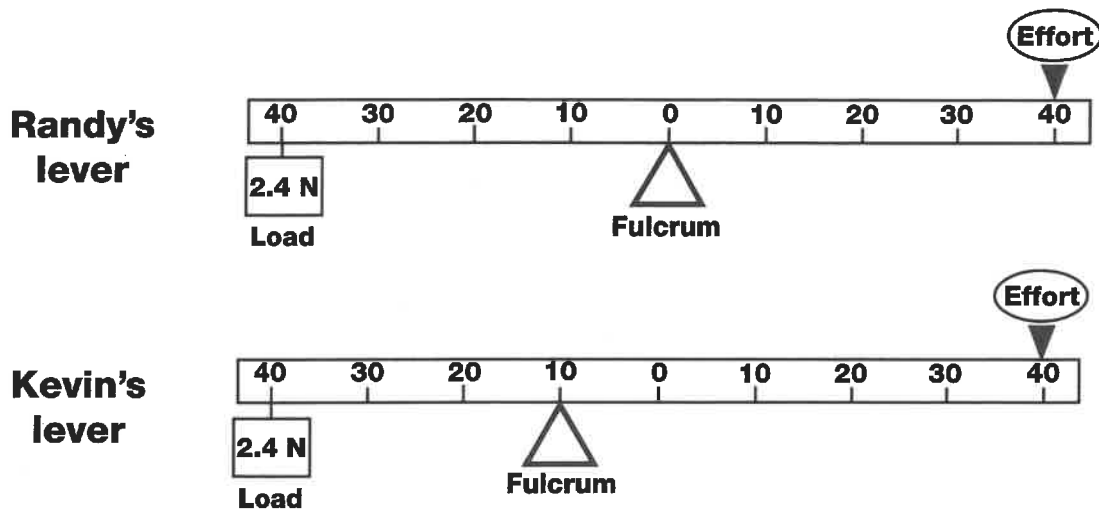


RESPONSE SHEET—LEVERS

Randy and Kevin had been working with levers for a couple of days. They were trying new ways to set up levers. They each set up a lever system. Both lever systems had the load hanging at the 40-cm position on one side, and the effort pressing at the 40-cm position on the other side.



Randy said, "Our levers are the same. They will both take the same amount of effort to lift the load."

Kevin responded, "I don't think so. One of these systems will require less effort to lift the load."

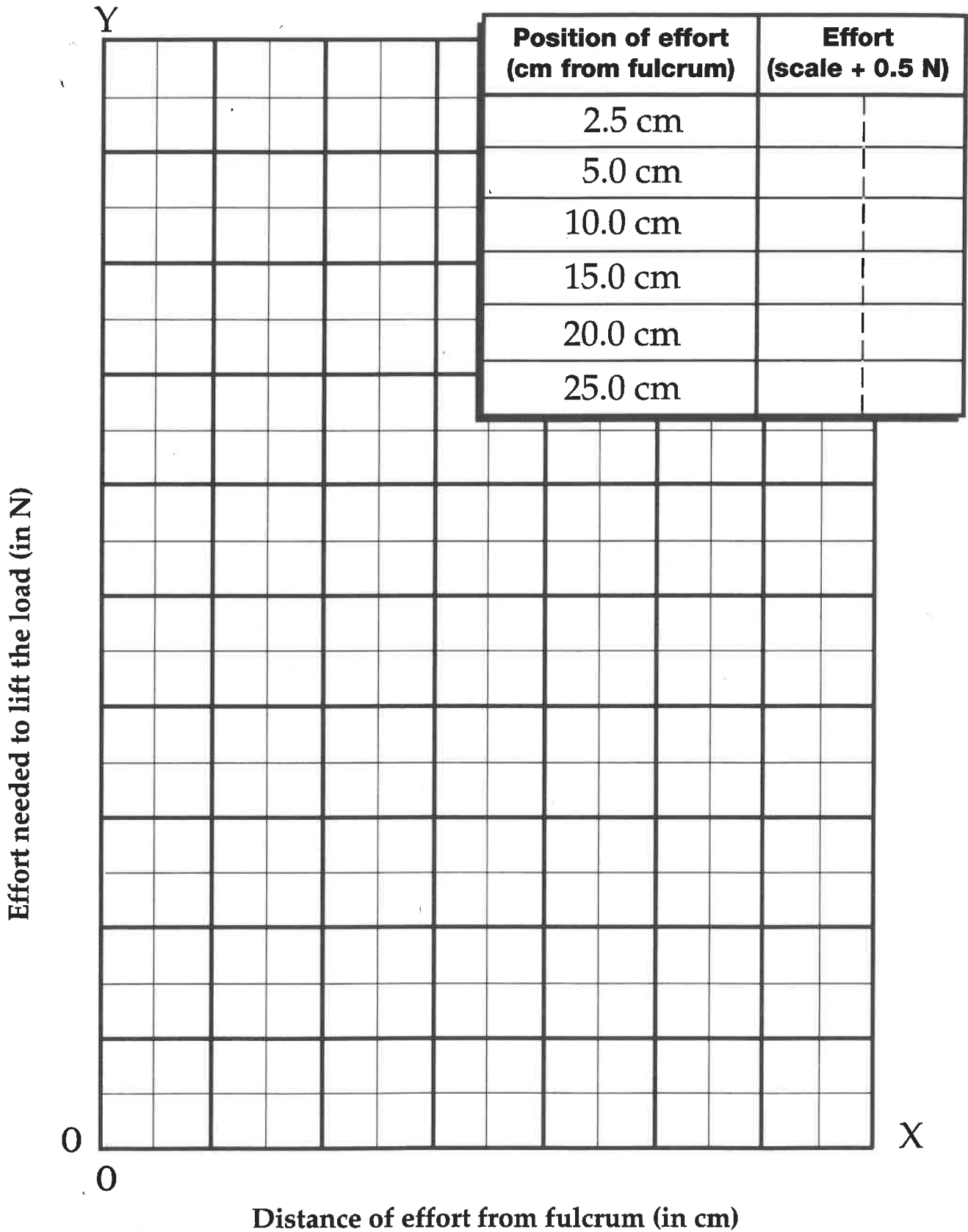
Which student do you think was right? Explain why you think so.

