Name: _____

MATH 100
Fall 2021
HW 7: Due 10/13

"Be nice to your sister, Bill. Some day you'll be sleeping on her couch after your first divorce"

−Frank Murphy, F is for Family

Problem 1. (10pt) Find the equation of the line through the point $(3, -1)$ with slope -2.

Problem 2. (10pt) Find the equation of the line through $(-2, 2)$ and $(3, 4)$.

Problem 3. (10pt) Find the equation of the horizontal line through $(0, -2)$.

Problem 4. (10pt) Find the equation of the line parallel to the line $y = 6 - x$ containing the point $(-6, 1)$.

Problem 5. (10pt) Find the equation of the line perpendicular to the line $y = \frac{5}{3}x + 1$ passing through the point $(10, -13)$.

Problem 6. (10pt) Find the equation of the line perpendicular to the line $y = 6$ that contains the point $(-3, 9)$.

Problem 7. (10pt) Find the equation of the line that is perpendicular to the line $y = 7x - 1$ that passes through the x-intercept of the line $y = 4x - 8$.