

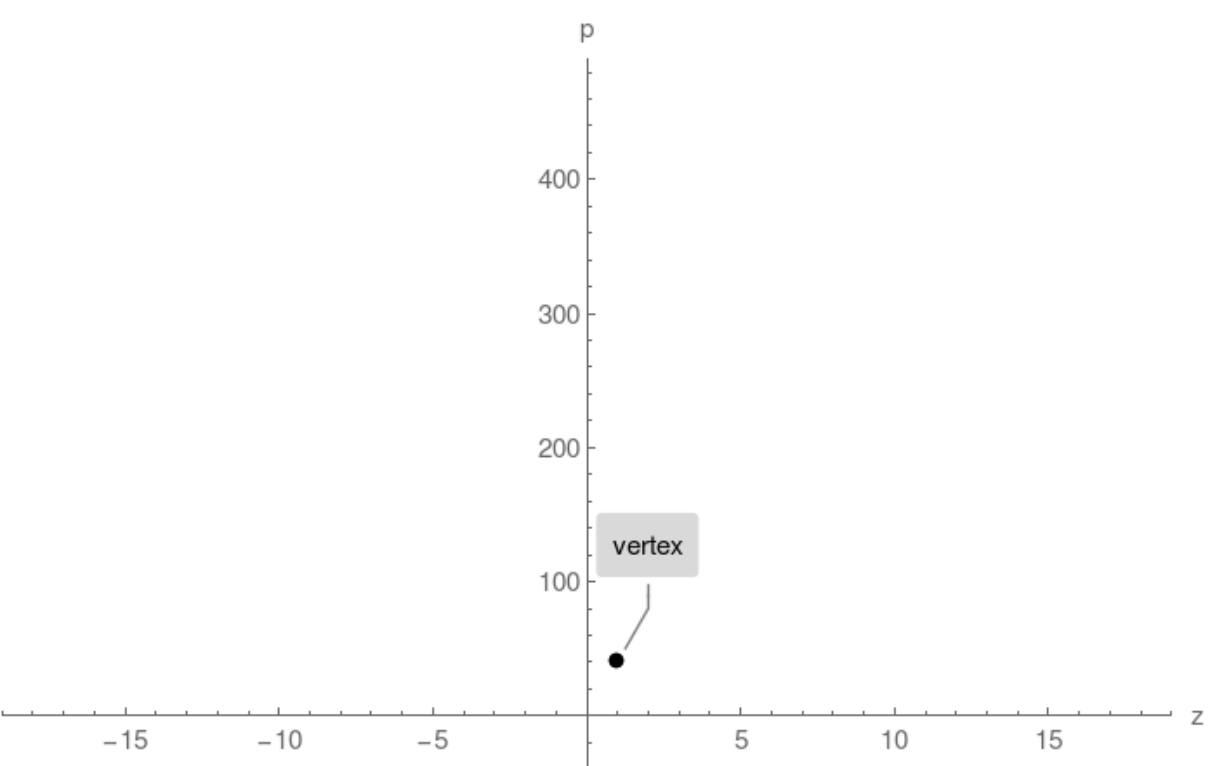
Example 2. No horizontal intercepts found

Plot $p(z) = z^2 - 2z + 41$

Step 1.

Compute vertex and plot single point:

