

**New Program Proposal  
Bachelor of Science in Tactical Strength and Conditioning  
The Citadel**

**Summary**

The Citadel requests approval to offer the program leading to the Bachelor of Science in Tactical Strength and Conditioning to be implemented in Fall 2019. The proposed program is to be offered through online delivery. The following chart outlines the stages of approval for the proposal. The Advisory Committee on Academic Programs (ACAP) voted to recommend approval of the proposal. The full program proposal is attached.

<b>Stages of Consideration</b>	<b>Date</b>	<b>Comments</b>
Program Proposal Received	10/1/18	Not Applicable
Comments and suggestions from CHE staff sent to the institution	11/7/18	Staff requested revisions to the proposal to adequately address program questions.
Revised Program Proposal Received	11/15/18	The revised proposal was submitted for ACAP consideration.
ACAP Consideration	11/29/18	<p>The Citadel representatives introduced the proposed program, citing the current, widespread adverse economic and tactical impact of low fitness on military readiness during basic combat training. The online platform does not prohibit student engagement on The Citadel’s campus, but does enable access to the proposed program for enrollees across the country.</p> <p>ACAP members discussed the program, with the Coastal Carolina University representative citing its own exercise science program under the same CIP code missing from the proposal comparison. Coastal Carolina also questioned the demand for the program. The Citadel representatives agreed to update the proposal, and explained the program is part of the institution’s long-term strategic planning to offer credentials on varied levels in tandem with implementing a center on holistic fitness. The programs and the center will provide state and national leadership in fitness, and will combat obesity and poor mental and spiritual health through academic, research and community outreach programs with important stakeholders.</p> <p>The Tactical Strength and Conditioning program will prepare graduates for careers in the military, or as law enforcement or other first responders, or commercial fitness. Representatives and their uniformed military guest stationed in SC noted enrollment and employment estimates are conservative and sound.</p> <p>After remaining discussion, ACAP voted to recommend approval of</p>

		the program proposal. Staff transmitted remaining questions for additional clarity.
Comments and suggestions from CHE staff sent to the institution	12/10/18	Staff requested the proposal be revised to: <ul style="list-style-type: none"> <li>• Provide better comparative information about related programs in the state;</li> <li>• Include additional programs such as Coastal Carolina’s, in the comparison; and</li> <li>• Include clarification provided at the meeting</li> </ul>
Revised Program Proposal Received	1/9/19	The revised proposal satisfactorily addressed the requested revisions.

**Recommendation**

The Staff recommend the Committee on Academic Affairs and Licensing approve the program leading to Bachelor of Science in Tactical Strength and Conditioning to be implemented in Fall 2019.

**Additional Information**

**The Citadel Student and Program Data**

<b>Graduate In-/Out-of-State Enrollment, Fall 2017</b>	752 (85.45%) / 128 (14.55%)
<b>Number of Approved Programs in 10 Yrs. (FY 2009 -- 2018)</b>	18
<b>Number of Terminated Programs in 10 Yrs. (FY 2009 -- 2018)</b>	2

**Industry related Occupational Wages and Projections in South Carolina, 2016 – 2026\***

<b>Occupational Field<sup>1</sup></b>	<b>2016 Median Income<sup>2</sup></b>	<b>.2016 Estimated Employment<sup>3</sup></b>	<b>.2026 Projected Employment</b>	<b>Total 2016-2026 Employment Change</b>	<b>.2016-2026 Annual Avg. Percent Change</b>	<b>.Total Percent Change</b>
Life, Physical, and <b>Social Science</b>	\$57,550	10,547	11,445	898	0.82%	8.51%
Education, Training, and Library	\$45,440	114,248	126,874	12,626	1.05%	11.05%

<sup>1</sup> “Occupational Field” represents the closest related occupation category that includes the occupations aligned with the program proposal.

<sup>2</sup> SC Department of Employment & Workforce (DEW), Labor Market Information. (2018). Occupational Wage Rates for Multiple Occupations in South Carolina in 2014-2024 [Data file]. Retrieved from <https://jobs.scworks.org/vosnet/lmi/default.aspx?pu=1>

<sup>3</sup> SC Department of Employment & Workforce (DEW), Labor Market Information. (2018). Occupational Projections (Long-term) for Multiple Occupations in South Carolina in 2014-2024 [Data file]. Retrieved from <https://jobs.scworks.org/vosnet/lmi/default.aspx?pu=1>

\* Data downloaded April 27, 2018

## NEW PROGRAM PROPOSAL FORM

Name of Institution:

The Citadel, The Military College of South Carolina

Name of Program (include degree designation and all concentrations, options, or tracks):

Bachelor of Science in Tactical Strength and Conditioning

Program Designation:

- |   |  |
|---|--|
| <input type="checkbox"/> Associate's Degree   | <input type="checkbox"/> Master's Degree   |
| <input checked="" type="checkbox"/> Bachelor's Degree: 4 Year   | <input type="checkbox"/> Specialist  |
| <input type="checkbox"/> Bachelor's Degree: 5 Year  | <input type="checkbox"/> Doctoral Degree: Research/Scholarship (e.g., Ph.D. and DMA) |
| <input type="checkbox"/> Doctoral Degree: Professional Practice (e.g., Ed.D., D.N.P., J.D., Pharm.D., and M.D.) |  |

Consider the program for supplemental Palmetto Fellows and LIFE Scholarship awards?

- Yes  
 No

Proposed Date of Implementation:

Fall 2019

CIP Code: 310505

Delivery Site(s): Online

Delivery Mode:

- |  |   |
|--|---|
| <input type="checkbox"/> Traditional/face-to-face<br>*select if less than 25% online | <input checked="" type="checkbox"/> Distance Education                  |
|  | <input checked="" type="checkbox"/> 100% online                         |
|  | <input type="checkbox"/> Blended/hybrid (50% or more online)            |
|  | <input type="checkbox"/> Blended/hybrid (25-49% online)                 |
|  | <input type="checkbox"/> Other distance education (explain if selected) |

Program Contact Information (name, title, telephone number, and email address):

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[dbornste@citadel.edu](mailto:dbornste@citadel.edu)

Institutional Approvals and Dates of Approval (include department through Provost/Chief Academic Officer, President, and Board of Trustees approval):

### Institutional Dates of Approval

Department of Health and Human Performance: 09/07/2018  
Dean of The Citadel School of Science and Mathematics: 09/07/2018  
The Citadel Undergraduate Curriculum and Instruction Committee: 09/18/2018  
Faculty Senate: 9/21/2018  
Provost: 9/21/2018  
President and Board of Visitors: 9/28/2018

### **Background Information**

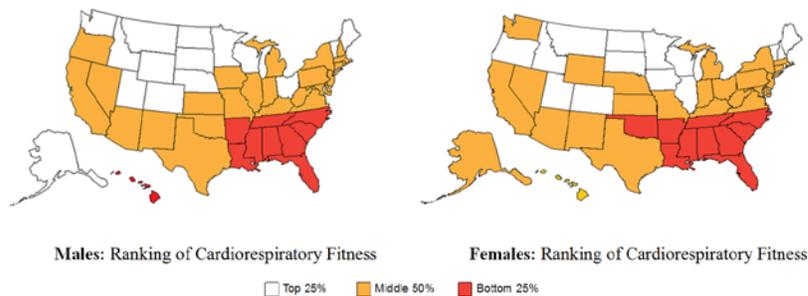
State the nature and purpose of the proposed program, including target audience, centrality to institutional mission, and relation to the strategic plan.

