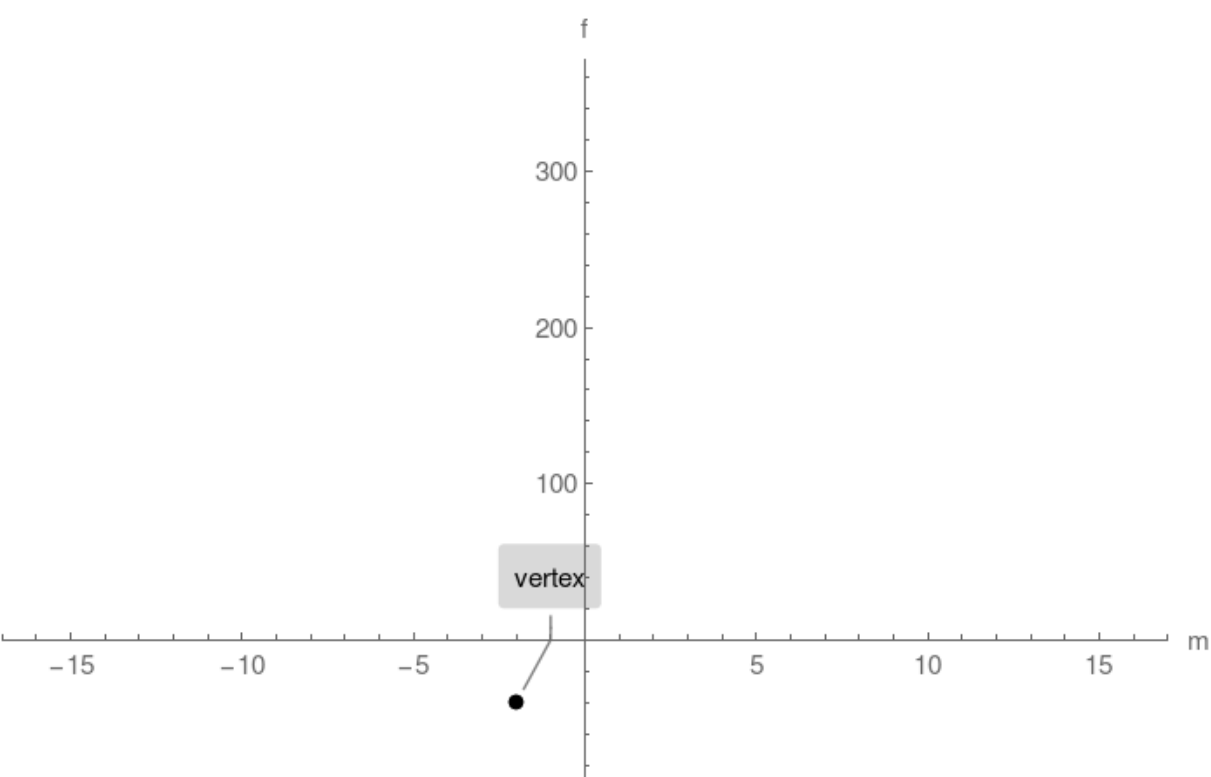# Example 1. 2 horizontal intercepts found

