1. Find an explicit solution to the following initial value problem.

\[
\frac{dw}{dt} = 6e^{3t}, \quad w(0) = 10
\]

\[
w = 2e^{3t} + 8
\]

2. Find an explicit solution to the following initial value problem.

\[
\frac{dR}{dw} = 0.3R, \quad R(0) = 40
\]

\[
R = 40e^{0.3w}
\]

3. Find an explicit solution to the following initial value problem.

\[
\frac{dq}{dr} = \frac{10r^4}{q}, \quad q(0) = 3
\]

\[
q = \sqrt{4r^5 + 9}
\]