

Cornell Guided Notes

Human Anatomy & Physiology (Human Body Systems) | 2027-02-23

Name

Period

Date

Lesson

Lesson focus

Kinesiology data analysis

Key words and questions

Prepared details and student notes

Essential question
What is today's target?

Analyze your motion data and write a CER about fatigue and range of motion. Big idea: Graphing physiological data reveals trends that cannot be seen in a raw data table, and a data-based CER is the standard format for communicating scientific findings.

My notes, examples, and questions

Key words
What vocabulary unlocks the lesson?

- fatigue
- EMG
- range of motion
- flexion
- extension
- biomechanics
- kinesiology

My notes, examples, and questions

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Cornell Notes - Continued

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

- A line graph of force or angle versus trial number should show a plateau or decline as fatigue sets in; the slope of that decline quantifies fatigue rate.
- Kinesiology is the study of human movement; range of motion (ROM) is the extent of movement at a joint measured in degrees.
- A CER using collected data must cite specific trial numbers or values as evidence, not general statements about what usually happens.

My notes, examples, and questions

Process notes
What happens during class?

- 0-8: Intro: graphing conventions and CER structure review
- 8-20: Build labeled graph from Wednesday data table
- 20-40: PLTW online analysis questions on kinesiology
- 40-55: Identify trend and fatigue-onset from graph
- 55-75: Write data-based CER with specific trial numbers as evidence
- 75-80: Submit labeled graph and CER; preview Friday evidence packet

My notes, examples, and questions

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Steps and evidence What do I do and turn in?

- Graph your force or angle versus trial number.
- Describe the trend and identify where fatigue changed performance.
- Complete the PLTW online analysis questions on kinesiology.
- Write a CER claiming how fatigue affected range of motion, using your data as evidence.
- Submit your labeled graph and data-based CER.

Evidence: CER - Labeled graph of force or angle versus trial number plus a CER claiming how fatigue affected range of motion, citing specific data values.

My notes, examples, and questions

Checks for understanding How do I know I got it?

- You can graph and describe a fatigue trend.
- You can write a CER supported by your own data.

My notes, examples, and questions

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Lab or safety notes
What must I handle carefully?

Supplies:

- Physiology sensor or EMG probe
- Data collection device or laptop
- Hand dynamometer or grip device
- Goniometer for joint angles
- Kinesiology tape
- Lab notebook

My notes, examples, and questions

Summary

Today's lesson focused on Kinesiology data analysis. The main target was: Analyze your motion data and write a CER about fatigue and range of motion. The evidence of learning is CER: Labeled graph of force or angle versus trial number plus a CER claiming how fatigue affected range of motion, citing specific data values.. In my own words, the most important idea from today is:

My summary

My final question or connection