

Central Forces Conic Sections

In the Maple worksheet, *conics.mw* (or Mathematica worksheet, *conics.nb*), you will examine a three parameter family of curves described by the polar equation

$$r(\phi) = \frac{\alpha}{1 + \epsilon \cos(\phi + \delta)}.$$

Describe in detail how the shape of the plot depends on the parameters α , ϵ , and δ .

What is one thing that you would like to remember from this activity?