Plot $f(m) = m^2 + 4m - 36$

Step 1.
Compute vertex and plot single point:
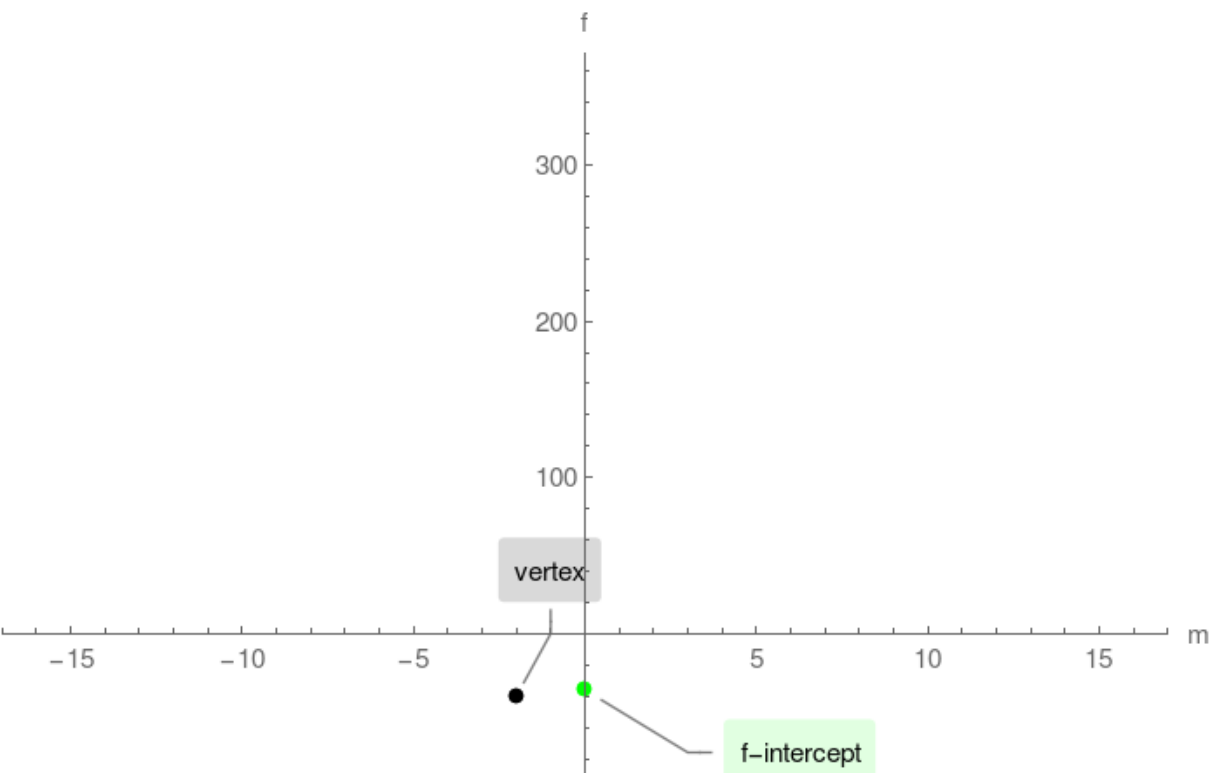vertex = $(-2, -40)$

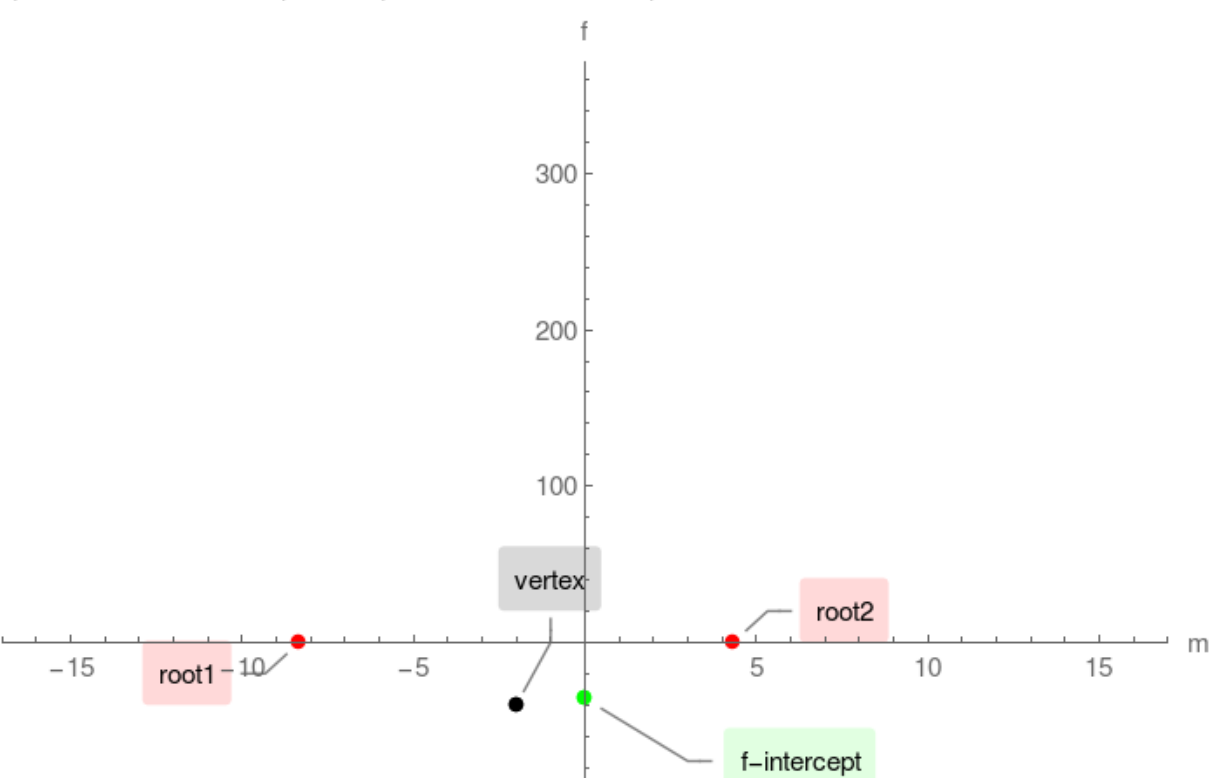**Step 2.**
Compute f-intercept and plot single point:
f-intercept = $(0, -36)$

