

10-28-16

SWBAT - understand + apply rules of end behavior

What makes you awesome?

I can move my ears

Even degree

$x \rightarrow -\infty, f(x) \rightarrow \infty$ } Positive

$x \rightarrow \infty, f(x) \rightarrow \infty$ }

$x \rightarrow -\infty, f(x) \rightarrow -\infty$ } negative

$x \rightarrow \infty, f(x) \rightarrow -\infty$ }

* even degree =
ends go the same
direction $\uparrow\uparrow$ $\downarrow\downarrow$

Odd Degree

- $x \rightarrow -\infty, f(x) \rightarrow -\infty$
- $x \rightarrow \infty, f(x) \rightarrow \infty$ } Positive
- $x \rightarrow -\infty, f(x) \rightarrow \infty$ } Negative
- $x \rightarrow \infty, f(x) \rightarrow -\infty$ }

* odd degree = ends go in opposite directions $\uparrow \downarrow$

1. Odd degree; 1 positive
 $x \rightarrow -\infty, f(x) \rightarrow -\infty$
 ∞, ∞

2. even degree; 4 positive
 $x \rightarrow -\infty, f(x) \rightarrow \infty$
 ∞, ∞

3. No degree

4. odd degree; 3 positive
 $x \rightarrow -\infty, f(x) \rightarrow \infty$
 ∞, ∞

5. Odd degree; 3 negative
 $-\infty, \infty$
 $\infty, -\infty$

6. No degree

7. even degree; -2 negative
 $x \rightarrow -\infty, f(x) \rightarrow -\infty$
 $\infty, -\infty$

8. No degree

9. odd degree; 3 positive
 $-\infty, -\infty$
 ∞, ∞