1. Sketch the graph. Be sure to include key features.

a.
$$f(x) = 3x^2 - 21x + 36$$

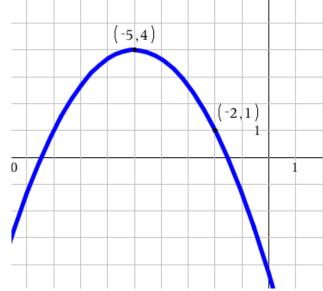
b.
$$f(x) = -3\left(x - \frac{1}{2}\right)^2 + \frac{27}{4}$$

c.
$$f(x) = \frac{1}{2}(x-1)^2 - 4$$

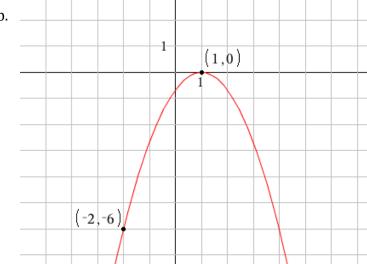
d.
$$f(x)=2x^2+6x+4$$

2. Write the equation of each parabola.





b.



c. x - intercepts at (-2, 0) and (5, 0), and a y-intercept of (0, -40).