

PROFESSIONAL STANDARDS & GUIDELINES

NSCA Special Committee on Accreditation

REVISED COPY following written open comment 07.22.19

REVISED COPY following copy edits 09.12.19

APPROVED COPY Version 5 09.23.2019

RISE TO the HIGHER STANDARD

CASCE Professional Standards and Guidelines

CASCE Incorporation is pending

SECTION I. INSTITUTION

- I.A. The institution has appropriate approvals and accreditation to offer programs in higher education.
- I.B. The program must demonstrate that the institution has the resources to support the program.
- I.C. The mission, goals, and expected outcomes of the program align with those of the institution.

Documentation of Compliance (provide the following):

Documentation of institutional accreditation and approvals as appropriate. A needs analysis, internal report, or explanation that the institution has the resources to support the program. The stated missions of the institution, the academic unit in which the program is housed, and the program and the program, as well how they are interrelated.

SECTION II. FACULTY

II.A. **Program Director:** The Program Director is the person responsible for administering the academic program, institutional and program policies, and these standards, as well as ensuring program compliance with all applicable state rules and regulations.

The Program Director must:

- 1. Be a full-time employee of the sponsoring institution.
- 2. Have full faculty status, rights, responsibilities, privileges, and voting rights as defined by institution policy, consistent with similar positions at the institution necessary to provide appropriate program representation in institutional decisions.
- 3. Have a master's degree or higher in a related field.
- 4. Be in good standing with the National Strength and Conditioning Association (NSCA) with a current Certified Strength and Conditioning Specialist® (CSCS®) certification.
- 5. Have experience with curriculum and/or program development in a related field.
- 6. Be qualified commensurate with other administrative positions within similar allied health programs in the institution. If no such similar program exists at the institution, then it must be benchmarked against other peer institutions. If the institution does not sponsor other allied health programs, this standard must be benchmarked against other peer institutions (e.g., Education Recognition Program [ERP] or accredited strength and conditioning programs). Academic rank and tenure status are determined by the institution according to institutional policy.
- 7. Have programmatic administrative and supervisory responsibility consistent with other similar assignments within the institution.
- 8. Oversee and evaluate program-specific course content and curricular efficacy.



^{**}Note: The terms in **bold** are defined in the Glossary section. **

- Have administrative release/reassigned workload. The Program Director's release time
 must be equivalent to similar allied health programs in the institution. If no such similar
 program exists at the institution, then it must be benchmarked against other peer
 institutions.
- 10. Must have responsibilities that include input to and assurance of the following program features:
 - (a) Ongoing compliance with the Council on Accreditation of Strength and Conditioning Education's (CASCE) Professional Standards and Guidelines.
 - (b) Planning, development, implementation, delivery, documentation, and assessment of all components of the curriculum.
 - (c) Effective leadership in areas such as **field experience**, strategic planning, resources, and budget.
 - (d) Compliance with all applicable state rules and regulations.
 - (e) Compliance with institutional and program policies.

<u>Documentation of Compliance (provide the following):</u>

Documentation showing that the Program Director is a full-time faculty of the institution, curriculum vitae showing professional attainment/**scholarship¹** and appropriate past experience to be in Program Director role, documentation outlining how the Program Director is qualified commensurate with other administrative positions within similar allied health programs at the institution, workload documentation indicating reassigned time for administrative duties, and documentation of current CSCS certification.

II.B. **Field Experience Coordinator:** The Field Experience Coordinator is responsible for student **field experience** placement, field experience site evaluation and training, and regular communication with the Field Experience Site Supervisors.

The Field Experience Coordinator must:

- 1. Be a full-time employee of the sponsoring institution.
- 2. Have released/reassigned workload to meet the institutional responsibilities for overseeing the **field experience**.
- 3. Have experience with **field experience** oversight and development.
- 4. Be responsible for:
 - (a) Student **field experience** placement.
 - (b) Maintaining current affiliation agreement(s) or **Memorandum of Understanding** (**MOU**) with field experience sites.
 - (c) Field Experience site evaluation.
 - (d) Field Experience Site Supervisor training.
 - (e) Field Experience Site Supervisor evaluation.
 - (f) Regular communication with the Field Experience Site Supervisors.
 - (g) Following institutional and program policies.

