



Occupation: Environmental Science and Protection Technicians

[O*NET Code: 19-4042.00](#)

Related Supplemental Instruction (RSI)

Unpaid, facilitated by Open Source Ag 501(c)(3):

Time spent in related and supplemental instruction may not be compensated per CA DAS and US DOL. For details on these hours, please see the RSI example document.

Environmental Science and Protection Technicians Skills	40 hours
Microsoft Office Suite	20 hours
Technology	30 hours
Communication	20 hours
Analysis	20 hours
Operations	20 hours
Total Related Supplemental Instruction Hours	150 hours

Competencies - On-the-Job Training (paid):

1. Collect samples of gases, soils, water, industrial wastewater, or asbestos products to conduct tests on pollutant levels or identify sources of pollution.
2. Record test data and prepare summaries or charts that interpret test results.
3. Prepare samples for testing and analysis. Discuss test results and analyses with team members.
4. Weigh, analyze, or measure collected sample particles, such as lead, coal dust, or rock, to determine concentration of pollutants.
5. Calibrate microscopes or test instruments.
6. Maintain files, such as hazardous waste databases, chemical usage data, personnel exposure information, or diagrams showing equipment locations.
7. Support set up of equipment or stations to monitor and collect pollutants from sites, such as smokestacks, manufacturing plants, or mechanical equipment.
8. Monitor emission control devices to ensure they are operating properly and comply with state and federal regulations.
9. Learn about amounts and kinds of chemicals to use in destroying harmful organisms or removing impurities from purification systems.
10. Project Management Software —Microsoft Teams: Utilize Microsoft Teams and Outlook to schedule and attend meetings, collaborate with team members, manage project tasks, and track progress.

11. Spreadsheet software — Use Microsoft Excel to analyze data, create spreadsheets, and perform calculations.
12. Utilize Geographic Information Systems (GIS) to communicate and share data.
13. Utilize graphics, photo imaging, or mapping software to communicate and share information.
14. Utilize public and private databases and artificial intelligence to gather information related to pollution and conservation.
15. Analyzing Data or Information — Identifying the underlying principles, reasons, or facts of information by breaking down information or data into separate parts.
16. Organizing, Planning, and Prioritizing Work — Developing specific goals and plans to prioritize, organize, and accomplish your work.
17. Making Decisions and Solving Problems — Analyzing information and evaluating results to choose the best solution and solve problems.
18. Communicating with Supervisors, Peers, or Subordinates — Providing information to supervisors, co-workers, and subordinates by telephone, in written form, e-mail, or in person.
19. Establishing and Maintaining Interpersonal Relationships — Developing constructive and cooperative working relationships with others.
20. Communicating with People Outside the Organization — Communicating with people outside the organization, representing the organization to customers, the public, government, or other external sources.