Grade 12
Distance Learning Module 8: Week of: May 26th – May 29th

Introduction to Calculus - *Modified from [Unit D - Using Calculus to Sketch Curves](#)*

Targeted Goals from Stage 1: Desired Results

Content Knowledge: Curve Sketching and the Derivative Tests

Vocabulary: Critical values, Inflection Points, Concave Up and Concave Down, 1st and 2nd Derivative Tests

Skills: Using the 2nd Derivative test and the Number Line test to sketch and label a curve.

Expectation:

Description of Task (s):	Resources and Materials:	Daily Checks (Return to Google Classroom or snapshots from a cell phone)
Monday:	**Memorial Day**	**No School**
Tuesday: Using the 2nd Derivative Test to find Extrema.	Khan Academy Video - Extrema and 2nd Derivative Test *Khan Academy- Second derivative test*	Khan Academy Practice -2nd Derivative Test
Wednesday: Curve Sketching.	Khan Academy Video - Curve Sketching *Khan Academy - Curve sketching with calculus: polynomial*	Khan Academy Quiz - Curve Sketching
Thursday: Justification for the 1st Derivative.	Khan Academy Video - Justification for the 1st Derivative	Khan Academy Practice - Justification for the 1st Derivative
Friday: Justification for the 2nd Derivative	Khan Academy Video - Justification for the 2nd Derivative *Khan Academy - Justification using second derivative: inflection point*	Khan Academy Practice - Justification for the 2nd Derivative

Week criteria for success (attach student checklists or rubrics):

Students should be able to use the1st and 2nd Derivative Tests to sketch a curve. Students should be able to use the two tests along with to label the extrema and intervals of concavity.

Supportive resources and tutorials for the week (plans for re-teaching): Google Classroom notes, Khan Academy, worksheets, office hours