<u>Documentation of Compliance (provide the following):</u>

Documentation showing that the Field Experience Coordinator is a full-time employee of the institution. Curriculum vitae showing professional attainment, evidence of qualification (curriculum vitae and/or resume showing appropriate past experience with field experience oversight and



development) to be in Field Experience Coordinator role, and workload documentation indicating reassigned time for the **field experience** administration according to institutional policy.

- II.C. **Strength and Conditioning Faculty:** The teaching faculty of the strength and conditioning educational program shall be identified as those faculty members responsible for teaching in the required subject matter areas specified in Section III and other didactic courses included in the strength and conditioning curriculum as identified by the institution.
 - 1. Members of the teaching faculty must have formal academic appointments.
 - 2. All faculty assigned and responsible for the instruction of strength and conditioning knowledge, skills, and abilities in required courses must:
 - (a) Be qualified through professional preparation and experienced in their respective academic areas as determined by the institution.
 - (b) Be in good standing with the NSCA with a current CSCS certification if they teach courses with content specific to strength and conditioning as defined in Standard III.C.6-10 (in this document).
 - (c) Incorporate the most current evidence-based strength and conditioning knowledge, skills, and abilities as they pertain to their respective teaching areas.

Documentation of Compliance (provide the following):

A list of faculty along with course(s) taught and documentation of formal academic appointments. Documentation of current CSCS certification for those who teach content specific to III.C.6-10. Curriculum vitae for each faculty member documenting evidence of appropriate professional and/or academic achievement to be in faculty role, appropriate certifications, professional attainment/scholarship, evidence of qualification, and narrative explaining how the program is assured that the most current evidence-based knowledge, skills, and abilities are taught by the faculty.

- II.D. **Strength and Conditioning Faculty Number:** In addition to the Program Director, the number of strength and conditioning faculty must meet the needs of the program (based on the program's student enrollment) and be sufficient to:
 - 1. Advise and mentor students.
 - 2. Meet program outcomes.
 - 3. Allow the institution to offer strength and conditioning courses on a regular, planned basis.
 - 4. Maintain student-to-faculty ratios that allow for effective instruction and evaluation as consistent with other allied health programs. If no such similar program exists at the institution, then it must be benchmarked against other peer institutions.

<u>Documentation of Compliance (provide the following):</u>

Faculty workload data, teaching responsibilities, and other institution-required responsibilities.

II.E. *Field Experience Site Supervisor*: The Field Experience Site Supervisor is the person at the **field experience** site responsible for the supervision of the **field experience** at the site.

The Field Experience Site Supervisor must:



- 1. Be CSCS certified.
- 2. Ensure that student interns are directly supervised during day-to-day activities.
- 3. Provide instruction, assessment, and feedback for the application of current knowledge, skills, and abilities designated in Standard III.C (in this document).
- 4. Demonstrate understanding of and compliance with the program's policies and procedures.

<u>Documentation of Compliance (provide the following):</u>

Appropriate certifications, professional attainment/**scholarship**, evidence of qualification to be in Field Experience Site Supervisor role, and explanation of how the Field Experience Site Supervisors are trained and informed of the programs policies and procedures.

SECTION III. CURRICULUM

- III.A. The curriculum is developed, implemented, and revised to reflect clear statements of expected student **outcomes** that are congruent with:
 - 1. The program's mission and goals.
 - 2. The Council on Accreditation of Strength and Conditioning Education's (CASCE) Professional Standards and Guidelines
 - 3. The roles for which the program is preparing its graduates.

Documentation of Compliance (provide the following):

Documentation of the program mission and goals.

