ASSIGNMENT 2- Additional questions

Question 1

In a group of 75 people, 52 play tennis, 37 play golf, and 8 play both.

a.) How many people play tennis and golf?
b.) How many play tennis, but not golf?
c.) If we choose two people at random, what is the probability that they can play golf together?

Question 2

A 4-person committee from 9 people is formed. How many ways can this be done if

a.) there are no restrictions
b.) Jim and Mary are required to be on the committee
c.) Either Jim or Mary are required to be on the committee
Question 3
What is the probability of drawing 5 spades from a deck of cards?

Question 4:
In a shipment of 45 parts, 9 are defective. The quality control department will select 10 parts at random. If one or more parts are defective, the shipment is rejected. What is the probability of rejection?

Question 5:
From a group of women between the ages of 40 and 55, seven are selected at random. The number of times they have married, and the number of children they had, is recorded. The data is (1,0), (1,2), (2,3), (3,2), (3,4), (4,6), (4,5)

a.) How many children would a woman married five times have, according to this data?

b.) Is the answer in (a) to be trusted?

(Hint: Consider r)