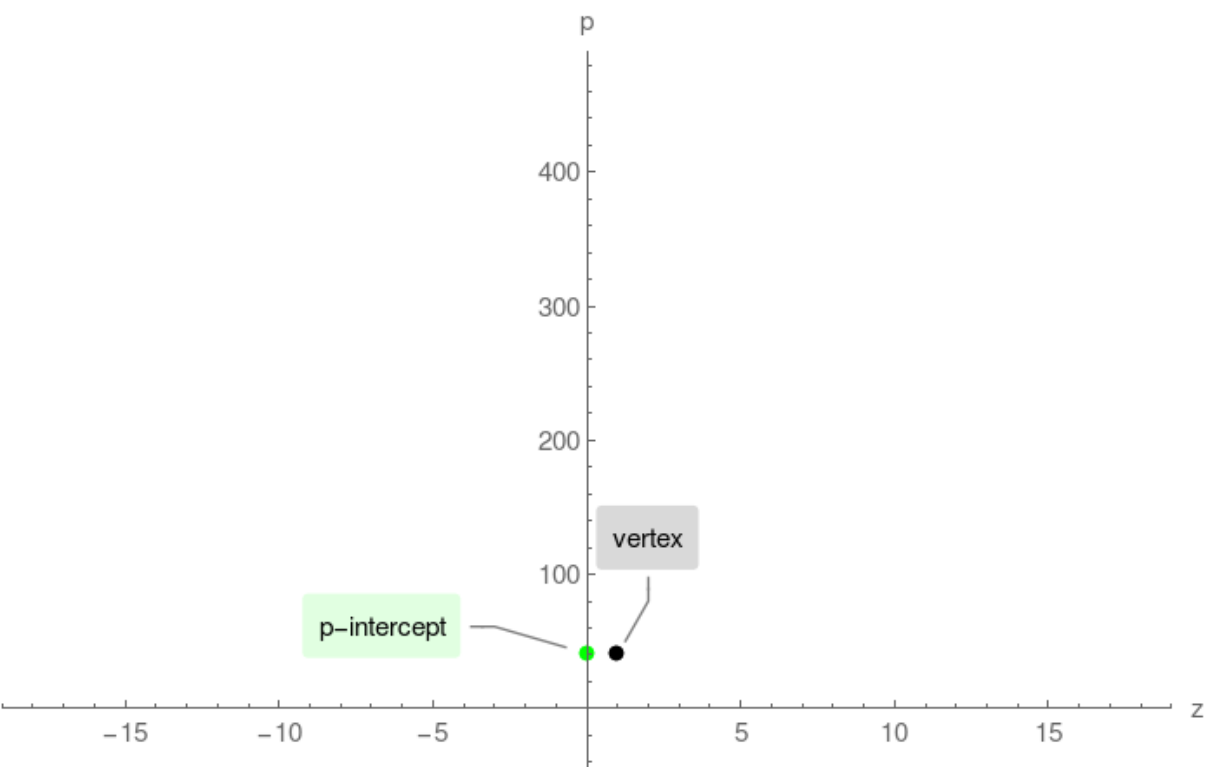
vertex = (1, 40)



Step 2.

Compute p-intercept and plot single point:

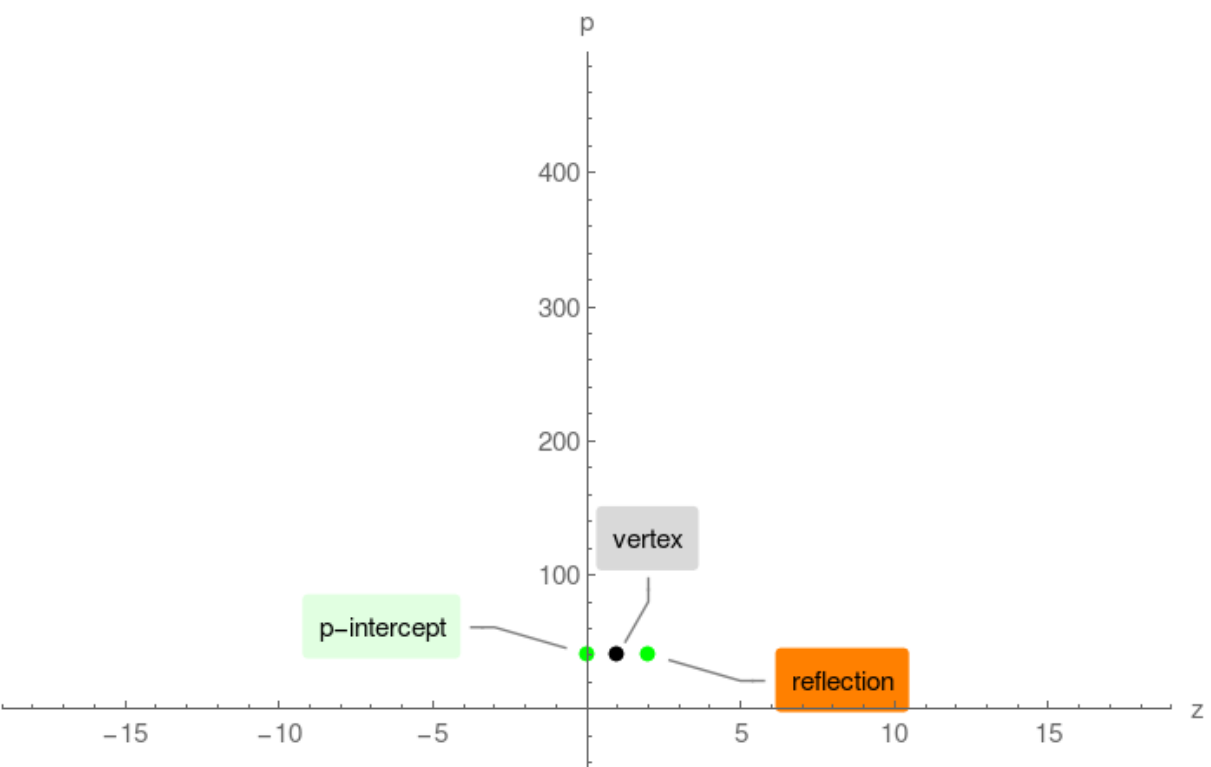
p-intercept = (0, 41)