- III.B. The program must be a minimum of a concentration, or equivalent, with a strength and conditioning title.
 - 1. The curriculum must be of appropriate length and credit hours (as determined by the institutional policies and institutional accreditors) to fulfill requirements for the chosen degree designation.
 - Sequencing of the curriculum must provide proper progression of student learning of required knowledge, skills, and abilities. Policies must be in place to allow for student remediation.

<u>Documentation of Compliance (provide the following):</u>

Official institutional documents showing the program is a minimum of a concentration, or equivalent, with a strength and conditioning title and an example student plan or sequence of courses.

- III.C. The curriculum must include the following areas of instruction:
 - 1. Human Anatomy and Physiology
 - (a) Structure and function of body systems
 - (b) Musculoskeletal system
 - (c) Neuromuscular system
 - (d) Cardiovascular system
 - (e) Respiratory system



2. Exercise Physiology

- (a) Bioenergetics of exercise and training
- (b) Biological energy systems
- (c) Substrate depletion and repletion
- (d) Bioenergetic limiting factors in exercise performance
- (e) Oxygen uptake and the aerobic and anaerobic contributions to exercise
- (f) Metabolic specificity of training
- (g) Endocrine responses to resistance exercise
- (h) Synthesis, storage, and secretion of hormones
- (i) Muscle as the target for hormone interactions
- (j) Role of receptors in mediating hormonal changes
- (k) Categories of hormones
- (I) Heavy resistance exercise and hormonal increases
- (m) Mechanisms of hormonal interactions
- (n) Hormonal changes in peripheral blood
- (o) Adaptations in the endocrine system
- (p) Primary anabolic hormones
- (q) Adrenal hormones
- (r) Other hormonal considerations

3. Kinesiology/Biomechanics

- (a) Biomechanics of resistance exercise
- (b) Skeletal musculature
- (c) Anatomical planes and major body movements
- (d) Human strength and power
- (e) Sources of resistance to muscle contraction
- (f) Joint biomechanics: Concerns in resistance training

4. Sports Nutrition

- (a) Basic nutrition factors in health
- (b) Role of sport nutrition professionals
- (c) Standard nutrition guidelines
- (d) Macronutrients
- (e) Vitamins
- (f) Minerals
- (g) Fluid and electrolytes
- (h) Nutrition strategies for maximizing performance
- (i) Pre-competition, during-event, and post-competition nutrition
- (j) Nutrition strategies for altering body composition
- (k) Feeding and eating disorders
- (I) Performance-enhancing substances and methods
- (m) Types of performance-enhancing substances
- (n) Hormones
- (o) Dietary supplements

5. Psychology of Sport and Exercise

- (a) Psychology of athletic preparation and performance
- (b) Role of sport psychology



- (c) Ideal performance state
- (d) Energy management: arousal, anxiety, and stress
- (e) Influence of arousal and anxiety on performance
- (f) Motivation
- (g) Attention and focus
- (h) Psychological techniques for improved performance
- (i) Enhancing motor skill acquisition and learning

6. Scientific Principles of Strength and Conditioning

- (a) Adaptations to anaerobic training programs
- (b) Neural adaptations
- (c) Muscular adaptations
- (d) Connective tissue adaptations
- (e) Endocrine responses and adaptations to anaerobic training
- (f) Cardiovascular and respiratory responses to anaerobic exercise
- (g) Compatibility of aerobic and anaerobic modes of training
- (h) Overtraining: definition, prevalence, diagnosis, and potential markers
- (i) Detraining
- (j) Adaptations to aerobic endurance training
- (k) Acute responses to aerobic exercise
- (I) Chronic adaptations to aerobic exercise
- (m) External and individual factors influencing adaptations to aerobic endurance training
- (n) Age- and sex-related differences and their implications for resistance exercise
- (o) Children
- (p) Female athletes
- (q) Older adults
- (r) Rehabilitation and reconditioning
- (s) Types of injury
- (t) Tissue healing
- (u) Rehabilitation and reconditioning strategies
- (v) Program design
- (w) Reducing risk of injury and reinjury