#### **Nature and Purpose:**

##### Economic and tactical Impact of low fitness on military readiness during basic combat training.

Currently 71% of young Americans cannot qualify for military service, in most cases because they are either too fat, or too physically unfit to serve<sup>1</sup>. Among those who do qualify for military service, injuries sustained during basic training have steadily risen, are now the most common reason for delayed graduation and/or attrition from basic training, and are predominantly due to low fitness<sup>2</sup>. In 2007, the armed services spent roughly \$1.5 billion for obesity-related health care expenses and costs to replace unfit military personnel<sup>3</sup>. Recent research led by The Citadel demonstrated that Army recruits from South Carolina are among the least physically fit and most likely to become injured as compared to recruits from other U.S. states<sup>4</sup>.

Physical Fitness Levels of US Army Recruits Entering Basic Training from 2010-2013 (n=288,468)<sup>4</sup>



#### Additional impacts of low fitness on national security.

<sup>1</sup> Christeson W, Dawson Taggart A, Messner-Zidell S. *Too Fat to Fight: Retired Military Leaders Want Junk Food Out of America's Schools*. Washington, DC: Mission Readiness. 2010.

<sup>2</sup> Boivin MR, Cowan DN, Packnett ER, et al. *Accession Medical Standards Analysis & Research Activity 2016 Annual Report*. Silver Spring, MD: Walter Reed Army Institute of Research; 2016

<sup>3</sup> Voss, J. D., G. Pavela, and F. C. Stanford. 2018. Obesity as a threat to national security: The need for precision engagement. *International Journal of Obesity*. Published online March 9, 2018. doi: 10.1038/s41366-018-0060-y

<sup>4</sup> Bornstein, D., Grieve, G., Clennin, M., McLain, A., Whitsel, L., Beets, M., Hauret, K., Jones, B., Sarzynski, M. (2018). Which U.S. States Pose the Greatest Threats to Military Readiness and Public Health? Public Health Policy Implications for a Cross-Sectional Investigation of Cardiorespiratory Fitness, Body Mass Index, and Injuries Among US Army Recruits. *Journal of Public Health Management and Practice*. doi: 10.1097/PHH.0000000000000778

The problem of low physical fitness of Army recruits highlighted above is just one example of the pervasive and troublesome nature of low fitness. The economic and tactical problems associated with low physical activity and low fitness across the population extend to<sup>5,6</sup>:

- All branches of the military
- All components of the military (active duty, guard, and reserve forces)
- All military service members across their lifespan, including veterans
- Police departments, fire departments and other first-responder units across the state and nation

#### The emerging field of Tactical Strength and Conditioning

The proposed Bachelor of Science in Tactical Strength and Conditioning is designed to meet the rapidly growing demand for experts who have the skills and knowledge to improve the fitness of military and paramilitary personnel. Currently, there is no other college or university in the country that offers a Bachelor of Science Degree in Tactical Strength and Conditioning. Graduates from this program will have the knowledge, skills, and experience required to successfully help improve the physical fitness of “tactical athletes” so that they may successfully serve and defend our communities, state, and nation. The term tactical athlete (TA) refers to military and paramilitary personnel (e.g. law enforcement officers, firefighters, first responders), who require highly unique physical training. Sport athletes also have unique physical demands for which they must be properly trained in order to succeed. TAs differ from sport athletes in that TAs’ success or failure is a matter of life and death, not wins or losses. The field of Sport Strength and Conditioning is decades-old, has successfully studied the science of developing and implementing programs to improve performance of sport athletes, and Sport Strength and Conditioning Coaches have a mean annual base salary of \$55,661<sup>7</sup>. The salary range for Tactical Strength & Conditioning Coaches cannot yet be determined as it is a newly emerging field. Special Forces units within the military (e.g. Navy Seals, Delta Force) have benefitted from having embedded strength and conditioning experts, experienced in working with TAs, for over ten years. Now however, the entire U.S. Armed Forces, and other paramilitary units, have recognized the need for Tactical Strength & Conditioning Coaches across all units in order to overcome the challenges of a population of Americans that is increasingly less physically fit for service.

#### Program Objectives

- Help establish The Citadel and the State of South Carolina as leaders in providing real-world solutions to the problems of obesity and low fitness as they relate to military readiness and national security.
- Establish an on-line undergraduate Bachelor of Science degree completion program in Tactical Strength and Conditioning in order to improve the readiness of military and paramilitary personnel, locally, nationally, and globally.
- Provide active duty military personnel with an opportunity to earn a Bachelor of Science degree that will significantly increase their earning potential and ability to receive promotion while serving in the US Armed Forces.
- Provide active duty military personnel with an opportunity to earn a Bachelor of Science degree that will significantly increase their marketability and employability upon having completed their military service.
- Establish an on-line undergraduate Bachelor of Science degree completion program in Tactical Strength and Conditioning in order to improve the fitness and health of recreational tactical athletes, and the general public.

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<sup>5</sup> National Research Council. Physical fitness and musculoskeletal injury. In: Sackett P, Mavor S, eds. *Assessing Fitness for Military Enlistment: Physical, Medical, and Mental Health Standards*. Washington, DC: National Academies Press; 2006:66–108

<sup>6</sup> Kodama S, Saito K, Tanaka S, et al. Cardiorespiratory fitness as a quantitative predictor of all-cause mortality and cardiovascular events in healthy men and women: a meta-analysis. *JAMA*. 2009;301(19):2024–2035

<sup>7</sup> Glassdoor.com. [https://www.glassdoor.com/Salaries/strength-and-conditioning-coach-salary-SRCH\\_KO0,31.htm](https://www.glassdoor.com/Salaries/strength-and-conditioning-coach-salary-SRCH_KO0,31.htm)

- Through on-line delivery, provide an easily accessible, robust learning experience to those without access to The Citadel campus.
- Provide employment opportunities to meet the growing workforce demands within the emerging field of tactical strength and conditioning.
- Provide an avenue for graduate education in the health and allied health fields.

#### Student Learning Outcomes

1. Understand the overall importance of and demonstrate abilities in critical thinking, quantitative and qualitative reasoning, and persuasive written and oral communication.
2. Understand and analyze essential concepts in anatomy, physiology, biomechanics, and bioenergetics as they relate to human performance in general and tactical populations.
3. Understand and analyze essential concepts and principles of nutrition as they relate to health and human performance in general and tactical populations.
4. Gain knowledge in and be able to apply concepts of human physiological performance testing as they relate to general and tactical populations, and specific physiological tasks.
5. Gain knowledge of psychology, mental and spiritual health of warfighters, firefighters, law enforcement officers and other first responders.
6. Apply concepts and principles of health and human performance to the development of strength and conditioning programs that will improve the readiness and resiliency of warfighters, firefighters, law enforcement officers and other first responders.
7. Understand and apply core concepts in servant leadership for helping others develop and maintain lifelong healthy living habits.