Name _____

Date _____

LEVER EXPERIMENT A

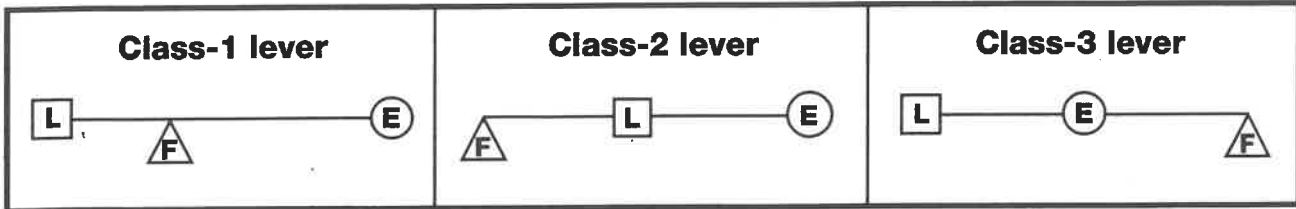
Lever experiment with LOAD positioned 10 cm from fulcrum



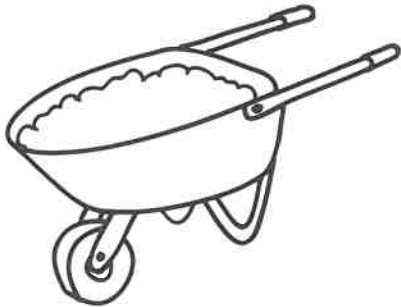
Name _____

Date _____

LEVER PICTURES A

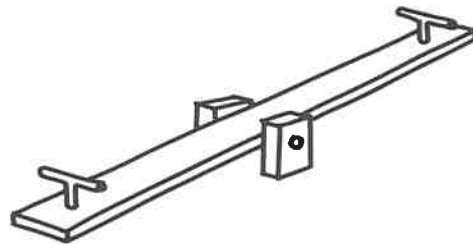


WHEELBARROW



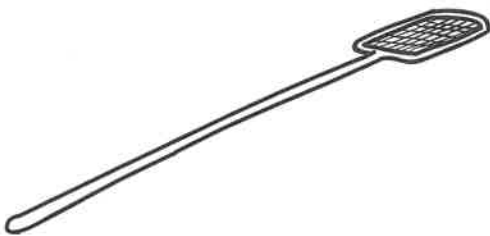
This is an example of a class- ____ lever.

TEETER-TOTTER



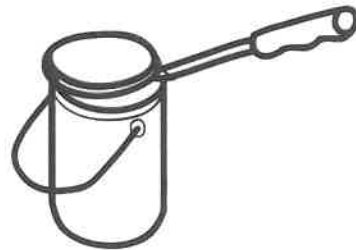
This is an example of a class- ____ lever.

FLY SWATTER



This is an example of a class- ____ lever.