7. Resistance Training and Conditioning (Practical/Laboratory)

- (a) Warm-up and flexibility training
- (b) Types of stretching
- (c) Static stretching techniques
- (d) Dynamic stretching techniques
- (e) Exercise technique for free-weight and machine training
- (f) Fundamentals of exercise technique
- (g) Spotting free-weight exercises
- (h) Resistance training exercises
- (i) Olympic-style lifting techniques: progressions and regressions
- (j) Exercise technique for alternative modes and nontraditional implement training
- (k) Bodyweight training methods
- (I) Core stability and balance training methods
- (m) Variable-resistance training methods
- (n) Unilateral training
- (o) Alternative modes and nontraditional exercises



- 8. Exercise Testing/Exercise Prescription with Emphasis in Anaerobic Exercise
 - (a) Principles of test selection and administration
 - (b) Reasons for testing
 - (c) Testing terminology
 - (d) Evaluation of test quality
 - (e) Test selection
 - (f) Test administration
 - (g) Administration, scoring, and interpretation of selected tests
 - (h) Measuring parameters of athletic performance
 - (i) Selected test protocols and scoring data
 - (j) Statistical evaluation of test data
- 9. Program Design as Related to Strength and Conditioning
 - (a) Program design for resistance training
 - (b) Principles of anaerobic exercise prescription
 - (i) Step 1: Needs analysis
 - (ii) Step 2: Exercise selection
 - (iii) Step 3: Training frequency
 - (iv) Step 4: Exercise order
 - (v) Step 5: Training load and repetitions
 - (vi) Step 6: Volume
 - (vii) Step 7: Rest periods
 - (c) Program design and technique for plyometric training
 - (i) Plyometric mechanics and physiology
 - (ii) Design of plyometric training programs
 - (iii) Age considerations
 - (iv) Plyometrics and other forms of exercise
 - (v) Safety considerations
 - (vi) Plyometric drills
 - (d) Program design and technique for speed and agility training
 - (i) Speed and agility mechanics
 - (ii) Neurophysiological basis for speed
 - (iii) Running speed
 - (iv) Agility performance and change-of-direction ability
 - (v) Methods of developing speed
 - (vi) Methods of developing agility
 - (vii) Program design
 - (viii) Speed development strategies
 - (ix) Agility development strategies
 - (x) Speed and agility drills
 - (e) Program design and technique for aerobic endurance training
 - (i) Factors related to aerobic endurance performance
 - (ii) Designing an aerobic endurance program
 - (iii) Types of aerobic endurance training programs
 - (iv) Application of program design to training seasons



- (v) Special issues related to aerobic endurance training
- (vi) Aerobic endurance training exercises
- (vii) Periodization
- (viii) Central concepts related to periodization
- (ix) Periodization hierarchy
- (x) Periodization periods
- (xi) Applying sport seasons to the periodization periods
- (xii) Undulating versus linear periodization models
- (xiii) Example of an annual training plan

10. Program organization, administration, and oversight

- (a) Facility design, layout, and organization
- (b) General aspects of new facility design
- (c) Existing strength and conditioning facilities
- (d) Assessing athletic program needs
- (e) Designing the strength and conditioning facility
- (f) Arranging equipment in the strength and conditioning facility
- (g) Maintaining and cleaning surfaces and equipment
- (h) Facility policies, procedures, and legal issues
- (i) Mission statement and program goals
- (j) Legal and ethical issues
- (k) Staff policies and activities
- (I) Facility administration
- (m) Emergency planning and response

<u>Documentation of Compliance (provide the following):</u>

Curriculum "map," syllabi, and other course documents demonstrating inclusion of areas of instruction listed in Standards III.C (in this document); description of how the expected **outcomes** are met; and examples of learning experiences/objectives and documentation including course syllabi, sample exams, final exams, and practical/lab experiences.

