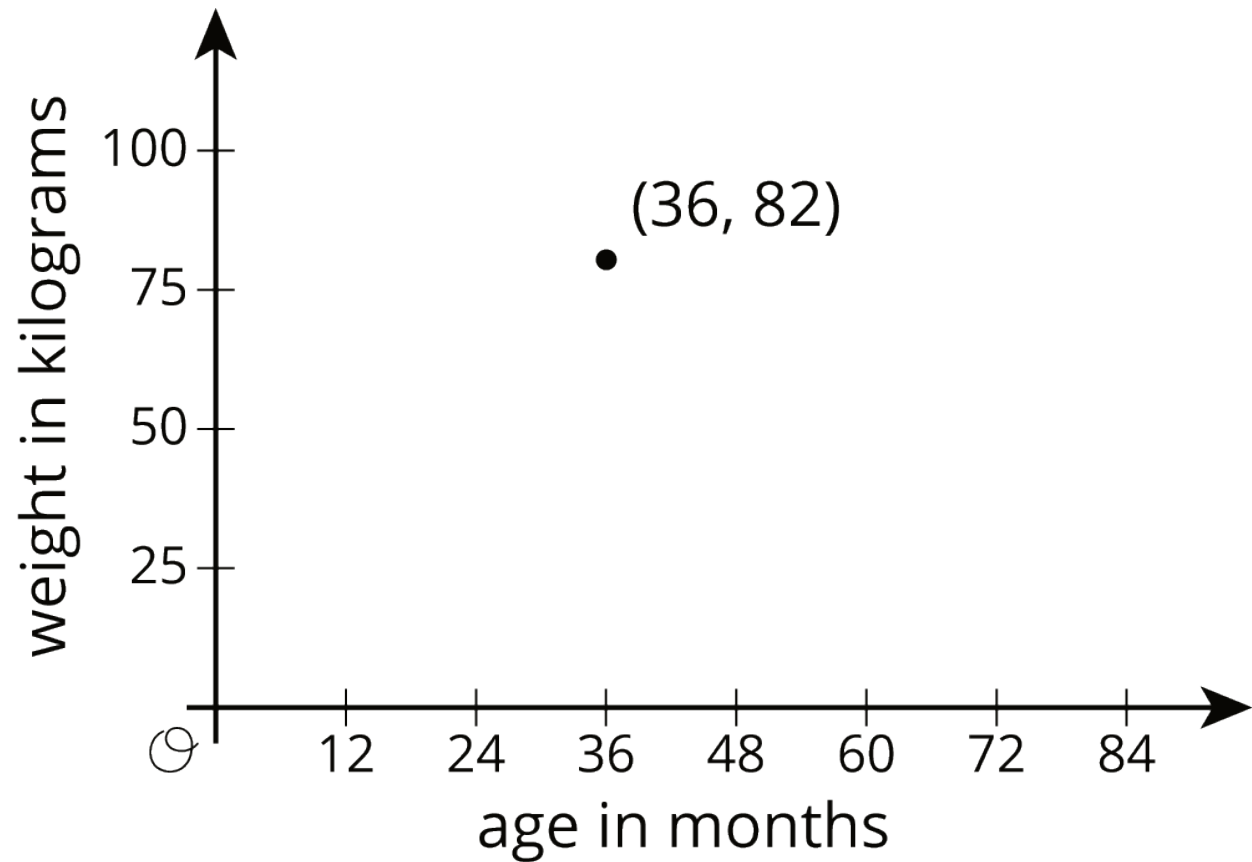# Unit 6 Lesson 3: What a Point in a Scatter Plot Means

1 The Giant Panda (Warm up)

Student Task Statement

A giant panda lives in a zoo. What does the point on the graph tell you about the panda?

2 Weight and Fuel Efficiency

Student Task Statement

The table and scatter plot show weights and fuel efficiencies of 18 cars.

