

Grade 10,11

Distance Learning Module 10: Week of: June 8<sup>th</sup> – June 12<sup>th</sup>

## Precalculus Honors - Modified from [Unit F - Topics in Analytic Geometry](#)

### Targeted Goals from Stage 1: Desired Results

**Content Knowledge:** The conic sections are all described by a loci of points satisfying a geometric property

**Vocabulary:** Focus, Directrix, Ellipse, Vertices, Major Axis, Minor Axis, Eccentricity, Hyperbola, Transverse Axis, Asymptotes

**Skills:**

- analyzing the equations for the conic sections
- determining equations for the conic sections

**Expectation:**

Description of Task (s):	Resources and Materials:	Daily Checks (Return to Google Classroom or snapshots from a cell phone)
Monday: Hyperbolas	Khan Academy video: Intro to hyperbolas  Khan Academy video: Vertices & direction of a hyperbola  Khan Academy video: Vertices & direction of a hyperbola (example 2)	Khan Academy practice: Vertices & direction of a hyperbola
Tuesday: Check-in	Virtual class meeting	Review concepts and answer questions
Wednesday: Hyperbolas	Khan Academy video: Graphing hyperbolas  Khan Academy video: Foci of a hyperbola from equation  Khan Academy video: Proof of the hyperbola	Khan Academy practice: Foci of a hyperbola from equation  Khan Academy practice: Equation of a hyperbola from features

Description of Task (s):	Resources and Materials:	Daily Checks (Return to Google Classroom or snapshots from a cell phone)
	foci formula	
Thursday: Hyperbolas	Khan Academy video: Hyperbolas not centered at the origin	Khan Academy : Quiz 3 Textbook p. 760, #1-37 eoo
Friday: Check-in	Virtual Class meeting	Review concepts and answer questions

**Week criteria for success** (attach student checklists or rubrics): Students will be able to determine the elements of an ellipse or hyperbola from its equation and write the equation of an ellipse or hyperbola 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