Practice Problems about Systems.

(1) Determine if the following system is consistent. If it is, find the general solution.

$$\begin{array}{rcrcrcr} x & + & 3y & + & 4z & = & 7 \\ 3x & + & 9y & + & 7z & = & 6 \end{array}$$

(2) T or F?

(a) Row operations are reversible.

(b) A 5×6 matrix has six rows.

(c) Two matrices are called "row equivalent" if they have the same number of rows.

(d) An inconsistent system has more than one solution.

(e) Finding a parametric description of the solution set of a system is the same as solving the system.

(f) If a system has free variables, then it has multiple solutions.