#### Target Audiences:

- The primary target audience for this program is military personnel looking to complete a 4-year degree that will improve their earning potential within the military and will assist them in advancing their military career by having skills, knowledge, and expertise that will contribute to a specialized primary, or secondary M.O.S. as a Tactical Strength and Conditioning Coach in order to improve the readiness of their fellow service members.
  - The US Army's "Master Fitness Trainer"<sup>8</sup> and the USMC's "Force Fitness Instructor"<sup>9</sup> provide specialty training for active duty Soldiers and Marines in the areas of personal training and strength and conditioning. However, neither of the aforementioned programs leads to a B.S. degree, and neither will be sufficient to meet the demand across all military branches and components.
  - The most recent iteration of the *Doctrine for the Armed Forces of the United States*<sup>10</sup> explicitly states the need for "Total Forces Fitness" as a value for all military branches and all components (active duty, guard, and reserves). Because The Citadel is a Senior Military College that is not branch specific, it is very uniquely positioned to meet the Total Force Fitness need stated in the *Doctrine for the Armed Forces of the United States*.
  - As identified in *South Carolina National Guard Leader Development Strategy*<sup>11</sup>, civilian education is critical to the development of successful leaders. As an on-line degree, the proposed program will

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<sup>8</sup> U.S. Army Master Fitness Trainer. <http://www.benning.army.mil/tenant/wtc/MFTC.html>

<sup>9</sup> United States Marine Corps Force Fitness Instructor. <https://www.fitness.marines.mil/Force-Fitness-Instructor/>

<sup>10</sup> Gen Martin E. Dempsey (2017). Joint Publication 1, *Doctrine for the Armed Forces of the United States* 25 March 2013, Incorporating Changes 1, 12 July, 2017

<sup>11</sup> South Carolina Army National Guard, *Leader Development Strategy* (Office of the Adjutant General of South Carolina, Version 1.0, 13AUG2014); <https://www.scgard.com/lds-manual/wp-content/uploads/sites/3/2014/11/SCARNG-LDS-Regular.pdf>

provide access for leadership development whether service members are stationed locally, nationally, or internationally.

- The secondary target audience for this program is non military personnel wanting to complete a 4-year degree that will provide them with employment opportunities as a Tactical Strength and Conditioning Coach to serve:
  - as a civilian contractor working within the military
  - other tactical units (i.e. police, fire, etc)
  - in the fitness and health industry working with recreational tactical athletes (i.e. Cross-fit Games or Ultimate Ninja Warrior competitors)
  - in the fitness and health industry working with the general population to improve fitness and reduce obesity

### **Centrality to Institutional Mission and Relation to Strategic Plan:**

#### **Centrality to Mission:**

The core mission of The Citadel is to “educate and prepare graduates to become principled leaders in all walks of life by instilling the core values of The Citadel in a challenging intellectual environment.” In order to accomplish that mission, The Citadel has four institutional pillars, of which “fitness” is one. The Citadel provides cadets with academic and experiential learning programs to provide them with skills and knowledge for their own physical fitness and for taking a leadership role in the physical fitness of others. The program being proposed here extends The Citadel’s academic and experiential learning programs around physical fitness to a much broader audience, therefore increasing The Citadel’s ability to impact the readiness of members of our Armed Forces, police departments, and fire departments state-, nation-, and Worldwide.

#### **Relation to Strategic Plan:**

The proposed program is key element in a proposed new center at the Citadel, The Center for Performance, Readiness, Resiliency, and Recovery (CPR3)

. CPR3 is a prominent initiative in The Citadel’s 2024 Strategic Plan. Therefore, CPR3, and this program in particular, are perfectly aligned with the institution’s strategic plan.

### **Assessment of Need**

Provide an assessment of the need for the program for the institution, the state, the region, and beyond, if applicable.

#### **Need for the program for the institution:**

By moving to an online model, the proposed Bachelor of Science in Tactical Strength and Conditioning allows The Citadel to broaden its reach with a highly unique degree program designed for an emerging professional area that is poised for exponential growth.

#### **Need for the program for the state, region, and nation:**

High levels of obesity and low levels of physical activity and physical fitness are pervasive across the state, region and nation<sup>12</sup>. In addition to the military readiness and national security issues addressed previously in this proposal,

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<sup>12</sup> Centers for Disease Control and Prevention. *State Indicator Report on Physical Activity*. Atlanta, GA: US Department of Health and Human Services; 2014

obesity and physical activity have been labeled the greatest health, social, and economic challenges of the 21<sup>st</sup> century<sup>13</sup>, with levels of obesity and physical inactivity being particularly high among southern states, including South Carolina<sup>14</sup>. Graduates of the proposed B.S. in Tactical Strength and Conditioning will have specialized skills to help the state, region, and nation improve the readiness of our military and paramilitary populations. Additionally, graduates will have skills and knowledge that can be applied to help the state, region, and the nation effectively combat obesity, physical inactivity, and low physical fitness in the general population.

**Transfer and Articulation**

Identify any special articulation agreements for the proposed program. Provide the articulation agreement or Memorandum of Agreement/Understanding.

The Citadel has an existing articulation agreement with the US Army Public Health Center for research in fitness and military readiness (attached). Upon degree program approval, the institution will seek to develop additional agreements/MOU with military and paramilitary entities and localities to serve as both a pipeline for students and as internship sites for students enrolled in the program. Examples of entities and localities include:

- US Army Training Center-Ft. Jackson
- MCRD Parris Island
- South Carolina National Guard
- Marine Corps Base Quantico
- Joint Base Charleston
- US Army Research Institute of Environmental Medicine
- Charleston City Police Department
- Charleston City Fire Department
- Ralph H. Johnson VA Medical Center

**Employment Opportunities**

Occupation	State		National		Data Type and Source
	Expected Number of Jobs	Employment Projection	Expected Number of Jobs	Employment Projection	
Tactical Strength and Conditioning Coach	430		23,854		<a href="#">Governing.com</a> . Retrieved 09/12/2018
Sport Strength and Conditioning Coach	182		5,071		<a href="#">Indeed.com</a> . Retrieved 09/13/2018
Personal Fitness Trainer	274		22,243		<a href="#">Indeed.com</a> . Retrieved on 09/13/2018

<sup>13</sup> Bipartisan Policy Center’s Nutrition and Physical Activity Initiative. *Lots to Lose: How America’s Health and Obesity Crisis Threatens Our Economic Future*. Washington, DC: Bipartisan Policy Center;2012.

<sup>14</sup> Centers for Disease Control and Prevention. Prevalence of self reported obesity among U.S. adults by state and territory, BRFSS,2015. <https://www.cdc.gov/obesity/data/prevalence-maps.html>.

Health and Wellness Coach	79		6,091		<a href="https://www.indeed.com">Indeed.com</a> . Retrieved on 09/13/2018
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**Supporting Evidence of Anticipated Employment Opportunities**

Provide supporting evidence of anticipated employment opportunities for graduates.

