MA 514 Homework #1
Due Friday, September 5, in class

1. Problem 1B. (Suppose G is a simple graph on 10 vertices...)

2. Problem 1C. (Show that a connected graph on n vertices...)

3. Problem 1F. (The girth of a graph...)

4. Consider Problem 1G. (Show that a finite simple graph...)

   (a) Solve Problem 1G.

   (b) Does the conclusion of Problem 1G hold if we drop the assumption that the graph is simple?

   (c) Does the conclusion of Problem 1G hold if we drop the condition that the graph is finite?

5. Problem 1H. (A graph on the vertex set $\{1, 2, \ldots, n\}$...)