

Cornell Note

## **Polynomial Function Graphing**

## Today's Standard

HSF.IF.C7c - Graph polynomial functions, identifying zeros when suitable factorizations are available, and showing end behavior.

Cues	Notes
What is a polynomial function?	A polynomial function is a mathematical expression involving a sum of powers in one or more variables multiplied by coefficients.
How do you identify zeros?	
	Zeros of a polynomial are the values of x for which the polynomial equals
What is end behavior?	zero.
What are multiple roots?	End behavior refers to the direction the graph heads as x approaches positive or negative infinity.
How does the leading	Multiple reate accuration a polynomial touches but does not every the
coefficient affect the graph?	x-axis at a zero.
	The leading coefficient affects the width and direction (upward or
	downward) of the graph.

## Summary

Polynomial functions are expressions that can be graphed to show their zeros and end behavior. Understanding how to factorize and identify zeros, as well as how the leading coefficient affects the graph, is crucial for mastering this standard.