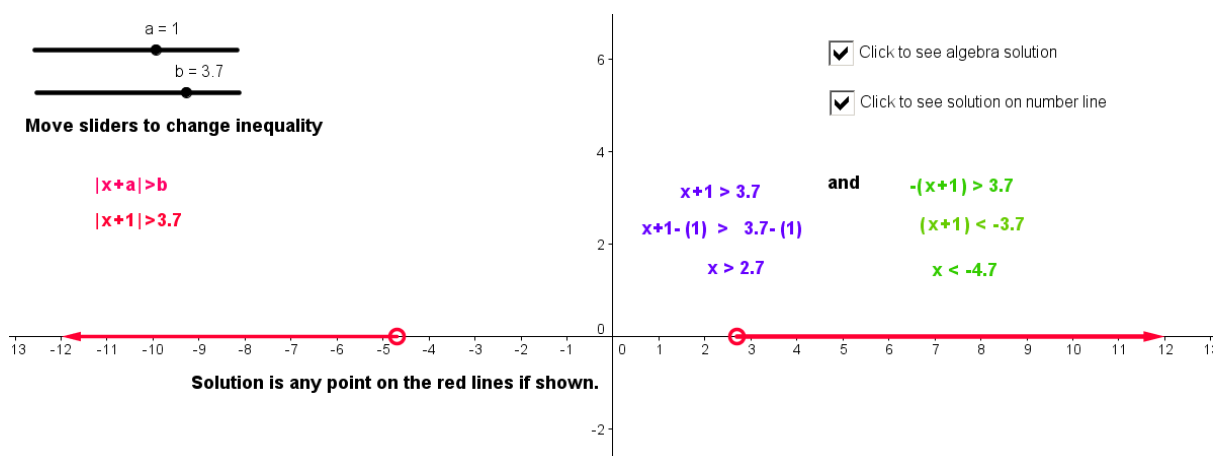


Student Activity: To investigate $|x-a| > b$

Use in connection with the interactive file, 'Absolute Value Greater than', on the student's CD.

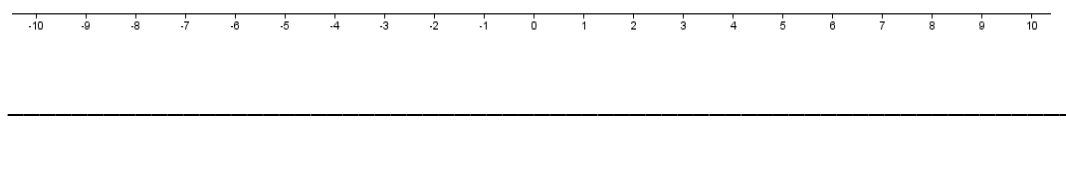


1.

- a. Given $|x-2| > 5$, $x \in \mathbb{R}$, write this as 2 possible inequalities.

- b. Solve these inequalities.

- c. Show the solution which satisfies $|x-2| > 5$ on the number line. Use different coloured pens and explain what each colour means.



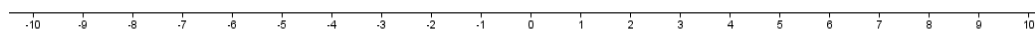
- d. Check your results using the interactive file.

2.

- a. Given $|x+3| > 4$, $x \in \mathbb{R}$, write this as 2 possible inequalities.

b. Solve these inequalities.

c. Show the solution which satisfies $|x+3| > 4$ on the above number line. Use different coloured pens and explain what each colour means.



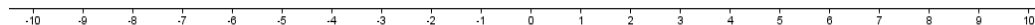
d. Check your results using the interactive file.

3.

a. Given $|x - 1.5| > 0$, $x \in \mathbb{R}$, write this as 2 possible inequalities.

b. Solve these inequalities.

c. Show the solution which satisfies $|x - 1.5| > 0$ on the above number line. Use different coloured pens and explain what each colour means.



d. Check your results using the interactive file.