Step 3.
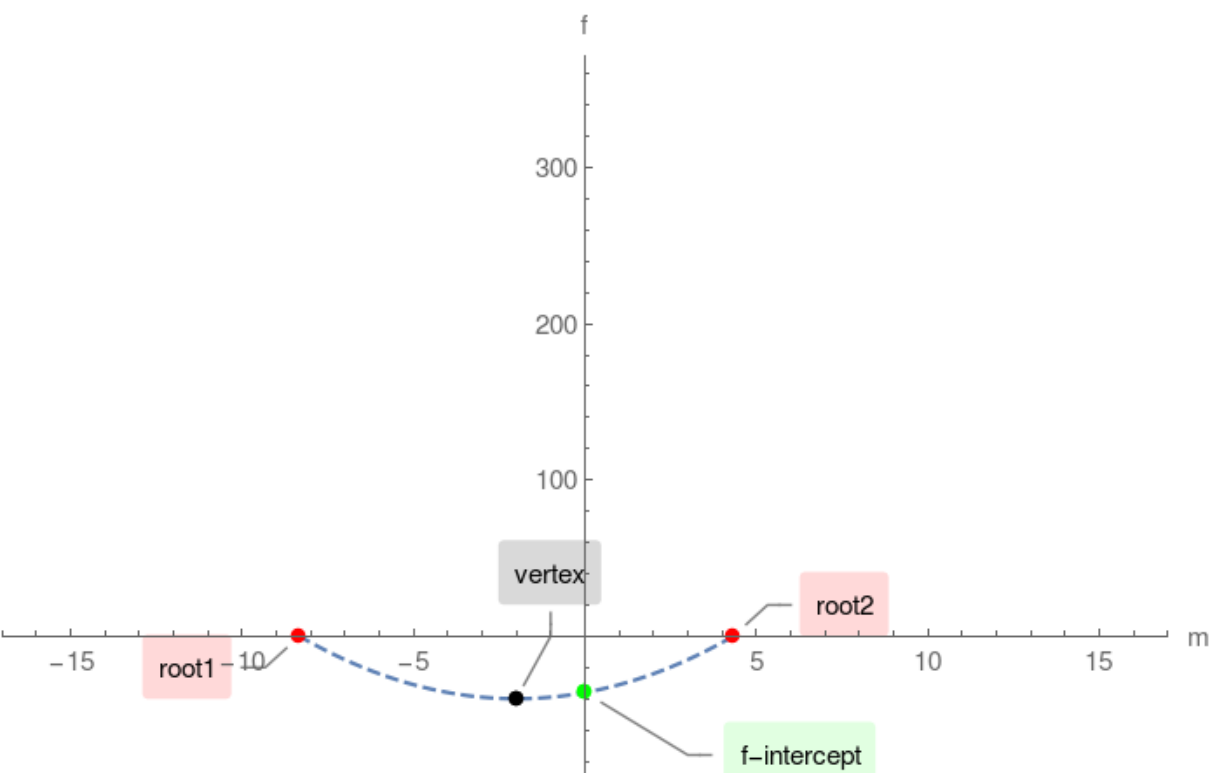Compute m-intercepts by solving $m^2 + 4m - 36 = 0$:
$(-2 - 2\sqrt{10}, 0)$, $(-2 + 2\sqrt{10}, 0)$

Step 4.
connect the above computed points:

Step 5.
Extend the parabola beyond the range of intercepts