Tactical Strength & Conditioning Coaches required to meet current tactical personnel demand

- Based on the number of tactical personnel in SC, we conservatively re-estimated the need for 430 Tactical Strength and Conditioning coaches within SC. While some tactical units could hire an individual without The Citadel’s B.S. in Tactical Strength & Conditioning, that unit would run the risk of hiring an individual without the requisite skills and knowledge required to perform the job effectively, efficiently, and safely. See the “assumptions” section below for a more thorough explanation of the projections for 430 jobs with tactical personnel. An additional 535 non-tactical jobs are available for those with the knowledge and skills acquired through our B.S. in Tactical Strength and Conditioning.
- Because this degree program is designed to attract individuals from outside the State of SC, it is also important to consider employment opportunities nationwide. Based on tactical personnel nationwide, we estimate that number of jobs to be roughly 24,000 for those with the knowledge and skills acquired through our B.S. in Tactical Strength and Conditioning. An additional 33,405 non-tactical jobs are available for those with the B.S. in Tactical Strength and Conditioning.

Assumptions: Estimating the job opportunities available for Tactical Strength & Conditioning coaches is difficult given the newness of the field, and therefore no history from which to estimate need. However, assumptions can be made in order to arrive at estimates of the real-world demand within South Carolina. Those assumptions are as follows:

1. Although tactical strength & conditioning coaching often occurs at the individual-level (71,696 individual Tactical personnel in SC), it also occurs at the unit level. In order to provide a conservative estimate of workforce demand, the estimate provided below will be made based upon coaching taking place strictly at the unit level.
2. The number of personnel within a given military or paramilitary unit can vary widely, but for the purposes of physical training, a conservative estimate of the number of tactical personnel training as a unit is twenty five (71,696/25 = 2,868 tactical units in SC).
3. The number of days per week a tactical unit trains also varies widely from one to seven. Ideally, tactical units would train a minimum of three days/week with a professional tactical strength and conditioning coach. We will therefore conservatively estimate that the demand for a single tactical strength and conditioning coach would be 3 days per week per tactical unit (3 x 2,868 = 8,604 tactical training sessions per week, or 1,720 tactical sessions per day in a 5-day week).
4. Finally, tactical units are often dispersed over a wide geographic area, particularly in South Carolina. As a result, significant travel time will be required in between training sessions. Therefore, we will assume a single coach could train an average of four tactical units per day within a five day week (1,720/4 = 430).

Based on the assumptions above and the data from Table 1 below, the conservatively estimated, immediate demand for tactical strength and conditioning coaches in South Carolina is 430, and nationally is 23,854.

Table 1: Estimates of professional tactical personnel in South Carolina and the nationally.

Population	State	Nationally	Data Type and Source
Active Duty (Army)	11,838	472,000	SC and National ( <a href="#">Governing.com</a> )
Active Duty (Navy)	6,823	319,000	SC and National ( <a href="#">Governing.com</a> )
Active Duty (Marine Corps)	10,582	319,000	SC and National ( <a href="#">Governing.com</a> )
Active Duty (Air Force)	7,407	184,000	SC and National ( <a href="#">Governing.com</a> )
Active Duty (Coast Guard)	857	41,000	SC and National ( <a href="#">Governing.com</a> )
<b>Total Active Duty Military</b>	<b>37,507</b>	<b>1,335,000</b>	SC and National ( <a href="#">Governing.com</a> )
Reserve Forces (Army)	13,344		SC and National ( <a href="#">Governing.com</a> )
Reserve Forces (Navy)	604		SC and National ( <a href="#">Governing.com</a> )
Reserve Force (Marine Corps)	412		SC and National ( <a href="#">Governing.com</a> )
Reserve Force (Coast Guard)	145		SC and National ( <a href="#">Governing.com</a> )
<b>Total Reserve Military</b>	<b>14,505</b>	<b>800,000</b>	
<b>Total Military</b>	<b>52,012</b>	<b>2,135,000</b>	
Law Enforcement Officers	11,674	900,000	SC ( <a href="#">US Bureau of Justice Statistics</a> ) National ( <a href="#">National Law Enforcement Officers Memorial Fund</a> )
Firefighters (Professional)	8,010	1,160,450	SC ( <a href="#">South Carolina Firefighters Association</a> ) National ( <a href="#">National Fire Protection Association</a> )
Emergency Medical Services	N/A	826,000	National ( <a href="#">National Institute for Occupational Safety and Health</a> )
<b>Total Paramilitary</b>	<b>19,684</b>	<b>2,886,450</b>	
<b>Total Tactical Personnel</b>	<b>71,696</b>	<b>5,021,450</b>	

- Most of the openings will be for military personnel (52,012 military personnel), as compared to non-military personnel (19,684). With that said, the military will use both military personnel and civilians to serve as Tactical Strength and Conditioning Coaches. Historically, only Special Forces units benefitted from having a Strength and Conditioning professional embedded within their unit, and that professional was a civilian contracted by the military for that service. Now however, the military recognizes the need to have Tactical Strength and Conditioning Coaches across all units, all branches, and all components (Active-duty, Reserves, and Guard) not just Active-duty Special Forces units. As such, the military will be hiring properly trained professionals from within their ranks and from outside their ranks in order to meet the new demand. Our program will graduate individuals in both categories.
  - We expect that many who enroll in this program will be active duty military personnel, based on our conversations with the U.S. Army and the U.S.M.C. For those enrollees, completing this degree will increase their promotability and earning potential *within the military*. Upon leaving the military the opportunity also exists to work as a *civilian* contractor for the military or as a contractor/employee in another paramilitary setting (e.g. police, fire, EMS) or in the commercial fitness industry.
  - For enrollees in this program who are not currently in the military, their employment opportunities would come as civilian contractors for the military or as a contractor/employee in another paramilitary setting (e.g. police, fire, EMS) or in the commercial fitness industry.

- Employment opportunities are difficult to estimate as the field of Tactical Strength & Conditioning is so new, and the number of jobs specific to Tactical Strength & Conditioning within the military has not yet been made public by the U.S. military. Having said that, we have consulted with key subject matter experts at the U.S. Army's Training and Doctrine Command (TRADOC) and the U.S. Army's Close Combat Lethality Task Force. Those experts have informed us that the U.S. Army anticipates hiring roughly 22,000 personnel to help *active-duty* members of the U.S. Army comply with the Army's new PT standards. It is important to note that active-duty personnel make-up only 50% of the U.S. Army's fighting force, with the remaining 50% residing within the Guard and Reserve components. Hence, there will be additional personnel required for the Guard and Reserve components of the Army.
- Additionally, in meetings held in Quantico, VA with leadership from the Marine Corp's Recruiting and Training Command (MCRC) and Training and Education Command (TECOM), they specifically expressed the need for a degree program like the one proposed here because of their need to better train Marines for combat readiness.
- Finally, other military branches are evaluating their fitness standards and recognize the need to hire more professional strength and conditioning coaches as part of the Total Force Fitness model introduced in the 2018 Doctrine for the U.S. Armed Forces. Therefore, there is a clear, substantial need for individuals with expertise in Tactical Strength & Conditioning, although the exact number of jobs is yet to be determined.
- On [Indeed.com](https://www.indeed.com) using the search terms "strength and conditioning" and "South Carolina," the salary range provided for the job with credentials most similar to that which would be achieved through our B.S. in Tactical Strength and Conditioning is \$45,000 - \$70,000, which represents a mean salary of \$57,500. Additionally, when using those search terms 102 jobs are listed as Full-time, 78 as part-time.
- Additionally, using the website [CollegeScorecard.ed.gov](https://collegescorecard.ed.gov), using the search terms "Four-year (Bachelor's), "Health Professions Programs," and "South Carolina," The Citadel ranks second, only to MUSC, with a "Salary After Attending" of \$56,800.

