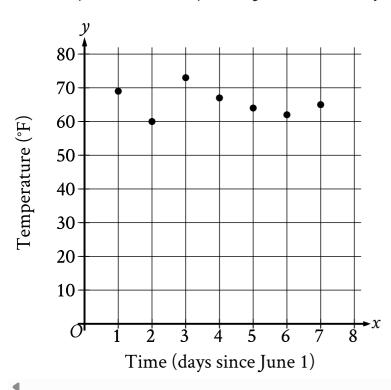
Question ID 134d64f1

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 134d64f1

The scatterplot shows the temperature y, in ${}^{\circ}\mathbf{F}$, recorded by a meteorologist at various times x, in days since June 1.



During which of the following time periods did the greatest increase in recorded temperature take place?

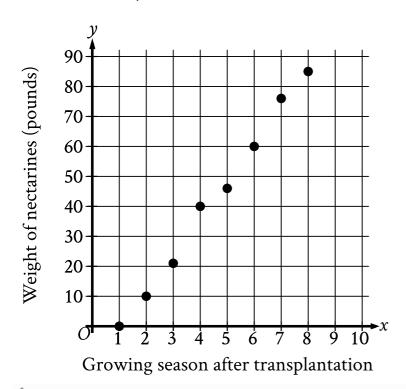
- A. From $oldsymbol{x}=oldsymbol{6}$ to $oldsymbol{x}=oldsymbol{7}$
- B. From x=5 to x=6
- C. From $oldsymbol{x}=\mathbf{2}$ to $oldsymbol{x}=\mathbf{3}$
- D. From $oldsymbol{x}=\mathbf{1}$ to $oldsymbol{x}=\mathbf{2}$

Question ID e5ac5f08

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: e5ac5f08

An orchard owner recorded the weight, in pounds, of all nectarines that grew on a dwarf nectarine tree during each growing season after the tree's transplantation. The scatterplot shows this weight, in pounds, for each growing season after the tree's transplantation.



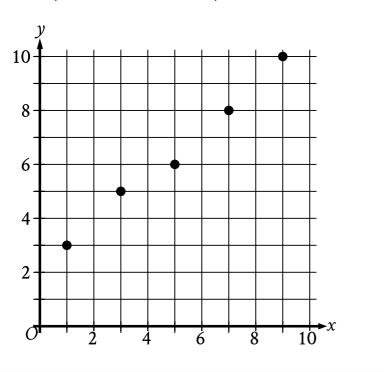
What was the weight, to the nearest pound, of all nectarines that grew on the tree during the 4th growing season after the tree's transplantation?

Question ID d729d5f8

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: d729d5f8

The scatterplot shows the relationship between two variables, $m{x}$ and $m{y}$.



Which equation is the most appropriate linear model for this relationship?

A.
$$y = -0.9x - 2.2$$

B.
$$y = -0.9x + 2.2$$

C.
$$y=-0.9x$$

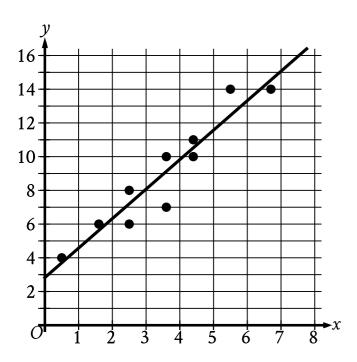
D.
$$y = 0.9x + 2.2$$

Question ID 1a5628d2

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 1a5628d2

The scatterplot shows the relationship between two variables, \boldsymbol{x} and \boldsymbol{y} . A line of best fit is also shown.