III.D. Strength and Conditioning *Field Experience*

- 1. The **field experience** must provide an opportunity for the student to demonstrate application of areas of instruction listed in Standard III.C (in this document).
- The field experience must follow a logical sequence in the curriculum, allowing the student
 to apply the knowledge, skills, and abilities learned through didactic and laboratory classes.
 Field experience should be done towards the end of the curriculum within the final year of
 study.
- 3. The **field experience** must provide opportunity for students to demonstrate professional and ethical standards within the field of strength and conditioning.
- 4. The **field experience** must provide a minimum of 300 hours of contact time including:
 - a. A minimum of two substantially different experiences that include two or more of the following categories: sport, gender, age range, or other.
 - b. Two different supervisors (does not require experiences at two different sites).
 - c. Minimum of 75 hours per experience.
 - d. One experience must be at least 6 weeks in length.
 - e. Specifically, the **field experience** must minimally include the following key areas: warm-up, flexibility training, exercise technique, spotting, Olympic-style lifting,



- progressions/regressions, test selection and administration, program design, speed/agility/plyometric training, anaerobic and aerobic program design, and periodization.
- 5. There must be a **Memorandum of Understanding (MOU)** or other document signed by both the field experience site (by someone with signing authority) and the institution recognizing the student's presence at the site and giving permission for the student to participate in the **field experience** actively.
- 6. **Field experience** must be included in the curriculum as a course or part of a course.
- 7. Paid **field experiences** are permitted provided they meet all the requirements as described in this section.

<u>Documentation of Compliance (provide the following):</u>

Narrative or curriculum "map" describing how the areas of instruction listed in Standard III.C are integrated across the **field experiences** that require students to demonstrate and apply these principles, a log of **field experience** hours/experiences/client encounters for each student, a description of how the expected **outcomes** are met, examples of learning experiences/objectives and documentation including evaluations from Field Experience Site Supervisor, and a **Memorandum of Understanding (MOU)** for each field experience site.

SECTION IV. OUTCOMES

IV.A. There is an ongoing, formal program assessment process that determines the extent to which the program meets its stated **outcomes**.

The assessment process minimally includes data related to:

- 1. Student outcomes
- 2. Program outcomes
- 3. Council on Accreditation of Strength and Conditioning Education (CASCE) Standards
- 4. Instruction
- 5. Field experiences
- 6. Admissions criteria and prerequisites
- 7. Curriculum scope and sequence
- 8. Graduate placement rates
- 9. Retention and graduation rate
- 10. CSCS exam success for graduates of the program
- IV.B. Identifies program strengths and weaknesses.
- IV.C. Includes decisions that were considered regarding need for change.
- IV.D. Includes steps to achieve the changes, with anticipated dates of completion.
- IV.E. The extent to which graduates of the program meet the expected student **outcomes** of the program.
- IV.F. First-time pass rates for the CSCS exam, based on a 3-year aggregate, must be at least 75%.



IV.G. Programs must publicly display student enrollment, graduation, retention rate, CSCS pass rate, and graduate placement rate on the institution's website.

<u>Documentation of Compliance (provide the following):</u>

A copy of the assessment plan for both program and student **outcomes**, reports showing data collected through the assessment plan, demonstrate strengths and weaknesses and how those were or will be addressed in the curriculum, describe any changes that will occur over the next 3-5 years as a result of assessment, 3-year aggregate **first-time pass rates**, 12-month employment rates, and screenshot and URL of webpage containing information as required in Standard IV.G.

SECTION V. RESOURCES

- V.A. Student Services The program must demonstrate that advising, academic support, disability, and financial aid services are available to students consistent with other programs at the institution.
- V.B. Support Staff The program has, or has access to, administrative, secretarial, and technical support to meet its program **outcomes**.
- V.C. Financial Support The program must receive adequate, equitable, and annually available resources necessary to meet the program's size, mission, and program **outcomes**, and sustainability of the program.
- V.D. Academic Resources The institutional library system and/or associated learning resources are adequate to support faculty and student **scholarship** and the educational needs of the program.
- V.E. Facilities The program has, or has access to:
 - Classroom/laboratory/training space of sufficient quality and quantity to carry out program goals. The physical environment is supportive of effective teaching and learning processes.
 - 2. The program has offices and other space of sufficient quantity and quality for faculty to carry out their teaching, advisement, and service activities efficiently and effectively.
- V.F. Equipment, Technology, and Materials The program has, or has access to, equipment, technology, and materials necessary to meet program and student **outcomes** and CASCE Professional Standards and Guidelines.

