Solve the following initial value problems, and sketch a graph of the solution. Use time as the variable. We will discuss the applications in class next week!

(1) \( y' = 2y \quad y(0) = 3 \)

(2) \( p' = 3p \quad p(0) = -1 \)

(3) \( y' = 1.05y \quad y(0) = 2 \)

(4) \( y' = -1.1y \quad y(0) = 5 \)

(5) \( r' = -0.04r \quad r(0) = 2.2 \)
(6) \( r' = -0.7(r - 2) \) \( r(0) = 5 \)

(7) \( r' = -1.7(r - 1) \) \( r(0) = 0.5 \)

(8) \( m' = -1.2(m + 1) \) \( m(0) = 2 \)

(9) \( r' = -0.1r + 2 \) \( r(0) = 4 \)

(10) \( r' = 0.5r - 2 \) \( r(0) = 5 \)

(11) \( r' = -0.5r + 2 \) \( r(0) = 4 \)