#### Career opportunities *outside* tactical strength and conditioning available to program graduates

- In addition to the professional opportunities as a professional tactical strength and conditioning coach, the proposed Bachelor of Science in Tactical Strength and Conditioning will also prepare graduates of the program for careers in sport strength and conditioning, commercial fitness industry, and health and wellness coaching. Finally, graduates of this program will be well-positioned to pursue graduate education in health and allied health careers including, but not limited to: athletic training, physical therapy, nursing, physician assistant, public health, and medicine. As described above, we have re-estimated and conservatively increased the proposed demand to 430 in SC and roughly 24,000 nationally. While this is a projected need, it is also a conservatively projected need. Even if our conservatively estimated projection for SC was arbitrarily cut in half to 215, our projected enrollment numbers would just be sufficient to meet that demand at the end of 5 years. Therefore, we are highly confident that graduates of this degree program will find employment within the state of SC as professional Tactical Strength and Conditioning Coach.

### Description of the Program

Projected Enrollment			
Year	Fall Headcount	Spring Headcount	Summer Headcount
2019	24	24	24
2020	48	48	48
2021	48	48	48
2022	48	48	48
2023	48	48	48

Explain how the enrollment projections were calculated.

The program is slated to begin in Fall 2019 with 24 students. We are projecting 100% growth and then steady enrollment at year two. This is a conservative estimate based upon the wide array of collaborative partnerships the program will have with military units, law enforcement entities and the state fire service who have expressed a need for this program.

Besides the general institutional admission requirements, are there any separate or additional admission requirements for the proposed program? If yes, explain.

Yes

No

## Curriculum

### New Courses

List and provide course descriptions for new courses.

#### TSAC 201: Anatomy and Physiology for Health and Human Performance (3):

This course provides foundational understanding of concepts in human anatomy and physiology as they relate the human body's adaptations to exercise. Specific content areas covered in this class include introductions to muscular and skeletal anatomy and physiology, functional anatomy, biomechanics, bioenergetics, and medical terminology.

#### TSAC 395: Directed Field Experience in Tactical Strength and Conditioning (3):

A 100 hour controlled exposure to professional experiences in the field of tactical strength and conditioning. The primary purpose of this course is to provide s filed-based learning experience where the student shadows and assists a professional working with tactical athletes in either a military installation, or private or public civilian environment.

#### TSAC 301: Tactical Strength and Conditioning (3):

A study of fundamental concepts in bioenergetics, biomechanics, and cardiopulmonary and skeletal muscle function and adaptation, as it relates to the physical conditioning, training, and physical fitness of tactical personnel. Current research, and laboratory techniques for assessing human physiological responses to exercise and training, will be studied and applied to tactical athletes. Topics to be covered include but are not limited to: testing and evaluating tactical populations, nutrition for tactical populations, and physiological issues related to fire and rescue, law enforcement, and military personnel.

#### TSAC 302: Care and Prevention of Injuries for Tactical Athletes:

This class will provide discussion, demonstration, and application of skills and procedures used in athletic training for preventing training-related injuries commonly associated with tactical athletes. Specifically, focus will be placed on caring for and preventing training-related injuries seen in basic combat training.

**TSAC 310: Psychological Resiliency (3):**

This course will provide students with foundational knowledge of psychology in the military and theoretical information on the interaction between physical and mental health as they relate to readiness and resiliency of military service members, veterans, law enforcement officers, firefighters, and other tactical personnel. This course will explore the meaning of readiness and resiliency, including the interconnectedness of mind, body, interpersonal, and spiritual fitness.

**TSAC 495: Internship in Tactical Strength and Conditioning (6):**

A requirement for graduation is observation of and involvement in the physical conditioning of tactical athletes under an approved supervisor and supervision by the college instructor. This supervised internship experience must be at least 200 hours and must take place in a private or public sector host organization focused on strength and conditioning of tactical athletes. Students will actively participate in designing and delivering strength and conditioning programs aimed at improving physical readiness of a single tactical athlete and/or groups of tactical athletes. This internship will provide the student with hands-on skills and knowledge for handling the nuances of training tactical athletes. Upon completion of the internship, students will present a comprehensive summary of their internship experience, and will be formally evaluated by the internship supervisor and the college instructor.

Total Credit Hours Required: 122

Curriculum by Year					
Course Name	Credit Hours	Course Name	Credit Hours	Course Name	Credit Hours
<b>Year 1</b>					
<b>Fall</b>		<b>Spring</b>		<b>Summer</b>	
General Biology	3	Composition & Literature	3		
General Biology Lab	1	History of Western or World Civ	3		
Composition & Literature	3	Motor Development	3		
History of Western or World Civ	3	Lower Division Elective	3		
Lower Division Elective	3	Foreign Language/Humanities	3		
First Aid & Emergency Care	3				
Total Semester Hours	16	Total Semester Hours	15	Total Semester Hours	
<b>Year 2</b>					
<b>Fall</b>		<b>Spring</b>		<b>Summer</b>	
<b>TSAC 201: Anatomy and Physiology for Health and Human Performance</b>	<b>3</b>	Physical Science II (CHEM or PHYS)	3		
Physical Science I (CHEM or PHYS)	3	Finite Mathematics	3		
Elementary Mathematical Modeling	3	Fundamentals of Personal Training	3		
Foreign Language/Humanities	3	Physical Science II (CHEM or PHYS)	3		

Curriculum by Year					
Course Name	Credit Hours	Course Name	Credit Hours	Course Name	Credit Hours
Lower Division Elective	3	<b>TSAC 395: Directed Field Experience in Tactical Strength and Conditioning</b>	3		
Total Semester Hours	15	Total Semester Hours	15	Total Semester Hours	
Course Name	Credit Hours	Course Name	Credit Hours	Course Name	Credit Hours
Year 3					
Fall		Spring		Summer	
Developmental Psychology	3	<b>TSAC 301: Tactical Strength and Conditioning</b>	3		
Biomechanical Kinesiology	3	<b>TSAC 302: Care and Prevention of Injuries for Tactical Athletes</b>	3		
Physiology of Exercise I	3	Upper Division Elective	3		
Physiology of Exercise Lab	1	Leadership in Organizations	3		
Drug and Substance Abuse	3	<b>TSAC 310: Psychological Resiliency</b>	3		
Upper Division Elective	3				
Total Semester Hours	16	Total Semester Hours	15	Total Semester Hours	
Year 4					
Fall		Spring		Summer	
Nutrition	3	Physiology of Exercise II	3		
Accommodating Persons with Disabilities	3	Sport Nutrition	3		
Measurement and Evaluation	3	Exercise Testing and Prescription	3		
Upper Division Elective	3	<b>TSAC 495: Internship in Tactical Strength and Conditioning</b>	6		
Upper Division Elective	3				
Total Semester Hours	15	Total Semester Hours	15	Total Semester Hours	

Access to equipment and supervision:

Students enrolled in this curriculum will need access to a personal computer with a camera. This will be explained during the recruiting and enrollment process. Otherwise, students will not need access to any special equipment.

