MATH1040 Assignment 4

All questions should be submitted by 5pm on Thursday 21 December. You should show full working where possible. Assignments can be submitted during your tutorial or to the MATH1040 assignment box on the 3rd floor of the Priestley Building (#67). **Make sure that your name and student number are on each sheet of your answers.** Solutions will be distributed in class later.

1. A fair six-sided die and a normal Australian coin are tossed. Find the probability that:
   a) The die rolls a 4.
   b) The die rolls an even number.
   c) There is a head.
   d) There is a number greater than 4 and a tail.
   e) There is a prime number and a head.

2. Write a 150-word essay on the Monty Hall problem. (You need to write more than a summary of what we did in class. You may use the Internet to locate material if you like.)