

SECONDARY SCIENCE ENDORSEMENT APPLICATION - EARTH SCIENCE PATHWAY

Application for the Utah State Board of Education

APPLICANT INFORMATION

Name: _____ CACTUS ID#: _____

E-mail: _____

PURPOSE

This application allows an educator to apply for the Earth Science Pathway Secondary Science Endorsements which includes the Science Core, Earth Science 1, and the Earth Science 2 endorsements. This application can be used to apply for one, two, or all three endorsements

Science Core Endorsement

This endorsement, when attached to a current Educator License, verifies that the individual has the skills and knowledge necessary to teach students three-dimensionally in a secondary science classroom and is required to teach Middle School Science Courses in Grades 6, 7, or 8. Additionally, this endorsement is required as a prerequisite to earn any high school Level-1 or Level-2 content specific science endorsement.

Earth Science 1 Endorsement

This endorsement, when attached to a current Secondary Education License, verifies that the individual has the skills and knowledge necessary to teach students in a secondary earth science classroom and is required to teach High School (9-12) General Earth and Space Science Course and High School Astronomy, Environmental Science, Geology, and Meteorology Elective Courses. This endorsement is required as a prerequisite to earn Secondary Earth Science 2 which is required for Advanced courses (AP Environmental Science) and other high school earth science elective courses.

Earth Science 2 Endorsement

This endorsement, when attached to a current Secondary Education License, verifies that the individual has the skills and knowledge necessary to teach students in an advanced secondary earth science classroom and is required to teach Advanced Earth/Environmental (AP, CE, and IB) and other high school earth science elective courses. Those with this endorsement can also teach all the courses a Earth Science 1 endorsed educator can teach. NOTE: Advanced Earth/Environmental Science (AP, CE, and IB) courses may also include additional requirements in order to be approved by the university or college board to teach.

ENDORSEMENT LEVEL

Professional endorsements will be awarded when all the requirement areas for that endorsement are met, including the prerequisite professional endorsements requirement areas. An associate endorsement will be awarded if one of the following options are completed for that endorsement as outlined below:

- Science Core
 - Complete at least 3 of the 7 requirement areas.
- Earth Science 1 Endorsement
 - Holds Professional Science Core endorsement
 - Major/Minor in Earth Science
 - Completed at least 5 of the 12 requirement areas
- Earth Science 2
 - Holds Professional Earth Science 1 Endorsement
 - Major in Earth Science
 - Completed at least 6 of the 14 requirement areas.

PRELIMINARY QUESTIONS

Endorsements Applying For: Which endorsements and endorsement level are you applying for? (Select all that apply)

- Associate Science Core
- Professional Science Core
- Associate Earth Science 1
- Professional Earth Science 1
- Associate Earth Science 2
- Professional Earth Science 2

Science Core Endorsement: A professional Science Core Endorsement meets requirement areas 1-7 of the Earth Science Endorsement Pathway. Do you have a Professional Science Core Endorsement?

- Yes, year completed_____
- No

Elementary Science Endorsement: A professional Elementary Science Endorsement meets requirement area 5 of the Earth Science Endorsement Pathway. Do you have a Professional Elementary Science Endorsement?

- Yes, Year Completed_____
- No.

Earth Science 1 Endorsement: A professional Earth Science 1 Endorsement meets requirement areas 8-12 of the Earth Science Endorsement Pathway. Do you have a Professional Earth Science 1 Endorsement?

- Yes, Year Completed_____
- No.

Middle School Praxis Exam: Did you pass the Middle School Science Praxis exam (5442) with a score of 152 or higher? Note: Praxis exam IS NOT required, but is one way to demonstrate competency for requirement areas 1-4.

- No
- Yes Score: _____ Year Taken: _____
- I passed an equivalent exam. Test Name: _____

Middle Grades NES Test: Did you pass the Middle Grades General Science (205) NES Test with a score of 220 or higher? Note: NES exam IS NOT required, but is one way to demonstrate competency for requirement areas 1-4.

- No
- Yes Score: _____ Year Taken: _____

Earth Science Praxis Exam: Did you pass the Earth Science Praxis exam (5572) with a score of 148 or higher? Note: Praxis exam IS NOT required, but is one way to demonstrate competency for requirement areas 8-12.

- No
- Yes Score: _____ Year Taken: _____
- I passed an equivalent exam. Test Name: _____

Earth Science NES Test: Did you pass the Earth and Space Science (322) NES Test with a score of 220 or higher? Note: NES exam IS NOT required, but is one way to demonstrate competency for requirement areas 8-12.

- No
- Yes Score: _____ Year Taken: _____

College Major or Minor: Do you have a degree major or minor in Earth Science, Earth Science Education, Physical Science Education, or an Earth Science Variation (e.g. Environmental Science, Geology, Meteorology, Astronomy)? A degree major/minor IS NOT required but is one way to demonstrate competency for several requirement areas.

- No
- Yes University: _____ Major or minor? _____
Major/minor name: _____ Year: _____

Teaching Experience and Professional Learning: Have you taught either AP Environmental Science or IB Environmental Systems and Societies for 3 years and attended the associated Professional Learning (i.e. AP Environmental Science Summer Institute or IB DP Environmental Systems and Societies Workshop) with at least 2 years of teaching the course after the professional learning? Note: Teaching Experience and Professional Learning is NOT required but is one way to demonstrate competency for requirement areas 13 & 14.