Roughly, 80% of the courses in this program are part of existing on-line content currently being provided by The Citadel to undergraduate students. The Citadel has both the software and hardware capabilities to effectively develop and deliver the remaining

a-synchronous content specific to this degree program. Additionally, The Citadel has the technological capacity to develop and deliver any synchronous content required for knowledge transfer of more applied concepts in tactical strength and conditioning.

Supervision of Internships:

The course *TSAC 495: Internship in Tactical Strength & Conditioning*, is vitally important to the success of students in this program. As such, we have a thorough plan in place to ensure that the internship experience is of high quality for both the students and the site supervisors. We have the following measures in place:

1. We have a full-time Internship Director within our Career Center who provides oversight of internships from the student and site supervisor perspectives.
2. We have built, and continue to build, a large network of internship sites across the state and the country through our contacts in military and paramilitary organizations.
3. We will modify our existing policy and procedures manuals for internships such that they are specific to the unique needs of this program. For example, existing policy dictates that we provide site supervisors with a training program at The Citadel. Given that many of our sites will be outside the greater Charleston area, we will use our on-line hardware and software capabilities to develop an on-line training for site supervisors.
4. Our Internship Director will implement a robust evaluation of the internship experience from the perspective of the student, the site supervisor, and the course instructor to enable a 360-degree evaluation process. This process will inform if and to refine and improve the internship experience.

**Similar Programs in South Carolina offered by Public and Independent Institutions**

Identify the similar programs offered and describe the similarities and differences for each program.

One could argue that because the proposed program is 100% on-line, that there are no similar programs currently offered in SC. However, the Tactical Strength and Conditioning focus (18 hours) is unique to The Citadel.

<b>Program Name and Designation</b>	<b>Total Credit Hours</b>	<b>Institution</b>	<b>Similarities</b>	<b>Differences</b>
B.S. in Exercise Science	122	College of Charleston	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. in Exercise Science	122	University of South Carolina	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. in Health Sciences	120-122	Furman University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>

B.S. in Health Sciences	120-122	Clemson University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. in Kinesiology	125	Charleston Southern University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. Exercise Science	122	Coastal Carolina University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. in Physical Education (Exercise Science)	N/A	Coker College	<ul style="list-style-type: none"> <li>• Some common core courses, but fewer than some other programs</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>

B.S. in Exercise Science (Applied Physiology, Fitness/Wellness)	N/A	Bob Jones University	<ul style="list-style-type: none"> <li>• Common core courses</li> <li>• One on-line course in Wellness Concepts (ESS 206).</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• No leadership courses required</li> </ul>
B.S. in Exercise Science	120	Southern Wesleyan University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. in Exercise Science	122	Lander University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>
B.S. in Kinesiology (Exercise Specialist)	126	Anderson University	<ul style="list-style-type: none"> <li>• Common core courses</li> </ul>	<ul style="list-style-type: none"> <li>• Not a degree in the Tactical Strength &amp; Conditioning.</li> <li>• No courses in Tactical Strength and Conditioning</li> <li>• No application of material to Tactical Athletes</li> <li>• Not offered on-line</li> <li>• No leadership courses required</li> </ul>

**Faculty and staff ready and willing to support new program**

<b>Faculty and Administrative Personnel</b>				
<b>Rank and Full or Part-time</b>	<b>Citadel Department</b>	<b>Academic Degrees, Institution (Major)</b>	<b>Courses Taught Relevant to Program</b>	<b>Other Qualifications and Relevant Professional Experience (e.g., licensures, certifications, years in industry, etc.)</b>
Professor - FT	Health and Human Performance	Ph.D., Oregon State University (Health and Human Performance)	<ul style="list-style-type: none"> <li>• Exercise Physiology</li> <li>• Nutrition</li> <li>• Exercise Testing &amp; Prescription</li> <li>• Accommodating Persons with Disabilities</li> <li>• Internship management</li> </ul>	<ul style="list-style-type: none"> <li>• Expertise in traumatic brain Injury in military and sport populations</li> <li>• Assistant Provost for Research and Policy</li> <li>• Experience with On-Line Course Development and Delivery</li> <li>• Established researchers in area of applied exercise physiology</li> </ul>
Associate Professor - FT	Health and Human Performance	Ph.D., University of South Carolina (Physical Education Pedagogy)	<ul style="list-style-type: none"> <li>• Motor Control</li> <li>• Internship</li> </ul>	<ul style="list-style-type: none"> <li>• Expertise in On-Line Course Development</li> <li>• Extensive experience in managing student internships</li> <li>• 12 years of post-secondary teaching experience</li> </ul>
Assistant Professor - FT	Health and Human Performance	Ph.D., University of South Carolina (Exercise Science)	<ul style="list-style-type: none"> <li>• Exercise Physiology</li> <li>• Biomechanics</li> <li>• Research Methods</li> <li>• Personal Training</li> <li>• Strength and Conditioning</li> <li>• Public Health</li> <li>• Exercise Testing and Prescription</li> <li>• Measurement and Evaluation</li> </ul>	<ul style="list-style-type: none"> <li>• Formerly certified strength and conditioning specialist, personal trainer, and corrective exercise specialist</li> <li>• Over 15 years successfully owning and managing commercial performance enhancement center for sport and tactical athletes.</li> <li>• National leader in researching the impact of low fitness on military readiness and national security.</li> </ul>
Assistant Professor - FT	Health and Human Performance	Ph.D., East Tennessee State University (Sport Physiology and Performance)	<ul style="list-style-type: none"> <li>• Tactical Strength &amp; Conditioning</li> <li>• Strength and Conditioning</li> <li>• Personal Training</li> <li>• Exercise Physiology</li> <li>• Motor Development</li> <li>• Measurement and Evaluation</li> <li>• Exercise Testing and Prescription</li> </ul>	<ul style="list-style-type: none"> <li>• Certified Strength and Conditioning Specialist</li> <li>• Tactical Strength and Conditioning Facilitator</li> <li>• Sport Performance Coach</li> <li>• Over 10 years of applied strength and conditioning experience with sport and tactical athletes.</li> <li>• Accomplished researcher in the areas of</li> </ul>

