

PPV1

Rewrite Rec \rightarrow Parametric

1. Line through (a, b)
& slope = m
2. circle: center $(0, 0)$
Radius = R
3. circle: center (a, b)
Radius = R
4. Ellipse: $\left(\frac{x}{a}\right)^2 + \left(\frac{y}{b}\right)^2 = 1$

1. Line $C(t) = (a + t, b + mt)$

2. circle center $(0, 0)$
 $C(t) = (R \cos \theta, R \sin \theta)$

3. circle center (a, b)
 $C(t) = (a + R \cos \theta, b + R \sin \theta)$

4. ellipse $C(t) = (a \cos \theta, b \sin \theta)$

PPV2

How do you rewrite
a non-special
Rectangular equation
in parametric?

Ex $3x + 2y^2 = 5$
 $3x = 5 - 2y^2$
 $x = \frac{5}{3} - \frac{2}{3}y^2$

• Solve for the
easier variable

$$C(t) = \left(\frac{5}{3} - \frac{2}{3}t^2, t \right)$$

what you solved
for in terms
of t .

other variable
just becomes t .