MATH 101
Fall 2021
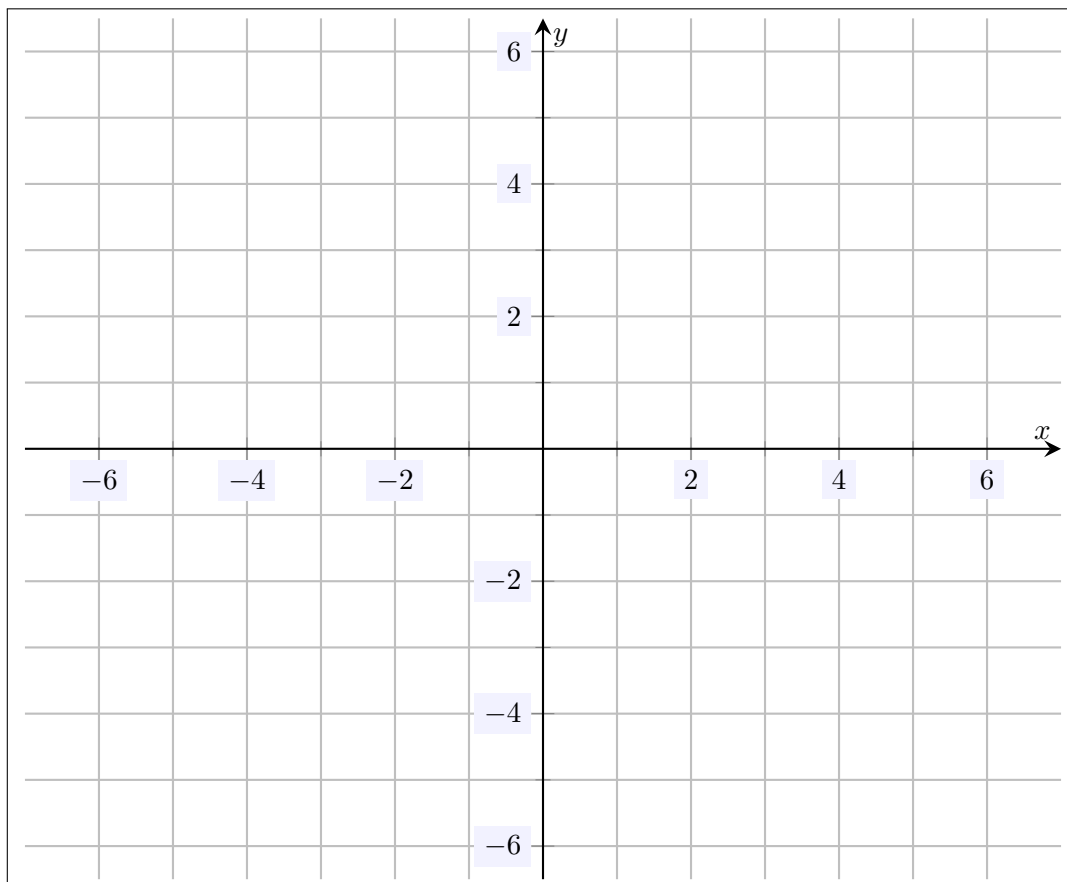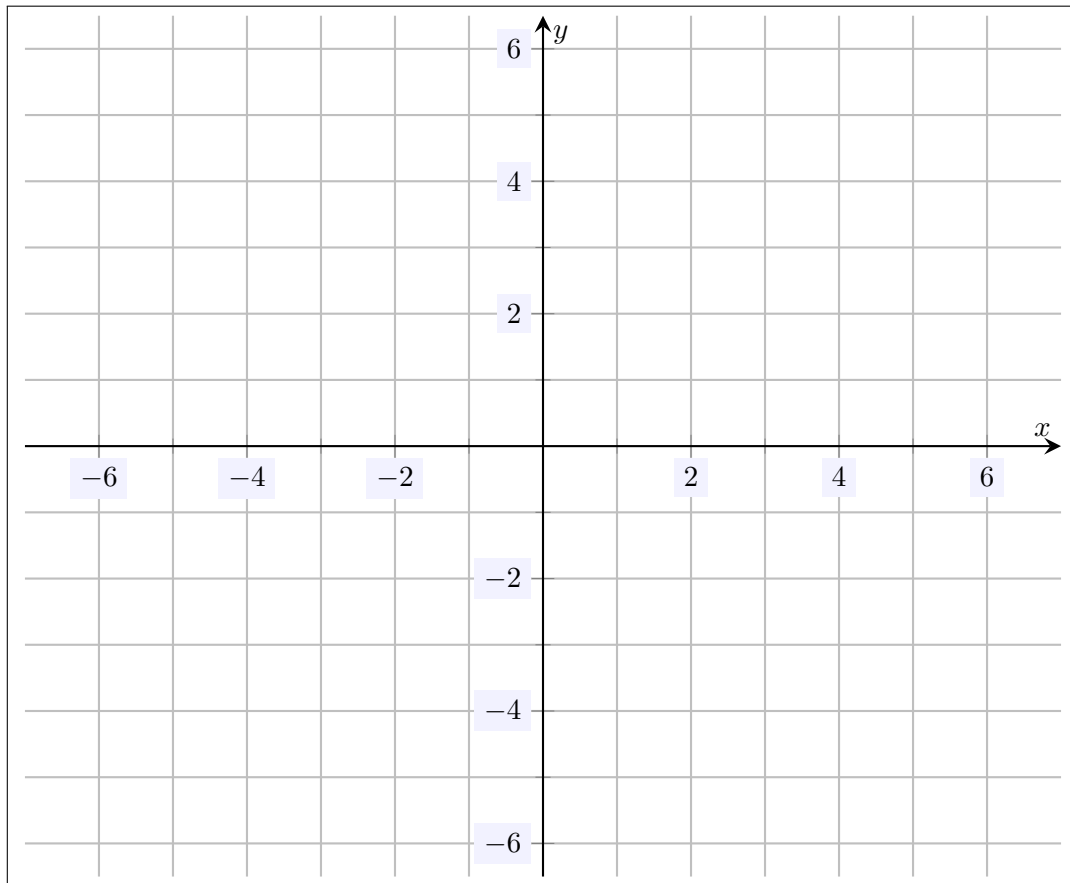**HW 8: Due 10/29**