Step 3.

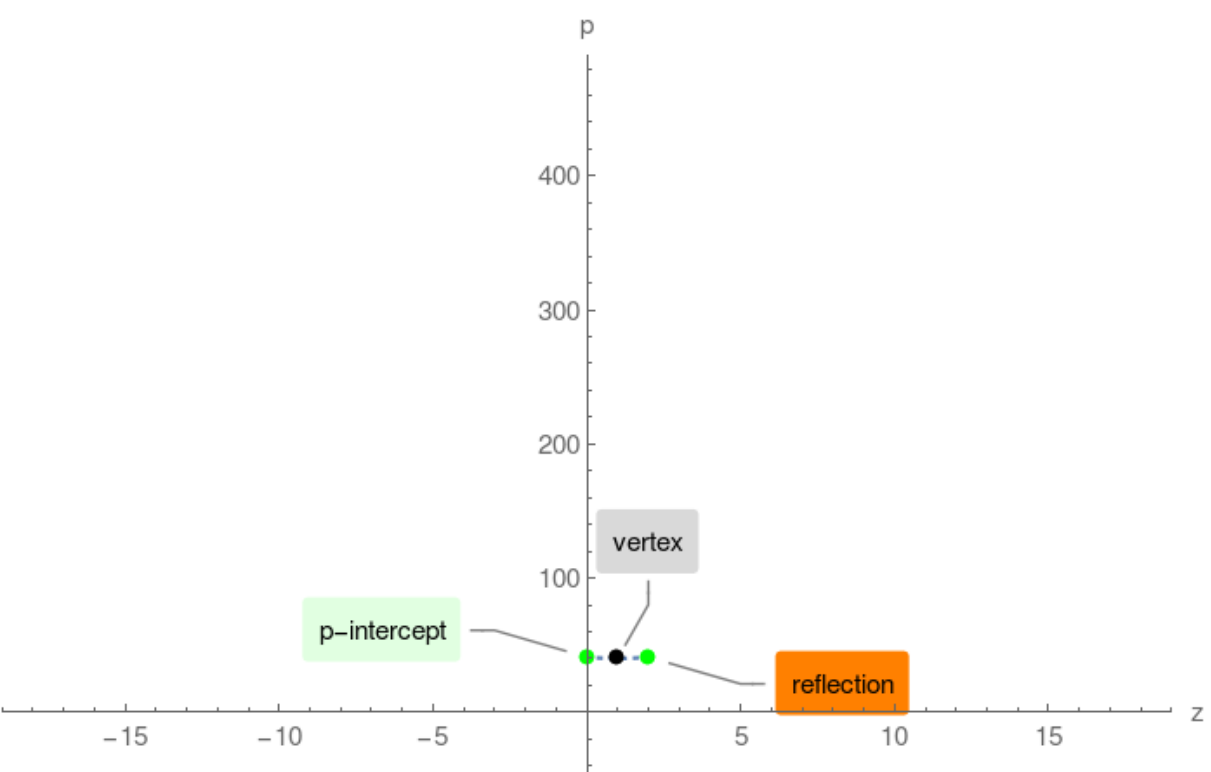
Compute p-intercept reflected against vertex,

reflection = (2, 41)



Step 4.

connect the above computed points:



Step 5.

Extend the parabola beyond the range of intercepts