PAINT-CAN OPENER

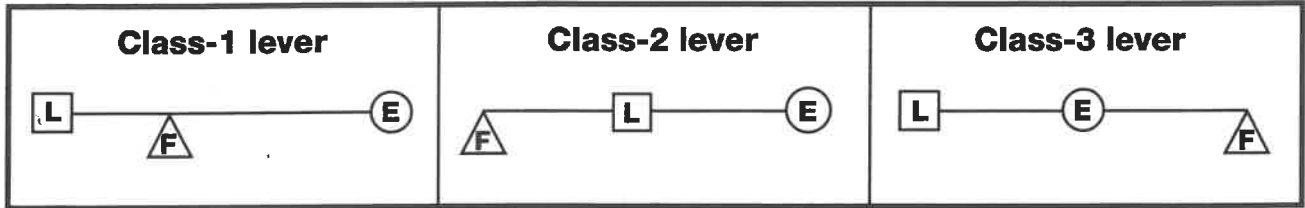


This is an example of a class- ____ lever.

Name _____

Date _____

LEVER PICTURES B

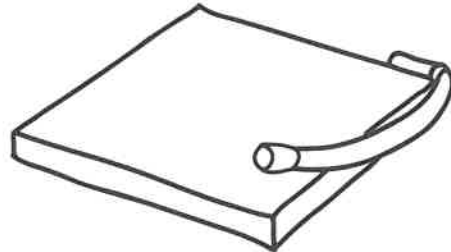


FISHING ROD



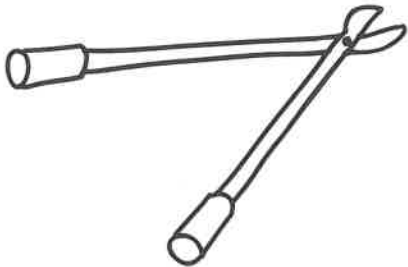
This is an example of a class- ____ lever.

PAPER CUTTER



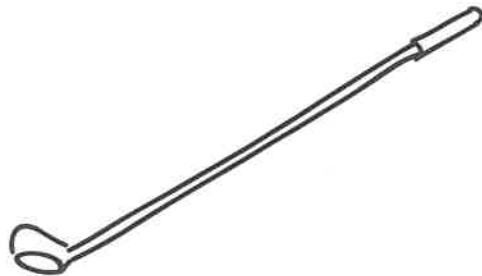
This is an example of a class- ____ lever.

TREE PRUNERS



This is an example of a class- ____ lever.

GOLF CLUB



This is an example of a class- ____ lever.

