Question ID 57e4b0b9

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 57e4b0b9

A model estimates that whales from the genus *Eschrichtius* travel 72 to 77 miles in the ocean each day during their migration. Based on this model, which inequality represents the estimated total number of miles, x, a whale from the genus *Eschrichtius* could travel in 16 days of its migration?

A. $72 + 16 \leq x \leq 77 + 16$

B. $(72)(16) \leq x \leq (77)(16)$

C. $72 \leq 16 + x \leq 77$

D. $72 \leq 16x \leq 77$

Question ID c4fb1cb3

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: c4fb1cb3

A truck can haul a maximum weight of $5{,}630$ pounds. During one trip, the truck will be used to haul a 190-pound piece of equipment as well as several crates. Some of these crates weigh 25 pounds each and the others weigh 62 pounds each. Which inequality represents the possible combinations of the number of 25-pound crates, x, and the number of 62-pound crates, y, the truck can haul during one trip if only the piece of equipment and the crates are being hauled?

A. $25x + 62y \leq 5{,}440$

B. $25x + 62y \geq 5{,}440$

C. $62x + 25y \leq 5{,}630$

D. $62x + 25y \geq 5{,}630$

Question ID db8d42ba

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: db8d42ba

The minimum value of x is 12 less than 6 times another number n. Which inequality shows the possible values of x?

A. $x \leq 6n - 12$

B. $x \geq 6n - 12$

C. $x \leq 12 - 6n$

D. $x \geq 12 - 6n$

Question ID 6f8503f0

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 6f8503f0

A particular botanist classifies a species of plant as tall if its typical height when fully grown is more than 100 centimeters. Each of the following inequalities represents the possible heights h, in centimeters, for a specific plant species when fully grown. Which inequality represents the possible heights h, in centimeters, for a tall plant species?

A. $106 < h < 158$

B. $80 < h < 100$

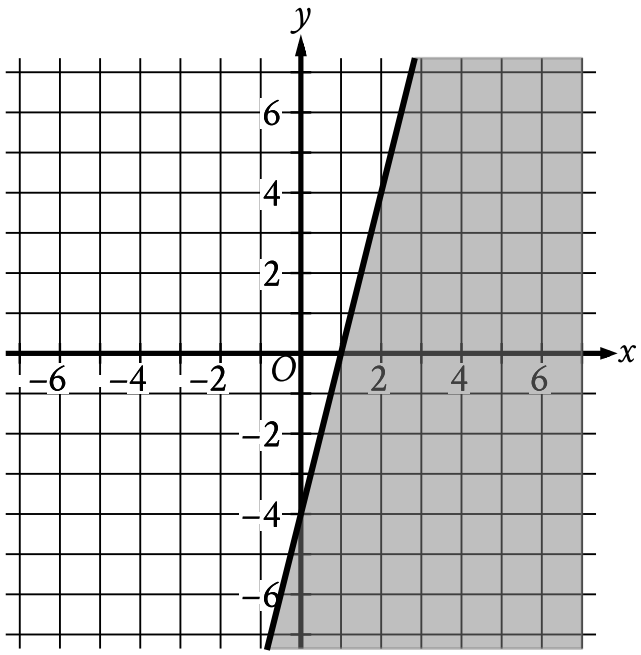
C. $42 < h < 87$

D. $17 < h < 85$

Question ID 698ab51d

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 698ab51d



The shaded region shown represents the solutions to an inequality. Which ordered pair (x, y) is a solution to this inequality?

A. $(-5, -6)$

B. $(-2, 5)$

C. $(1, 4)$

D. $(6, -2)$

Question ID bdd782e9

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: bdd782e9

$$y > 7x - 4$$

For which of the following tables are all the values of x and their corresponding values of y solutions to the given inequality?

A.

x	y
3	13
5	27
8	48

B.

x	y
3	17
5	31
8	52

C.

x	y
3	21
5	27
8	52

D.

x	y
3	21
5	35
8	56

Question ID 06836f64

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 06836f64

$$2x - y > 883$$

For which of the following tables are all the values of x and their corresponding values of y solutions to the given inequality?

A.

x	y
440	0
441	-2
442	-4

B.

x	y
440	0
442	-2
441	-4

C.

x	y
442	0
440	-2
441	-4

D.

x	y
442	0
441	-2
440	-4

Question ID da95cd89

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: da95cd89

For a snowstorm in a certain town, the minimum rate of snowfall recorded was 0.6 inches per hour, and the maximum rate of snowfall recorded was 1.8 inches per hour. Which inequality is true for all values of s, where s represents a rate of snowfall, in inches per hour, recorded for this snowstorm?

A. $s \geq 2.4$

B. $s \geq 1.8$

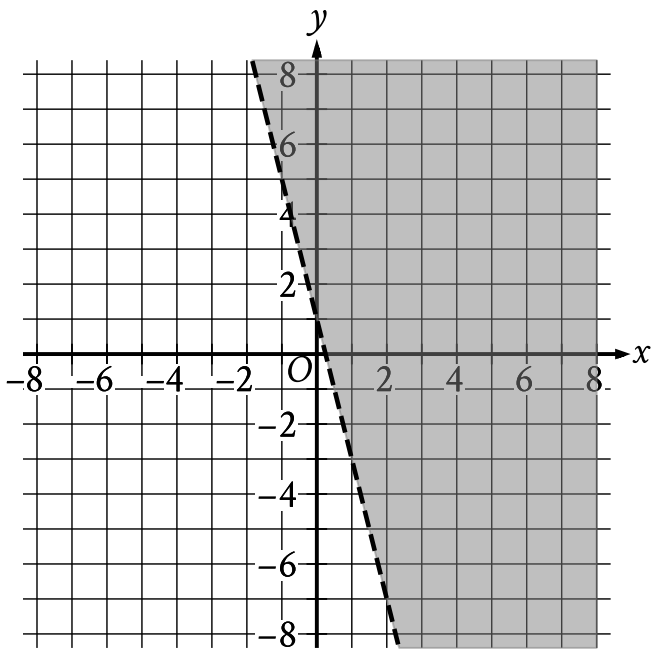
C. $0 \leq s \leq 0.6$

D. $0.6 \leq s \leq 1.8$

Question ID 36de4720

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 36de4720



The shaded region shown represents the solutions to which inequality?

