8.1
The definition of law of mass action: the rate of a chemical reaction is proportional to the product of the concentrations of the reactants raised to their stoichiometric coefficients.

E(d[E]/dt): d[E]/dt = k2 * [ES] - k1 * [E] * [S];
S(d[S]/dt): d[S]/dt = -k1 * [E] * [S] + k2 * [ES];
ES(d[E]/dt): d[ES]/dt = k1 * [E] * [S] - k3 * [ES];
P(d[P]/dt): d[P]/dt = k3 * [ES];