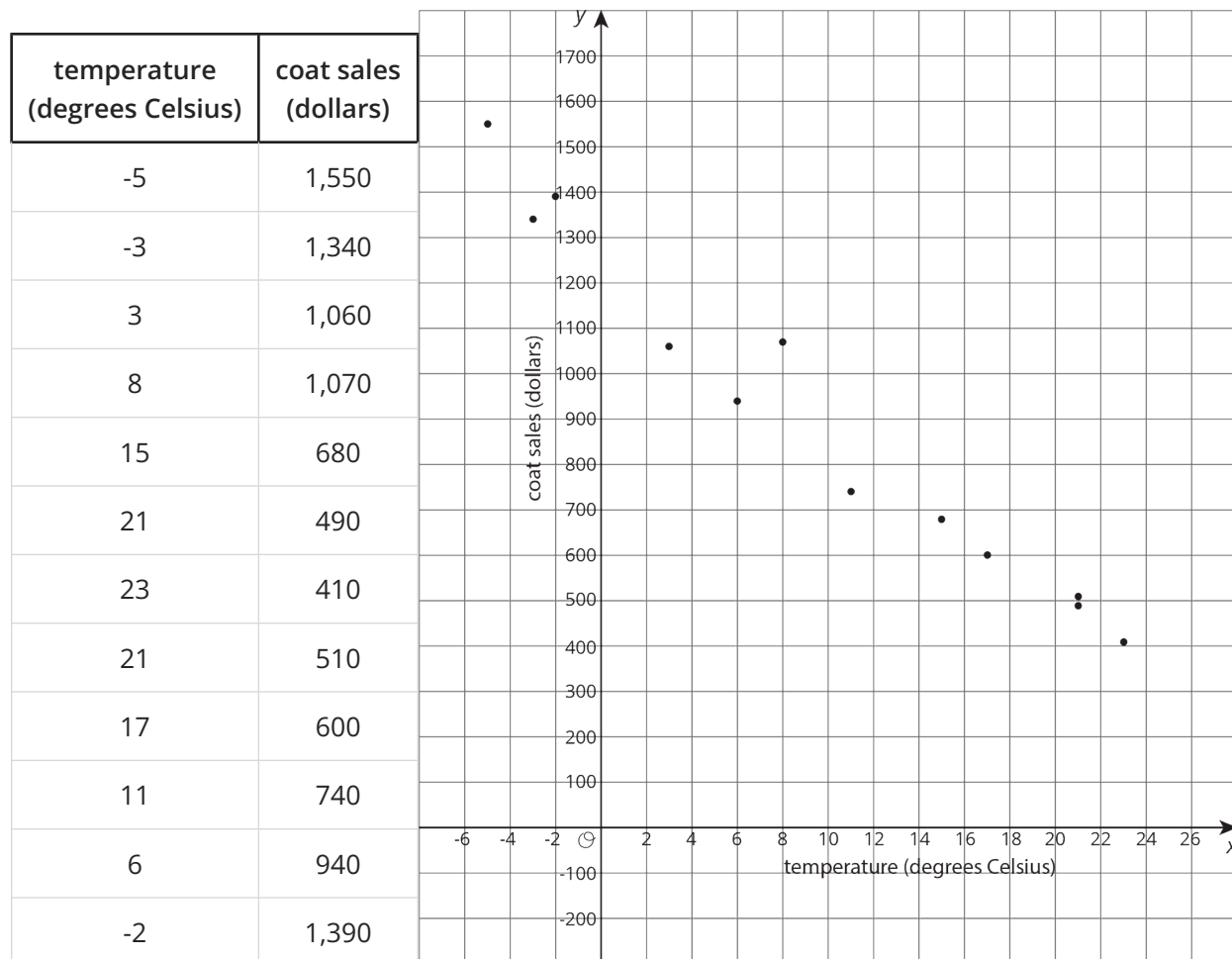| car	weight (kg)	fuel efficiency
A	1,549	25
B	1,610	20
C	1,737	21
D	1,777	20
E	1,486	23
F	1,962	16
G	2,384	16
H	1,957	19
I	2,212	16
J	1,115	29
K	2,068	18
L	1,663	19
M	2,216	18
N	1,432	25
O	1,987	18
P	1,580	26
Q	1,234	30
R	1,656	23
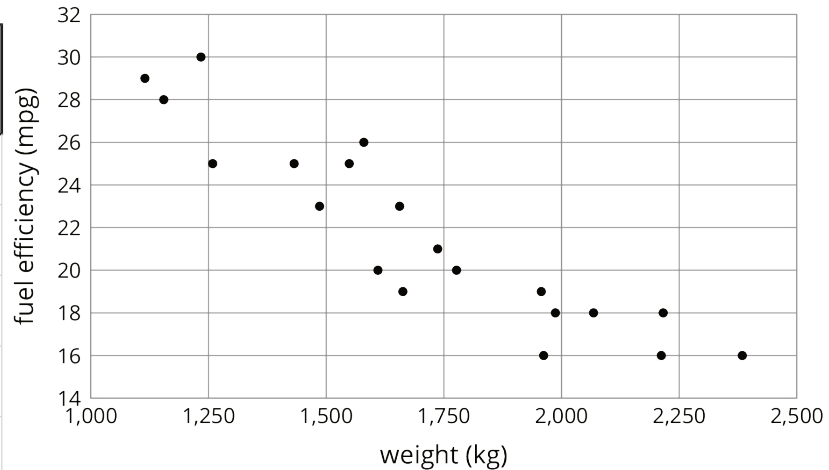
1. Which point in the scatter plot represents Car L's measurements?

2. What is the fuel efficiency of the car with the greatest weight?

3. What is the weight of the car with the greatest fuel efficiency?

4. Car S weighs 1,912 kilograms and gets 16 miles per gallon. On the scatter plot, plot a point that represents Car S's measurements.

5. Cars N and O, shown in the scatter plot, are made by the same company. Compare their weights and fuel efficiencies. Does anything surprise you about these cars?

6. A different company makes Cars F and G. Compare their weights and fuel efficiencies. Does anything surprise you about these cars?

3 Coat Sales

Student Task Statement

A clothing store keeps track of the average monthly temperature in degrees Celsius and coat sales in dollars.

temperature (degrees Celsius)	coat sales (dollars)
-5	1,550
-3	1,340
3	1,060
8	1,070
15	680
21	490
23	410
21	510
17	600
11	740
6	940
-2	1,390

1. What does the point $(15, 680)$ represent?

2. For the month with the lowest average temperature, estimate the total amount made from coat sales. Explain how you used the table to find this information.

3. For the month with the smallest coat sales, estimate the average monthly temperature. Explain how you used the scatter plot to find this information.

4. If there were a point at $(0, A)$ what would it represent? Use the scatter plot to estimate a value for A.

5. What would a point at $(B, 0)$ represent? Use the scatter plot to estimate a value for B.

6. Would it make sense to use this trend to estimate the value of sales when the average monthly temperature is 60 degrees Celsius? Explain your reasoning.