

Cornell Guided Notes

Principles of Biomedical Technology (Principles of Biomedical Science) | 2026-11-19

Name

Period

Date

Lesson

Lesson focus

Source and agent CER

Key words and questions

Prepared details and student notes

Essential question
What is today's target?

Students write a CER identifying the likely source and infectious agent of the outbreak. Big idea: An outbreak CER earns its claim by linking three independent data sources: curve shape, geographic cluster, and agent ID.

My notes, examples, and questions

Key words
What vocabulary unlocks the lesson?

- epidemiology
- line list
- epidemic curve
- incubation
- prevalence
- incidence
- causative agent

My notes, examples, and questions

Cornell Guided Notes

Principles of Biomedical Technology (Principles of Biomedical Science) | 2026-11-19

Cornell Notes - Continued

Key words and questions

Prepared details and student notes

Must-know ideas
What should I understand by the end?

- Attack rate = (number of cases / number exposed) x 100: a quantitative measure of outbreak severity.
- Multi-tool evidence means citing the curve, the map, and the test result independently, not as a single statement.
- Assumptions reveal where the investigation could be wrong; limitations reveal where the data is incomplete.

My notes, examples, and questions

Process notes
What happens during class?

- 0-8 min: Review Wednesday data: confirm curve shape, map cluster location, and agent-ID result.
- 8-20 min: Write the claim: name the likely source (location/event) and infectious agent in one sentence.
- 20-45 min: Write evidence: cite curve shape, map cluster, and agent-ID result as three separate points.
- 45-60 min: Write reasoning: connect exposure patterns to the proposed source for each evidence point.
- 60-70 min: Calculate and insert incidence or attack-rate value; add assumptions and limitations.
- 70-80 min: Peer review: confirm three evidence sources are cited, quantitative value is present, limitation stated.

My notes, examples, and questions

Cornell Guided Notes

Principles of Biomedical Technology (Principles of Biomedical Science) | 2026-11-19

Cornell Notes - Continued

Key words and questions

Prepared details and student notes

Steps and evidence
What do I do and turn in?

- State a claim naming the likely source and agent of the outbreak.
- Cite epidemic-curve, map, and identification-test evidence.
- Explain reasoning that links exposure patterns to the proposed source.
- Quantify the outbreak using incidence and attack-rate values.
- Identify assumptions and limitations in the data and methods.

Evidence: CER - CER naming the likely outbreak source and infectious agent, citing epidemic curve, spot map, and agent-ID evidence, including an attack rate or incidence value, and stating assumptions and limitations.

My notes, examples, and questions

Checks for understanding
How do I know I got it?

- Write a CER naming source and agent with multi-tool evidence.
- Include a quantitative measure and at least one limitation.

My notes, examples, and questions

Cornell Guided Notes

Principles of Biomedical Technology (Principles of Biomedical Science) | 2026-11-19

Cornell Notes - Continued

Key words and questions

Prepared details and student notes

Lab or safety notes
What must I handle carefully?

Supplies:

- Line-list data set
- Graph paper or spreadsheet
- Agar plates or simulation cards
- Inoculating loop
- Disposable gloves
- Disinfectant and biohazard disposal bag
- Lab notebook

My notes, examples, and questions

Summary

Today's lesson focused on Source and agent CER. The main target was: Students write a CER identifying the likely source and infectious agent of the outbreak. The evidence of learning is CER: CER naming the likely outbreak source and infectious agent, citing epidemic curve, spot map, and agent-ID evidence, including an attack rate or incidence value, and stating assumptions and limitations.. In my own words, the most important idea from today is:

My summary

My final question or connection