A. $y < 1 + 4x$

B. $y < 1 - 4x$

C. $y > 1 + 4x$

D. $y > 1 - 4x$

Question ID be2f9734

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: be2f9734

A number x is at most 17 less than 5 times the value of y. If the value of y is 3, what is the greatest possible value of x?

Question ID d40f805f

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: d40f805f

$$y < x$$
$$x < 22$$

For which of the following tables are all the values of x and their corresponding values of y solutions to the given system of inequalities?

A.

x	y
19	18
20	19
21	20

B.

x	y
19	20
20	21
21	22

C.

x	y
23	22
24	23
25	24

D.

x	y
23	24
24	25
25	26

Question ID 5987c039

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 5987c039

A moving truck can tow a trailer if the combined weight of the trailer and the boxes it contains is no more than $4{,}600$ pounds. What is the maximum number of boxes this truck can tow in a trailer with a weight of 500 pounds if each box weighs 120 pounds?

A. 34

B. 35

C. 38

D. 39

Question ID ee7444eb

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: ee7444eb

A city employee will plant two types of bushes, azaleas and boxwoods, in a park. There will be no more than 164 total bushes planted, and the number of azaleas planted will be at most three times the number of boxwoods planted. Which of the following systems of inequalities best represents this situation, where a is the number of azaleas that will be planted, and b is the number of boxwoods that will be planted?

A. $a + b \geq 164$
$3a \geq b$

B. $a + b \geq 164$
$a \leq 3b$

C. $a + b \leq 164$
$3a \geq b$

D. $a + b \leq 164$
$a \leq 3b$

Question ID c38b4d1e

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: c38b4d1e

$$y < -4x + 4$$

Which point (x, y) is a solution to the given inequality in the xy-plane?

A. $(-4, 0)$

B. $(0, 5)$

C. $(2, 1)$

D. $(2, -1)$

Question ID 14e393be

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 14e393be

The length of a rectangle is 50 inches and the width is x inches. The perimeter is at most 210 inches. Which inequality represents this situation?

A. $2x + 100 \leq 210$

B. $2x + 100 \geq 210$

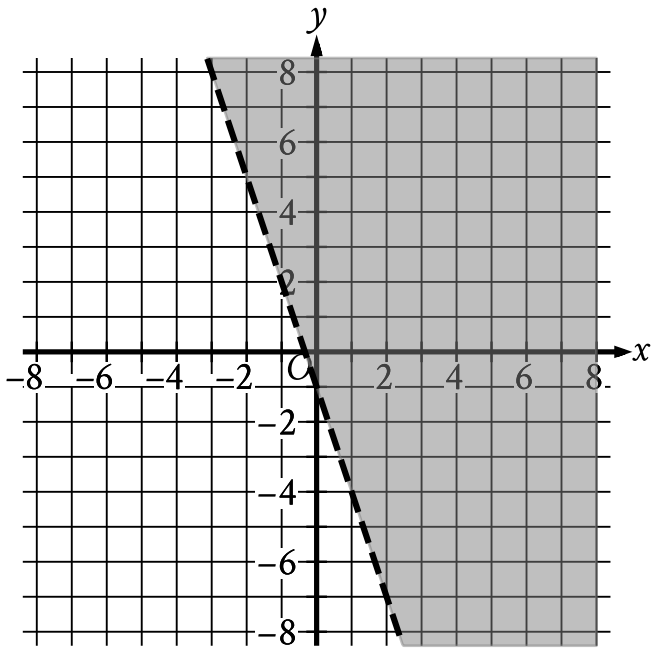
C. $2x + 50 \leq 210$

D. $2x + 50 \geq 210$

Question ID 5f970630

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 5f970630



The shaded region shown represents the solutions to which inequality?

A. $y < -1 + 3x$

B. $y < -1 - 3x$

C. $y > -1 + 3x$

D. $y > -1 - 3x$

Question ID 593a32d0

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 593a32d0

An event planner is planning a party. It costs the event planner a onetime fee of $35 to rent the venue and $10.25 per attendee. The event planner has a budget of $300. What is the greatest number of attendees possible without exceeding the budget?

Question ID 183fe2a0

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: 183fe2a0

$$y > 4x + 8$$

For which of the following tables are all the values of x and their corresponding values of y solutions to the given inequality?

A.

x	y
2	19
4	30
6	41

B.

x	y
2	8
4	16
6	24

C.

x	y
2	13
4	18
6	23

D.

x	y
2	13
4	21
6	29

Question ID a2862133

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: a2862133

An event planner is planning a party. It costs the event planner a onetime fee of $35 to rent the venue and $10.25 per attendee. The event planner has a budget of $200. What is the greatest number of attendees possible without exceeding the budget?

Question ID b7677c20

Assessment	Test	Domain	Skill	Difficulty
SAT	Math	Algebra	Linear inequalities in one or two variables	Medium

ID: b7677c20

$$y > 14$$
$$4x + y < 18$$

The point $(x, 53)$ is a solution to the system of inequalities in the *xy*-plane. Which of the following could be the value of x?

A. -9

B. -5

C. 5

D. 9