



Rational Function Inequalities - Two Factors with Multiplicity over Binomial - Sign Change at a Point

1

Does the sign of this rational function change at $x = 3$?

$$\frac{(x - 2)^3(x - 3)^4}{x + 2}$$

$$x + 2$$

A

Yes

B

No

Does the sign of this rational function change at $x = 2$?

$$\frac{(x - 1)(x - 2)^2}{x + 3}$$

$$x + 3$$

A

No

B

Yes

3

Does the sign of this rational function change at $x = -2$?

$$\frac{(x - 1)(x - 2)^4}{x + 3}$$

$$x + 3$$

A

No

B

Yes

4

Does the sign of this rational function change at $x = 3$?

$$\frac{(x + 1)^4(x - 3)^5}{x}$$

$$x$$

A

Yes

B

No

5

Does the sign of this rational function change at $x = 1$?

$$\frac{(x + 3)^3x^2}{x + 4}$$

$$x + 4$$

A

No

B

Yes

6

Does the sign of this rational function change at $x = 2$?

$$\frac{(x + 2)^2(x - 2)^3}{x - 4}$$

$$x - 4$$

A

No

B

Yes

7

Does the sign of this rational function change at $x = -3$?

$$\frac{(x + 2)(x + 1)^2}{x + 3}$$

$$x + 3$$

A

No

B

Yes

8

Does the sign of this rational function change at $x = 0$?

$$\frac{(x + 3)(x - 2)^2}{x + 1}$$

$$x + 1$$

A

Yes

B

No