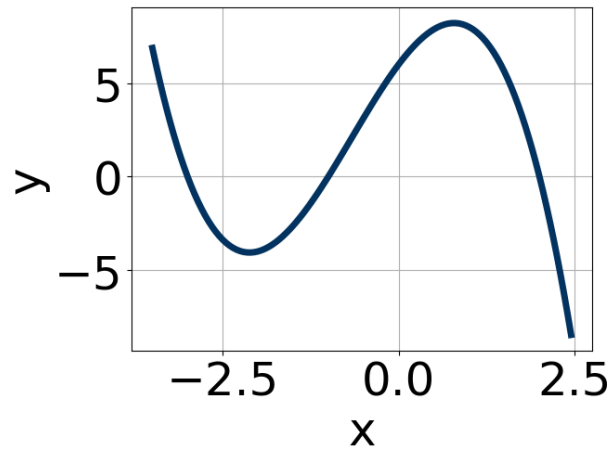


1. Describe the zero behavior of the zero $x = 7$ of the polynomial below.

$$f(x) = 7(x + 2)^{12}(x - 2)^8(x + 7)^{12}(x - 7)^9$$

2. Write an equation that *could* represent the graph below.



3. Construct the lowest-degree polynomial given the zeros below.

$$-4, \frac{-2}{5}, \text{ and } \frac{-5}{3}$$

4. Describe the zero behavior of the zero $x = -3$ of the polynomial below.

$$f(x) = -3(x - 2)^7(x + 2)^6(x + 3)^7(x - 3)^4$$

5. Construct the lowest-degree polynomial given the zeros below.

$$\frac{4}{3}, \frac{-7}{2}, \text{ and } \frac{6}{5}$$

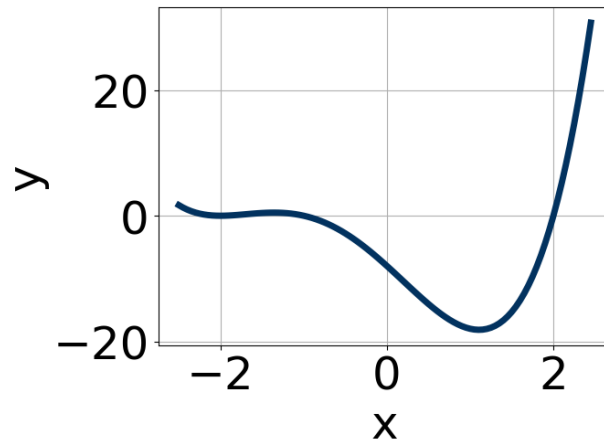
6. Describe the end behavior of the polynomial below.

$$f(x) = -3(x - 2)^3(x + 2)^4(x + 8)^5(x - 8)^5$$

7. Construct the lowest-degree polynomial given the zeros below.

$$5 - 3i \text{ and } -1$$

8. Write an equation that *could* represent the graph below.



9. Construct the lowest-degree polynomial given the zeros below.

$$-5 + 3i \text{ and } -2$$

10. Describe the end behavior of the polynomial below.

$$f(x) = 5(x + 8)^5(x - 8)^{10}(x + 3)^5(x - 3)^5$$