	DSCI 304	3
Natural Sci	4	Natural Sci	4	MGMT 301	3	MKTG 333	3
MAT 120	3	Humanities	3	DSCI 320	3	TRAN 312	3
Foreign Lan.	3	Foreign Lan.	3	Free Elect.	3	Free Elect.	3
Total	16	Total	16	Total	15	Total	15
Sophomore Year				Senior Year			
Fall		Spring		Fall		Spring	
Course	Hrs	Course	Hrs	Course	Hrs	Course	Hrs
ECO 211	3	ECO 210	3	SCIM 373	3	SCIM 424	3
ACC 101	3	ACC 102	3	SCIM 366	3	SCIM Elect	3
MAT 130	3	BUS 121	3	SCIM Elec	3	FINC 303	3
Humanities	3	Humanities	3	Humanities	3	Free Elec	3
Humanities	3	Foreign Lan.	3	Free Elec	3	Free Elec	3
Foreign Lan.	3						
Total	18	Total	15	Total	15	Total	15

16. Estimated Costs and Sources of Funding

a) *Estimated Costs and Sources of Financing by Year table, which shows estimated annual costs for at least the first five years (Table D).*

ESTIMATED COSTS BY YEAR						
CATEGORY	1st	2nd	3rd	4th	5th	TOTALS
Program Admin.	33,975	33,975	33,975	33,975	33,975	169,875
Faculty Salaries	1,040,372	1,040,372	1,040,372	1,040,372	1,040,372	5,201,860
Grad. Assistants	0	0	0	0	0	0
Support Personnel	21,357	21,357	21,357	21,357	21,357	106,785
Supplies & Mater.	2,500	2,500	2,500	2,500	2,500	12,500
Library Resources	0	0	0	0	0	0
Equipment	0	0	0	0	0	0
Facilities	0	0	0	0	0	0
Other (Identify)	0	0	0	0	0	0
TOTALS	1,098,204	1,098,204	1,098,204	1,098,204	1,098,204	5,491,020
SOURCES OF FINANCING BY YEAR						
Tuition Funding	2,288,430	2,288,430	2,288,430	2,288,430	2,288,430	11,442,150
Program Fees						
State Funding						
Fund Reallocation						
Federal Funding						
Other Funding						
TOTALS	2,288,430	2,288,430	2,288,430	2,288,430	2,288,430	11,442,150
Note: Assumptions for Table D provided in 16b below.						

- b) *Statement of assumptions for Table D, including the estimated number of students, both in-state and out-of-state, enrolled in the program.*

Program Administration obtained by first calculating average salary (with benefits) of faculty members assigned to the supply chain management major. Average was then multiplied by .25 to project the annual cost of program administration.

Faculty Salary obtained by calculating each participating faculty member's 9-month salary, plus 30% for benefits to project total annual compensation. Projected compensation was then multiplied by the proportion of teaching he/she is assigned to in the proposed major (also reflected in the FTE calculations in Table D). No adjustment was made for potential increases in faculty salaries or future increases in tuition, and no deflator was applied to reflect research and/or service.

Support Personnel obtained by taking 1/2 of the annual salary (with benefits) of current personnel.

Tuition Funding obtained by first adding up the projected total number of sections taught (annually) for courses involved in the proposed major. That total was then multiplied by a factor of 30, representing the average number of students per class across all projected sections. The student total estimate was then multiplied by 3 to project total credit hours. Finally, the credit hour projection was multiplied by \$541, reflecting per-credit-hour revenues from a mix of 65% in-state (\$301 per hour) and 35% out-of-state (\$987 per hour).

- c) *Unique costs or other special state appropriations required or requested.*

No unique costs or other special state appropriations have been or will be required or requested for this proposed program.

- d) *Information regarding how estimated program costs will be financed.*

Programs in the School are funded with tuition dollars. Because the faculty assigned to this program are currently employed by the school or in the process of being hired, there are few if any additional new program costs. As such, financing the program will primarily involve a reallocation within the School of Business.