				<p>performance in sport and tactical athletes</p> <ul style="list-style-type: none"> <li>• Experience in on-line course development</li> </ul>
Assistant Professor - FT	Health and Human Performance	M.D., Spartan Health Sciences University (Medicine)	<ul style="list-style-type: none"> <li>• Anatomy and Physiology</li> <li>• Nutrition</li> <li>• Exercise Physiology</li> <li>• Medical Terminology</li> <li>• Environmental Physiology</li> </ul>	<ul style="list-style-type: none"> <li>• A Medical Doctor with over nine years of experience in teaching, with specialized training in applied anatomy and physiology, and neuroscience</li> </ul>
Assistant Professor - FT	Health and Human Performance	Ph.D., University of South Carolina (Physical Education Motor Development)	<ul style="list-style-type: none"> <li>• Tactical Strength &amp; Conditioning</li> <li>• Strength and Conditioning</li> <li>• Anatomy and Physiology</li> <li>• Personal Training</li> <li>• Exercise Physiology</li> <li>• Motor Development</li> <li>• Biomechanics</li> <li>• Athletic Training</li> </ul>	<ul style="list-style-type: none"> <li>• Certified Strength and Conditioning Specialist</li> <li>• Tactical Strength and Conditioning Facilitator</li> <li>• 10 plus year fitness industry experience as Personal Trainer</li> <li>• Certified Athletic Trainer since 2003, with expertise in injury prevention and rehabilitation.</li> </ul>
Assistant Professor - FT	Health and Human Performance	Ph.D., Michigan State University (Kinesiology and Exercise Physiology)	<ul style="list-style-type: none"> <li>• Anatomy and Physiology</li> <li>• Exercise Physiology</li> <li>• Nutrition</li> <li>• Research Methods</li> <li>• Personal Training</li> <li>• Strength and Conditioning</li> <li>• Public Health</li> <li>• Exercise Testing and Prescription</li> </ul>	<ul style="list-style-type: none"> <li>• Award winning teacher from Michigan State University.</li> <li>• Extensive experience with On-Line Course Development and Instruction</li> <li>• Extensive research experience in designing and delivering obesity and physical activity interventions.</li> </ul>
Assistant Professor - FT	Psychology	Ph.D., Boston University (Clinical Psychology)	<ul style="list-style-type: none"> <li>• Military Psychology</li> <li>• Psychological Resiliency for Tactical Athletes</li> <li>• Behavior Change for Tactical Athletes</li> <li>• Substance Use Theory and Interventions</li> </ul>	<ul style="list-style-type: none"> <li>• Extensive experience clinical and research psychology with military service-members and veterans.</li> <li>• Clinical, teaching and research expertise in mental health disorders including Posttraumatic Stress Disorder and substance use disorders.</li> <li>• Clinical, teaching, and research expertise in the role of social support for improving mental health disorders.</li> </ul>
Administrative Assistant - FT	Health and Human Performance	M.S., Strayer University (Management/Project Management)	<ul style="list-style-type: none"> <li>•</li> </ul>	<ul style="list-style-type: none"> <li>• Well-demonstrated effectiveness at managing the needs of an academic department.</li> </ul>

**Total FTE needed to support the proposed program:**

Faculty: .75 new/6 existing faculty FTE will also support the program

Staff: 1 new staff member FTE will support the program

Administration: .25 FTE existing administrator will support the program

**Faculty, Staff, and Administrative Personnel**

Discuss the Faculty, Staff, and Administrative Personnel needs of the program.

Unless the program grows beyond the projected enrollment, there is only one new faculty position needed to implement this degree program. In addition, there are eight existing faculty members (6 FTE) who will also provide instruction in the program. Faculty are required to teach a full 12-credit hour load each semester. The program also anticipates a program coordinator position to be added to aid with admissions, marketing, advising, and administrative support.

**Resources**

**Library and Learning Resources**

Explain how current library/learning collections, databases, resources, and services specific to the discipline, including those provided by PASCAL, can support the proposed program. Identify additional library resources needed.

Daniel Library at The Citadel will offer robust support with its current online resources—both in eBooks and in digital journal access. Currently, the library maintains significant subscriptions to professional scientific and academic journals and magazines in its health and science collection. However, the program does anticipate budgeting \$10,000 a year for the addition of new library resources as they become available in this emerging field.

**Student Support Services**

The Citadel maintains excellent student support services accessible to undergraduates, veteran students, and graduate students. Those support services can be utilized by potential students in the proposed program. There are no academic support services required for this program beyond the already robust services The Citadel offers to all students and no additional fees are anticipated. The Citadel's numerous student support programs, services, and activities are highlighted in the academic catalog. These services include The Citadel Career Center, The Citadel Academic Support Center, Academic Advising, Office of Multicultural Student Services, Student Activities, the Krause Center for Leadership and Ethics, and the Study Abroad Office. Two offices are dedicated to supporting students with academic projects or assignments that require the use of technology or training in oral presentations. Multimedia Services helps students with such things as video and audio production, web page design, and graphics production. The Oral Communications Lab offers support services for students who wish to improve their presentation skills.

**Physical Resources/Facilities**

No purchases of major equipment items will be needed for the first five years of the degree program beyond normal institutional support for online courses. However, the program does anticipate budgeting \$25,000 a year for enhancing web-based technology simulations.

**Equipment**

Current physical facilities and technology will fully support the implementation of this proposed degree program.

**Impact on Existing Programs**

Will the proposed program impact existing degree programs or services at the institution (e.g., course offerings or enrollment)? If yes, explain.

Yes

No

**Financial Support**

<b>Sources of Financing for the Program by Year</b>													
<b>Category</b>	<b>1<sup>st</sup></b>		<b>2<sup>nd</sup></b>		<b>3<sup>rd</sup></b>		<b>4<sup>th</sup></b>		<b>5<sup>th</sup></b>		<b>Grand Total</b>		
	<b>New</b>	<b>Total</b>	<b>New</b>	<b>Total</b>									
Tuition Funding	216,000	216,000	432,000	432,000	432,000	432,000	432,000	432,000	432,000	432,000	432,000	1,944,000	1,944,000
Program-Specific Fees													
Special State Appropriation													
Reallocation of Existing Funds													
Federal, Grant, or Other Funding													
<b>Total</b>	216,000	216,000	432,000	432,000	432,000	432,000	432,000	432,000	432,000	432,000	432,000	1,944,000	1,944,000
<b>Estimated Costs Associated with Implementing the Program by Year</b>													
<b>Category</b>	<b>1<sup>st</sup></b>		<b>2<sup>nd</sup></b>		<b>3<sup>rd</sup></b>		<b>4<sup>th</sup></b>		<b>5<sup>th</sup></b>		<b>Grand Total</b>		
	<b>New</b>	<b>Total</b>	<b>New</b>	<b>Total</b>									
Program Administration and Faculty/Staff Salaries	126,500	126,500	165,500	165,500	165,500	165,500	165,500	165,500	165,500	165,500	165,500	788,500	788,500
Facilities, Equipment, Supplies, and Materials			25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	25,000	100,000	
Library Resources	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	10,000	50,000	50,000
Other (specify)													
<b>Total</b>	136,500	136,500	200,500	200,500	200,500	200,500	200,500	200,500	200,500	200,500	200,500	938,500	938,500
<b>Net Total</b> (Sources of Financing Minus Estimated Costs)	79,500	79,500	231,500	231,500	231,500	231,500	231,500	231,500	231,500	231,500	231,500	1,005,500	1,005,500

**Note:** New costs - costs incurred solely as a result of implementing this program. Total costs - new costs; program's share of costs of existing resources used to support the program; and any other costs redirected to the program.

**Budget Justification**

Provide an explanation for all costs and sources of financing identified in the Financial Support table. Include an analysis of cost-effectiveness and return on investment and address any impacts to tuition, other programs, services, facilities, and the institution overall.

The staffing costs represent an additional .75 FTE for a new faculty member (plus fringe) as well as a program coordinator/advisor (plus fringe). Additionally, 10% of the program coordinators salary was attributed to the program cost.

