

## PHY100S – The Magic of Physics – Pre-Class Quiz #6

The “butterfly effect” is another name for:

- A. Sensitive dependence on initial conditions. **CORRECT**
- B. The non-repeating nature of chaotic trajectories.
- C. The non-linear nature of chaotic systems.
- D. The non-integer dimensionality of chaotic systems.

The *Logistic Map* and accompanying equation is:

- A. A method of diagramming a logical argument.
- B. A way of determining the dimensionality of coastlines.
- C. Another name for the self-similar Koch Curve.
- D. An over-simplified model of population growth. **CORRECT**

Conway’s Game of Life is:

- A. A cellular automaton. **CORRECT**
- B. A comment of the transitory nature of our existence on Earth.
- C. A card game that simulates the development of the human fetus.
- D. A model of the biological cell.