"The world is a stage, but the play is badly cast."
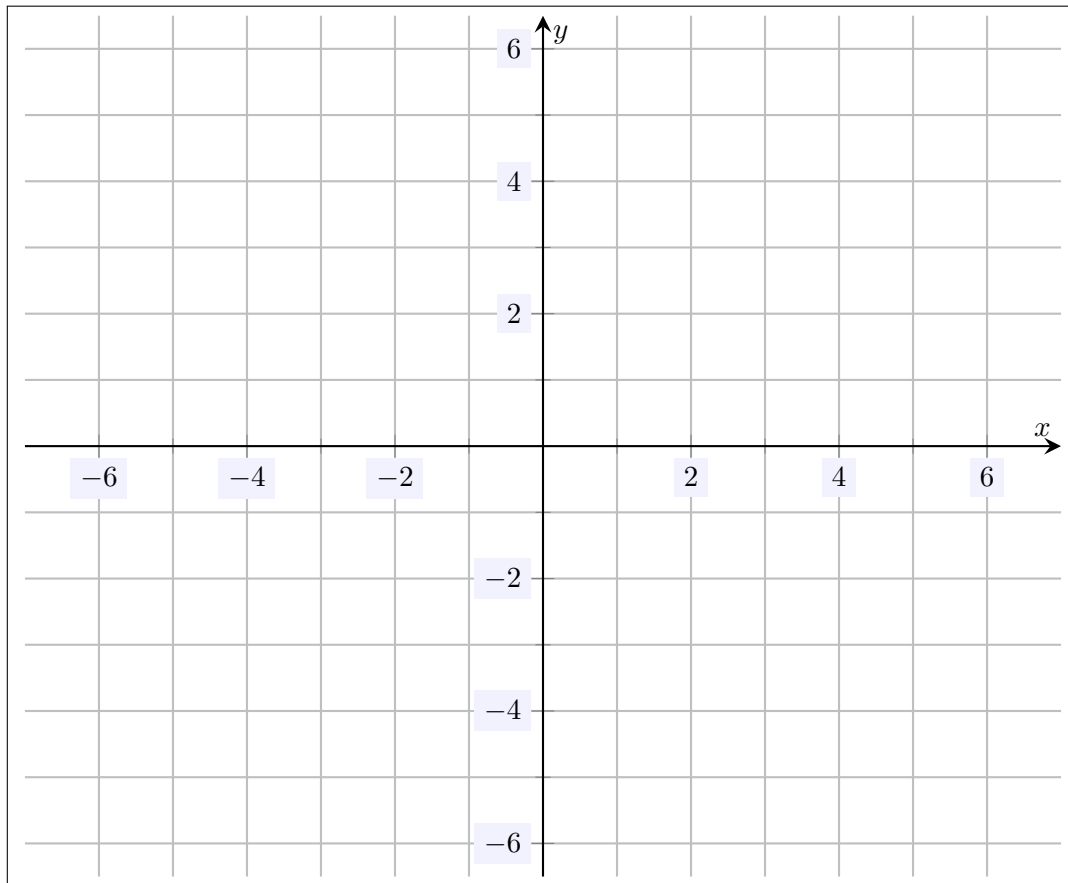
– Oscar Wilde

Problem 1. (10pt) Plot the quadratic function $y = 2x^2 - 4x + 3$ as accurately as possible. Your sketch should include the vertex and axis of symmetry.

Problem 2. (10pt) Plot the quadratic function $y = -x^2 - 6x - 5$ as accurately as possible. Your sketch should include the vertex and axis of symmetry.

Problem 3. (10pt) Give a rough sketch of the quadratic function $y = 2(x - 1)^2 + 3$. Your sketch should include the vertex and axis of symmetry.

Problem 4. (10pt) Give a rough sketch of the quadratic function $y = 4 - (x + 1)^2$. Your sketch should include the vertex and axis of symmetry.