Which of the following equations best represents the line of best fit shown?

$$\mathrm{A.}\ y = 2.8 + 1.7x$$

B.
$$y = 2.8 - 1.7x$$

C.
$$y = -2.8 + 1.7x$$

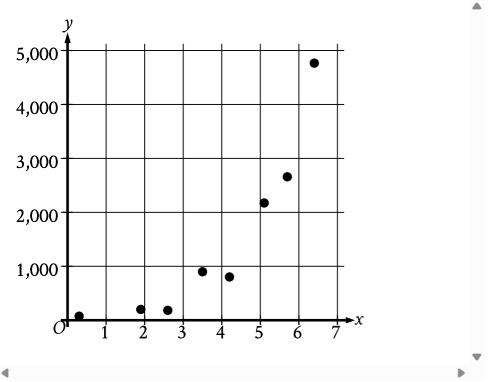
D.
$$y = -2.8 - 1.7x$$

Question ID 69a78012

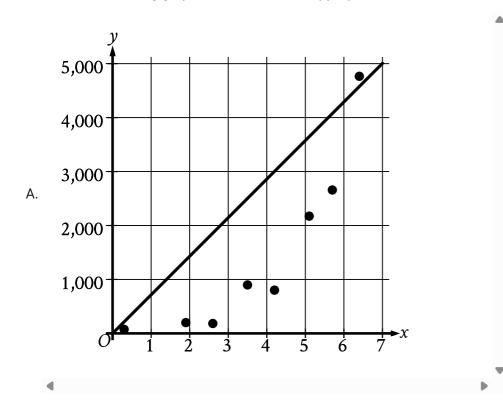
Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

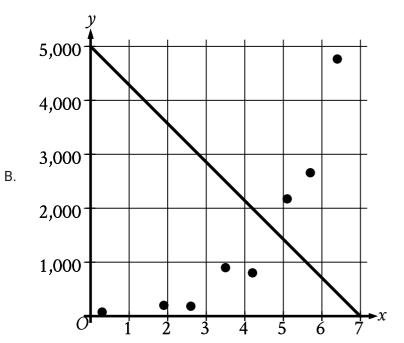
ID: 69a78012

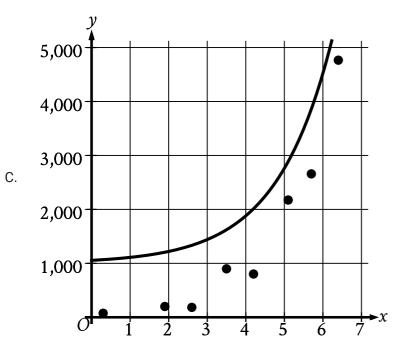
The scatterplot shows the relationship between two variables, $m{x}$ and $m{y}$.

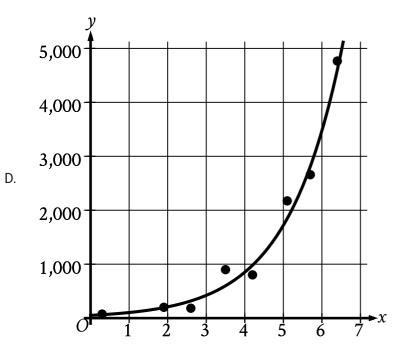


Which of the following graphs shows the most appropriate model for the data?





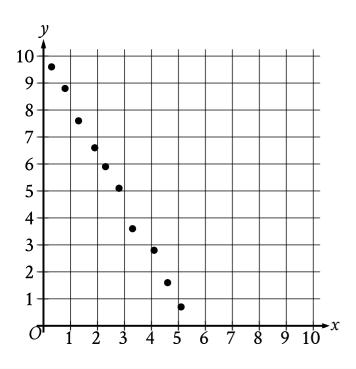




Question ID 969cc650

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 969cc650



Which of the following equations is the most appropriate linear model for the data shown in the scatterplot?

A.
$$y = -1.9x - 10.1$$

B.
$$y = -1.9x + 10.1$$

C.
$$y = 1.9x - 10.1$$

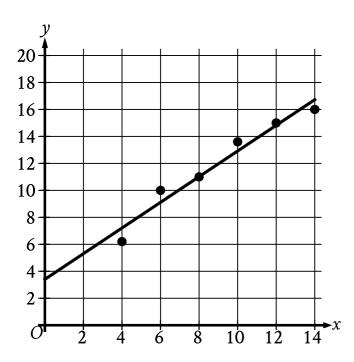
D.
$$y = 1.9x + 10.1$$

Question ID 4931db0c

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 4931db0c

The scatterplot shows the relationship between two variables, \boldsymbol{x} and \boldsymbol{y} . A line of best fit is also shown.



Which of the following equations best represents the line of best fit shown?