- No
- Yes, I taught AP Environmental Science for 3 years and attended 1 Environmental Science Summer Institute
- Yes, I taught IB Environmental Systems and Societies for 3 years and attended 1 IB Environmental Systems and Societies Workshop

Course name: _____

Location: _____ Dates: _____

(*Attach documentation of completion)

ENDORSEMENT REQUIREMENT AREAS

Use the checkboxes below to indicate how each requirement area in the Earth Science Endorsement Pathway has been met. Only one demonstration of competency is needed per requirement area. For more information about the requirement areas, please see the [Science Core Endorsement Specs](#) for requirement areas 1-7, the [Earth Science 1 Endorsement Specs](#) for requirement areas 8-12 and the [Secondary Earth Science 2 Endorsement Specs](#) for requirement areas 13 and 14.

Science Core Requirement Areas

1. Earth Science Content Knowledge

- Professional Science Core Endorsement
- University Course in General Earth Science, Astronomy, Geology, or Meteorology

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Middle School Science Praxis Exam Passed
- Middle Grades General Science NES Test Passed

2. Life Science Content Knowledge

- Professional Science Core Endorsement
- University Course in General Biology

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Middle School Science Praxis Exam Passed
- Middle Grades General Science NES Test Passed

3. Chemistry Content Knowledge

- Professional Science Core Endorsement
- University Course in General Chemistry

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Middle School Science Praxis Exam Passed
- Middle Grades General Science NES Test Passed

4. Physics Content Knowledge

- Professional Science Core Endorsement
- University Course in General Physics

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Middle School Science Praxis Exam Passed
- Middle Grades General Science NES Test Passed

5. Three-Dimensional Science & Engineering Pedagogical Knowledge

- Professional Science Core Endorsement
- University Course in Three-Dimensional Science and Engineering Pedagogy

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Have a Professional Elementary Science Endorsement
- Microcredential Stack - [Three-Dimensional Science and Engineering](#)
(*Must include MIDAS Transcript)
- Approved USBE or District Course

Course name: _____ Year: _____

(*Must include MIDAS Transcript or other Documentation of Completion)

6. Science Education Teaching & Dispositions Knowledge

- Professional Science Core Endorsement
- University Course in Teaching Methods in Science

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Microcredential Stack - [Science Teaching Methods](#)
(*Must include MIDAS Transcript)

7. Science Classroom Lab Safety Knowledge

- Professional Science Core Endorsement
- University Course in Classroom Lab Safety

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- Flinn Safety Certificate, District approved Safety Course, USBE Approved Safety Course

Course name: _____ Year: _____

(*Must include MIDAS Transcript or other Documentation of Completion)

Earth Science 1 Requirement Areas

8. Earth's Place in the Universe Content Knowledge

- Professional Earth Science 1 Endorsement
- University Course in Astronomy

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major or Minor in Earth Science, Earth Science Education, Physical Science Education, or an Earth Science Variation
- Earth Science Praxis Exam Passed
- Earth Science NES Test Passed

9. Geologic Systems & Processes Content Knowledge

- Professional Earth Science 1 Endorsement
- University Course in Geology

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major or Minor in Earth Science, Earth Science Education, Physical Science Education, or an Earth Science Variation
- Earth Science Praxis Exam Passed
- Earth Science NES Test Passed

10. Weather & Climate Content Knowledge

- Professional Earth Science 1 Endorsement
- University Course in Meteorology

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major or Minor in Earth Science, Earth Science Education, Physical Science Education, or an Earth Science Variation
- Earth Science Praxis Exam Passed
- Earth Science NES Test Passed

11. Biogeology Content Knowledge

- Professional Earth Science 1 Endorsement
- University Course in Ecology

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major or Minor in Earth Science, Earth Science Education, Physical Science Education, or an Earth Science Variation
- Earth Science Praxis Exam Passed
- Earth Science NES Test Passed

12. Earth & Human Activity Content Knowledge

- Professional Earth Science 1 Endorsement
- University Course in Environmental Science

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major or Minor in Earth Science, Earth Science Education, Physical Science Education, or an Earth Science Variation
- Earth Science Praxis Exam Passed
- Earth Science NES Test Passed

Earth Science 2 Requirement Areas

13. Advanced Data Analysis Content Knowledge

- University Course in General or Applied Statistics

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major in Earth Science, Earth Science Education, or an Earth Science Variation
- Teaching Experience with AP/IP Environmental Science and Professional Learning

14. Advanced Earth Science Content Knowledge

- Two University Courses in any two of the following Advanced/Applied Earth Science course options (In addition to the Earth Science Courses used to earn the Secondary Earth Science 1 Endorsement):
 - Atmospheric Science
 - Environmental Management
 - Geologic/Natural Hazards
 - Historical Geology, Physical Geology, or Intro to GIS
 - Soil Science
 - Other upper division (3000+) earth science course

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

University: _____ Course code: _____

Course name: _____ Semester/Year: _____ Grade: _____

- College Major in Earth Science, Earth Science Education, or an Earth Science Variation
- Teaching Experience with AP/IP Environmental Science and Professional Learning

APPLICATION SUBMISSION

Please submit application online in the Utah Educator Licensing Application system, [Survey Monkey Apply](https://usbelicensing.smapply.us) (<https://usbelicensing.smapply.us>)

APPLICANT'S CERTIFICATIONS

- I certify that the information contained in this application is true.
- *I have submitted any required documentation such as original transcripts, MIDAS transcripts, etc.
- I have sent electronic transcripts directly from the College/University clearinghouse to the USBE Licensing Department at transcripts@schools.utah.gov.