Grade 10-11
Distance Learning Module 8: Week of: May $26^{\text {th }}-$ May $29^{\text {th }}$

## Pre-Calculus Honors - Modified from Unit F - Topics in Analytic Geometry

## Targeted Goals from Stage 1: Desired Results

Content Knowledge: Derive the equation of a parabola given a focus and directrix.
Vocabulary: Parabola, Focus, Directrix
Skills: determining the distance between a point and a line, analyzing the equations for the conic sections, and determining equations of the conic sections

Expectation:

| Description of Task (s): | Resources and Materials: | Daily Checks <br> (Return to Google Classroom or snapshots <br> from a cell phone) |
| :--- | :--- | :--- |
| Monday: | Memorial Day | No School |
| Tuesday: Parabolas | Khan Academy video: Intro to Conic Sections <br> Khan Academy video: Equation of a parabola <br> from focus \& directrix | Khan Academy practice: Equation of a <br> parabola from focus \& directrix |
| Wednesday: Check-in | Optional drop-in class 9:00-11:00 | Read section 10.2 |
| Thursday: Parabolas | Khan Academy video: Focus \& directrix of <br> parabola from equation <br> Khan Academy : Parabola focus \& directrix <br> review | Textbook p. 740, \#5-29 eoo, 15,19,23,27 |
| Friday: Check-in | Virtual Class | Review concepts and homework. |

Week criteria for success (attach student checklists or rubrics): Students will be able to determine the elements of a parabola from its equation and write the equation of a parabola from its characteristics.

Supportive resources and tutorials for the week (plans for re-teaching): Khan Academy, Precalculus with Limits by Larson and Hostetler, virtual class meetings