Documentation of Compliance (provide the following):

Documentation of student services listed in Standard V.A; income and expense data; adequacy of the budget and services to meet the needs of the program, to include supplies, equipment purchase, repair, and replacement; a description of the process used to determine short- and long-term budgetary needs that are tied to the goals and expected **outcomes** of the program; an example list or link to library/learning resources; a narrative describing facility components identified in



Standard V.E and how they are adequate to meet program needs; and a narrative describing components identified in Standard V.F and how they are adequate to meet program needs.

SECTION VI. POLICIES

- VI.A. Prospective and enrolled students are provided with relevant information about the institution and program that may affect them, including, but not limited to:
 - 1. Catalogs
 - 2. Academic calendars
 - 3. Grading policies
 - 4. Financial aid
 - 5. The program's accreditation status
 - 6. The process to register a complaint with the accrediting agency
 - 7. Student grievances
 - 8. Program/student **outcomes** information
 - 9. Tuition cost/program fees
 - 10. Withdrawal/refund
 - 11. Remediation, retention, and other pertinent information
- VI.B. Materials related to the institution and program are accurate, comprehensive, current, and provided to students in a timely manner.
- VI.C. Program policies, procedures, and practices related to student recruitment, admission, and **field experience** placement are based on appropriate and equitable criteria and applicable law, and ensure nondiscrimination and equal opportunity.
- VI.D. Policies, procedures, and practices that affect the rights, responsibilities, safety, privacy, and dignity of students are written, disseminated, and applied equitably.
- VI.E. Policies, procedures, and practices are in place to handle student complaints and grievances, and are followed.
- VI.F. Policies, procedures, or practices provide for compliance with accreditation standards, including:
 - 1. Timely submission of required fees
 - 2. Timely submission of required documentation
 - 3. Timely notification of expected or unexpected substantive change(s) within the program and of any change in institutional accreditation status or legal authority to provide post-secondary education
- VI.G. Accreditation status (and changes in status) will be publicly available. Current students will be immediately notified of a change in accreditation status.

<u>Documentation of Compliance (provide the following):</u>

Explanation of how students gain entry into the program, including specific admission standards; explanation of how students are provided with, or can access, information relating to program policies, procedures, and practices; explanation of how complaints are handled/processed;



description of how records of complaints are, or would be, maintained; appropriate pages of student handbook and/or institution catalog/website demonstrating components of Standard VI.A; and narrative of how students are provided with the information if not via the institution's public website.



Glossary Section

Memorandum of Understanding (MOU) – A formal agreement between the institution and a field experience or field experience site. The agreement defines the roles of the institution, the site, and the student and specifically allows the student to be at the facility.

Field Experience – The practical experiences that are part of the curriculum. "Field experience" is a general term and the institution may wish to use a name that is consistent within the institution. May be called "practical experience," "internship," or other appropriate title, but must contain practical, hands-on components with actual clients.

First-Time Pass Rate – The percentage of students from the program who take the CSCS examination and pass on the first attempt. The first-time pass rate will be calculated using a 3-year aggregate of the number of students who passed the examination on the first attempt, divided by the number of students from the program who attempted the exam during that 3-year period.

Outcomes – Student and program outcomes are quantitative or qualitative indications of achievement.

Scholarship – Contributions to the academy that are broadly defined by the Boyer model¹. Scholarship of discovery, integration, application/practice, and teaching.

References

1. Boyer, EL. *Scholarship Reconsidered: Priorities of the Professoriate*. San Francisco, CA: Jossey-Bass; 1991.

