

Science Content-Specific Rubric

Student Name: _____ **Date:** _____

Teacher Candidates (TC) are expected to meet Performance-Based Standards for Colorado and National Science Teacher Association (NSTA) Standards for Science Teacher Preparation at the Proficient or Advanced level by the end of the student teaching experience. A practicing teacher with five or more years of experience is typically at the advanced level.

- D** -Developing: Minimal understanding of the standard or weak demonstration of standard. Needs improvement to pass.
- P** - Proficient: Meets the standard’s performance indicators. Passes.
- A** - Advanced: Exemplary performance. Exceeds standards.

Please rate the candidate in the following **10** categories:

This standard will be predominantly assessed with the PRAXIS/Place and GPA; however, observation ratings are also requested.	
NSTA Standard 1: Content Knowledge	
<i>Preservice teachers will:</i>	
1: Understand the <u>major concepts</u> , principles, theories, laws, and interrelationships of their fields of licensure and the supporting role of science-specific technology.	
2: Show an understanding of <u>state and national curriculum standards</u> and their impact on the content knowledge necessary for teaching P-12 students.	
This standard will be assessed predominantly with the work sample; however, observation ratings are also required.	
NSTA Standard 2: Content Pedagogy	
3: Plan multiple lessons using <u>a variety of inquiry approaches</u> that demonstrate their knowledge and understanding of how all students learn science.	
4: Include <u>active inquiry lessons</u> where students <u>collect and interpret data</u> in order to develop and communicate concepts and understand scientific processes, relationships and natural patterns from empirical experiences.	
5: Design instruction and assessment strategies that confront and <u>address naïve concepts/preconceptions</u> .	
This standard will be assessed predominantly with the work sample; however, observation ratings are also required.	
NSTA Standard 3: Learning Environments	
6: Plan inquiry lessons that engage students in authentic practices that reflect the <u>nature and social context of science</u> .	
7: Develop lesson plans with <u>learning goals</u> that include active inquiry lessons where students collect and interpret data using applicable science-specific technology in order to develop concepts, understand scientific processes, relationships and natural patterns from empirical experiences.	
8: Plan fair and equitable <u>assessment strategies</u> to analyze student learning and to <u>evaluate if the learning goals are met</u> . Assessment strategies are designed to continuously evaluate preconceptions and ideas that students hold and the understandings that students have formulated.	

<p>This standard will be assessed predominantly with observations; however, the work sample will also be used.</p> <p>NSTA Standard 4: Safety</p>	
<p>9: Design activities in a P-12 classroom that demonstrate the safe and proper techniques for the <u>preparation, storage, dispensing, supervision, and disposal of all materials</u> used within their subject area science instruction.</p>	
<p>10: Plan a learning environment and learning experiences for all students that demonstrate <u>chemical safety, safety procedures, and the ethical treatment of living organisms</u> within their licensure area.</p>	

Comments:

Evaluator signature: _____ Date: _____