Name _____

Date _____

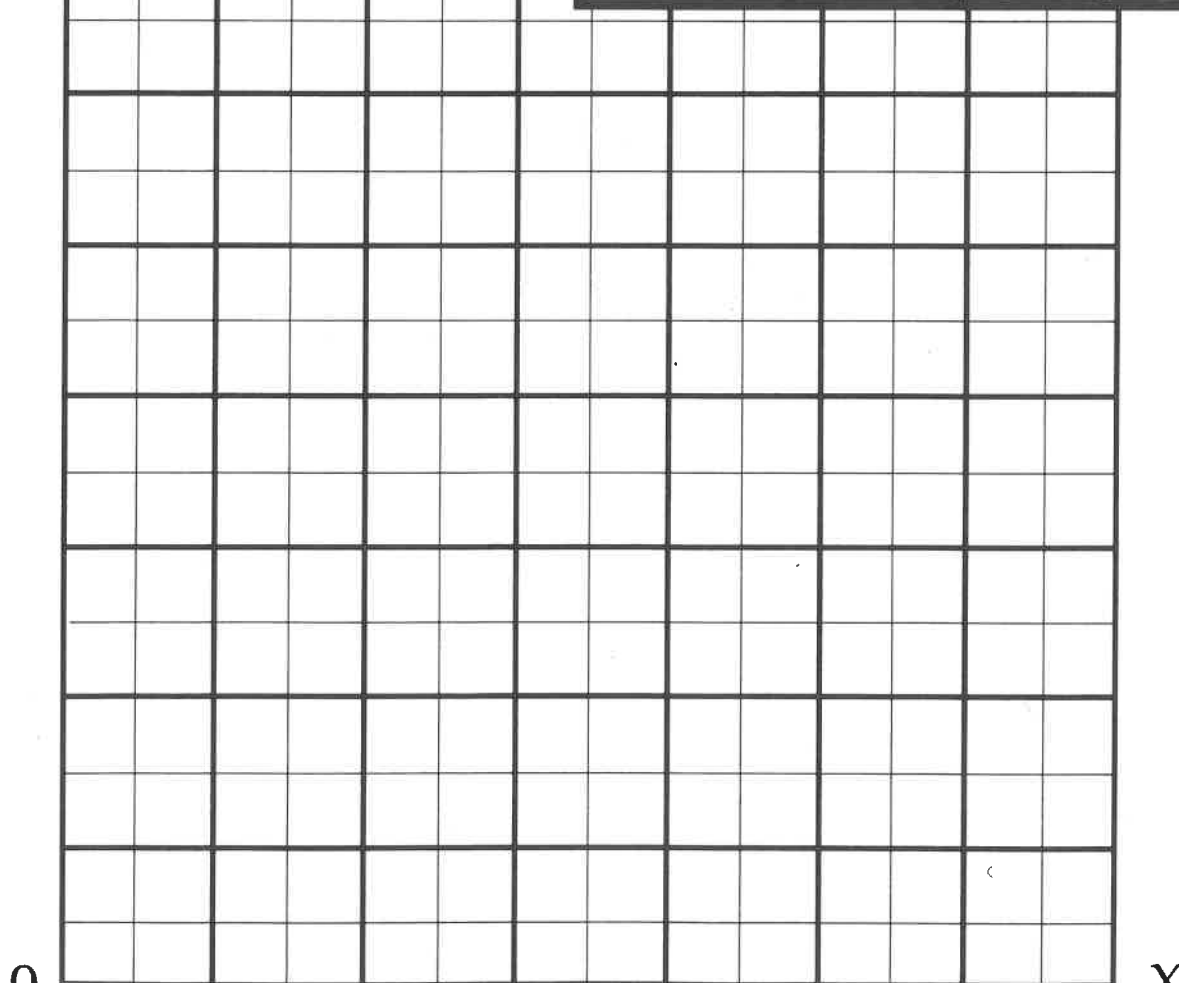
LEVER EXPERIMENT B

Lever experiment with **EFFORT** applied 10 cm from fulcrum.

Y

Position of load (cm from fulcrum)	Effort (scale + 0.5 N)
2.5 cm	
5.0 cm	
10.0 cm	
15.0 cm	
20.0 cm	
25.0 cm	

Effort needed to lift the load (in N)



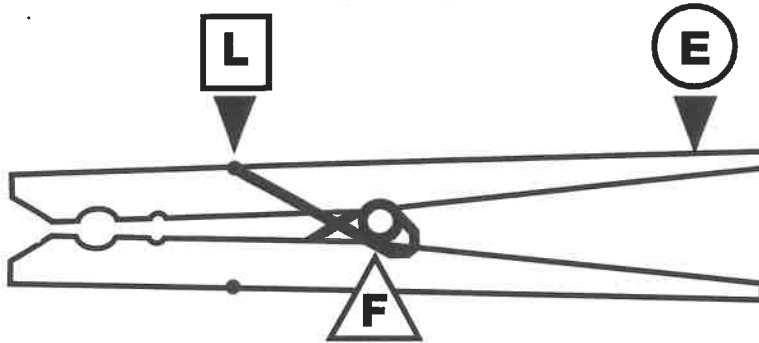
Distance of load from fulcrum (in cm)

Name _____

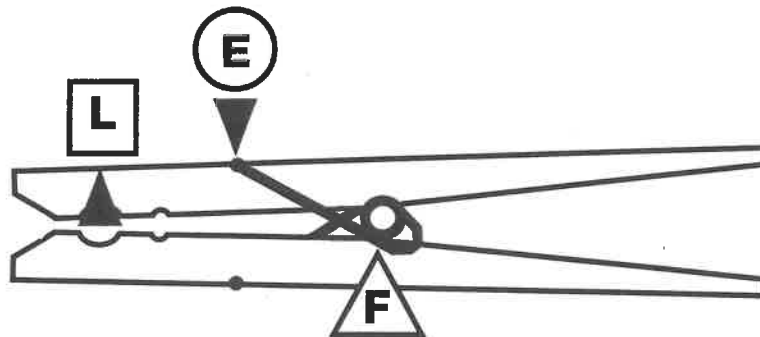
Date _____

RESPONSE SHEET—MORE LEVERAGE

Millie and Jasmine were looking at a clothespin. They were pretty sure that the clothespin is a class-1 lever. They analyzed it like this.



When Carrie looked at the clothespin, she said, "When you squeeze the clothespin, it is a class-1 lever, but when it is holding clothes on the line, it is a class-3 lever." Carrie analyzed the clothespin like this.



Do you agree with the girls? Why or why not? Explain your reasoning.