A.
$$y = x + 3.4$$

B.
$$y=x-3.4$$

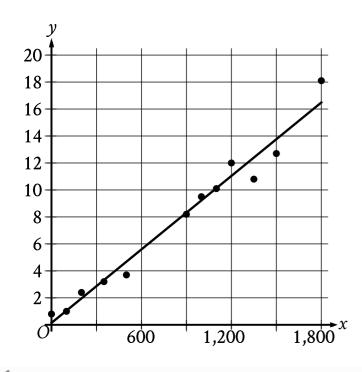
C.
$$y = -x + 3.4$$

D.
$$y = -x - 3.4$$

Question ID 9094c4ae

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 9094c4ae



Twelve data points are shown in the scatterplot. A line of best fit for the data is also shown. At x = 1,200, which of the following is closest to the *y*-value predicted by the line of best fit?

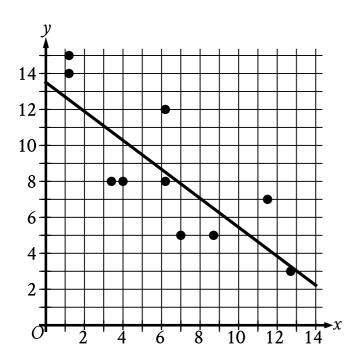
- A. **16**
- B. **14**
- C. 11
- D. **6**

Question ID bfffff75

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: bfffff75

The scatterplot shows the relationship between two variables, \boldsymbol{x} and \boldsymbol{y} . A line of best fit is also shown.



Which of the following equations best represents the line of best fit shown?

A.
$$y=13.5+0.8x$$

B.
$$y=13.5-0.8x$$

C.
$$y = -13.5 + 0.8x$$

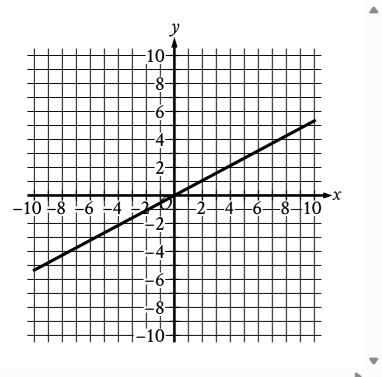
D.
$$y = -13.5 - 0.8x$$

Question ID 7cb5c4dd

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 7cb5c4dd

The graph of function f is shown, where y = f(x).



Which of the following describes function f?

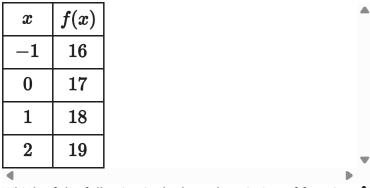
- A. Increasing linear
- B. Decreasing linear
- C. Increasing exponential
- D. Decreasing exponential

Question ID 53eb586e

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: 53eb586e

The table shows selected values from function \boldsymbol{f} .



Which of the following is the best description of function f?

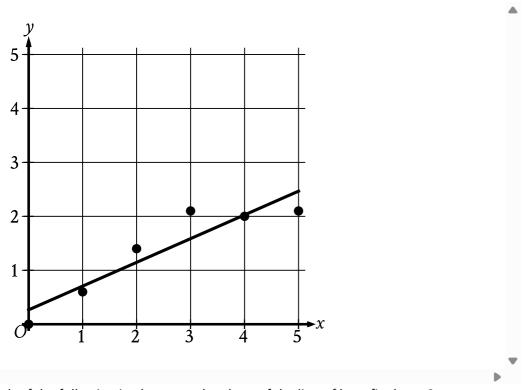
- A. Decreasing linear
- B. Increasing linear
- C. Decreasing exponential
- D. Increasing exponential

Question ID a8476372

Assessment	Test	Domain	Skill	Difficulty
PSAT 8/9	Math	Problem-Solving and Data Analysis	Two-variable data: Models and scatterplots	Medium

ID: a8476372

The scatterplot shows the relationship between $m{x}$ and $m{y}$. A line of best fit is also shown.



Which of the following is closest to the slope of the line of best fit shown?

- A. -2.27
- B. -0.44
- c. **0.44**
- D. 2.27