\$126,000- \$165,500 (Includes new faculty .75 FTE member plus fringe, 10% program coordinator salary plus fringe, and coordinator/advisor plus fringe)

\$25,000 – online course development/simulations

\$10,000 – new database publications and research

**Evaluation and Assessment**

Program Objectives	Student Learning Outcomes Aligned to Program Objectives	Methods of Assessment
1. Graduate students prepared to meet general demands of workforce and/or graduate education.	<ul style="list-style-type: none"> <li>• Understand the overall importance of and demonstrate abilities in critical thinking, reasoning, and persuasive communication.</li> </ul>	<ul style="list-style-type: none"> <li>• Through our general education curriculum, and that of this degree program, use a combination of quizzes, exams, papers, and oral presentations which emphasize problem solving.</li> </ul>
2. Graduate students who possess sound theoretical understanding of physiological principles of and science behind strength and conditioning of tactical athletes.	<ul style="list-style-type: none"> <li>• Theoretical understanding anatomy and physiology as they relate to tactical athletes.</li> <li>• Theoretical understanding of the role of motor development in assessing physical readiness of tactical athletes.</li> <li>• Theoretical understanding of basic concepts in personal training as it relates to one-on-one training of tactical athletes.</li> <li>• Theoretical understanding of core principles of exercise physiology including, but not limited to muscular strength, endurance, and flexibility;</li> </ul>	<ul style="list-style-type: none"> <li>• Direct assessments (quizzes, exams, written assignments, presentations, and projects) embedded within courses assessed against established rubrics.</li> <li>• Success rate in passing professional certification exams (e.g. Certified Personal Trainer, and Tactical Strength and Conditioning Facilitator).</li> </ul>

	<p>cardiovascular-respiratory fitness.</p> <ul style="list-style-type: none"> <li>• Theoretical understanding of biomechanics including, but not limited to anatomical and mechanical analysis of functional posture and motor performance.</li> <li>• Theoretical understanding of core principles of strength and conditioning for tactical athletes including, but not limited to, evaluating tactical ability, energy systems development for optimal performance, muscular endurance, strength, and power, and exercise program design for individual tactical athletes and tactical units.</li> <li>• Theoretical understanding of advanced concepts in exercise physiology including, but not limited to, cardiovascular adaptations to different forms of aerobic and anaerobic exercise, exercise endocrinology, and environmental exercise physiology.</li> </ul>	
<p>3. Graduate student who possess applied, practical understanding of fundamental and advanced concepts in designing and delivering conditioning programs aimed at preventing injuries, treating injuries, and improving performance of tactical athletes.</p>	<ul style="list-style-type: none"> <li>• Applied understanding of procedures used in athletic training for the prevention and treatment of “training-related injuries” commonly seen in tactical athletes.</li> <li>• Through 100 hours of field experience, students will observe and assist a current tactical strength and conditioning expert training tactical athletes in either a military installation, public, or private facility.</li> <li>• Through a minimum 200-hour internship experience,</li> </ul>	<ul style="list-style-type: none"> <li>• Direct measures                         <ul style="list-style-type: none"> <li>• student portfolios and presentations</li> <li>• Number of internship sites</li> <li>• Number of interns placed</li> </ul> </li> <li>• Indirect Measures                         <ul style="list-style-type: none"> <li>• 360-degree survey evaluation assessing: intern-on-intern, mentor-on-intern, intern-on-mentor, instructor-on-intern, instructor-on-mentor</li> </ul> </li> </ul>

	students will actively participate in designing and delivering strength and conditioning programs for tactical athletes and/or tactical units in either a military installation, public, or private facility.	<ul style="list-style-type: none"> <li>• Post-graduation survey to assess utilization of knowledge and skills on the job one and three years after graduation</li> </ul>
4. Graduate students who possess theoretical and applied understanding of fundamental nutritional concepts as they relate to the performance of tactical athletes.	<ul style="list-style-type: none"> <li>• Theoretical and applied understanding of basic nutritional concepts including, but not limited to primary macronutrient and micronutrient needs for achieving and maintain general health.</li> <li>• Theoretical understanding of performance-related nutritional concepts including, but not limited to bioenergetics, macro and micronutrients, water and temperature regulation, body composition, nutritional supplements.</li> </ul>	<ul style="list-style-type: none"> <li>• Direct assessments (quizzes, exams, written assignments, presentations, and projects) embedded within courses assessed against established rubrics.</li> </ul>
5. Graduate students who possess theoretical understanding of the importance of mental and psychological health as they relate to tactical athletes.	<ul style="list-style-type: none"> <li>• Theoretical understanding of the interaction between physical and mental health as they relate to performance of tactical athletes including military service members, veterans, law enforcement officers, and firefighters.</li> </ul>	<ul style="list-style-type: none"> <li>• Direct assessments (quizzes, exams, written assignments, presentations, and projects) embedded within courses assessed against established rubrics.</li> </ul>

Explain how the proposed program, including all program objectives, will be evaluated, along with plans to track employment. Describe how assessment data will be used.

The Citadel is accredited by the Southern Association of Colleges and Schools Commission on Colleges to award baccalaureate, masters, and specialist in education degrees. Consistent with SACSCOC accreditation standards, student learning outcomes will be assessed in multiple ways. All course objectives will be aligned with the learning objectives for the degree program. Assessment methods will include both direct and indirect measures (see below). The rubrics and online course evaluation developed by Quality Matters (<http://qualitymatters.org/qa-resources/rubric-standards/higher-ed-rubric>) will be utilized. Those rubrics include eight general standards to evaluate online course design and effectiveness: Course Overview and Introduction; Learning Objectives (Competencies); Assessment and Measurement; Instructional Materials; Course Activities and Learner Interaction; Course Technology; Learner Support; and Accessibility and Usability.

## Direct Measures

Each course will have direct evaluation measures built into the course. A combination of the following direct assessments will be used: exams, essays, research projects, online discussion, and course presentations.

## Indirect Measures

Surveys of graduating students and alumni will be conducted to assess student learning outcome achievements. All graduating students will complete a self-assessment survey of their progress in the acquisition of knowledge, skills, and attitudes. Post-graduation surveys will also be conducted to assess utilization of knowledge and skills on the job after graduation. The post-graduation surveys will be conducted with graduates one year and three years after graduation.

Plans for Programmatic Assessment: Programmatic assessment will occur at multiple levels.

a. Current in program

I. Each semester course evaluation data will be collected from students.

b. Graduation Assessment

I. Graduation rate

II. Assessment of employment data for graduates - employment rate

c. Post-Graduation

I. Alumni survey to gauge how well the program is preparing graduates for employment in the field.

## Accreditation and Licensure/Certification

Will the institution seek program-specific accreditation (e.g., CAEP, ABET, NASM, etc.)? If yes, describe the institution's plans to seek accreditation, including the expected timeline.

Yes

No

Will the proposed program lead to licensure or certification? If yes, identify the licensure or certification.

Yes

No

Explain how the program will prepare students for this licensure or certification.

Content and materials from the *Fundamentals of Personal Training* course will prepare students for the Certified Personal Trainer Certification. Content and materials from the *Tactical Strength and Conditioning* course will prepare students for Tactical Strength and Conditioning Facilitator Certification.

1. *Certified Personal Trainer*, National Strength and Conditioning Association

2. *Tactical Strength and Conditioning Facilitator*, National Strength and Conditioning Association

If the program is an Educator Preparation Program, does the proposed certification area require national recognition from a Specialized Professional Association (SPA)? If yes, describe the institution's plans to seek national recognition, including the expected timeline.

Yes

No