

Part 1**Part 2****Exercise 1.4**

For events A and B , find formulas for the probabilities of the following events in terms of the quantities $P(A)$, $P(B)$ and $P(A \cap B)$.

A**Either A or B or both**

This is just the union of the two events.

$$P(A \cup B)$$

B**Either A or B but not both**

We can use the same formula here but we need to be sure to remove the intersection of the two.

$$P(A \cup B) - P(A \cap B)$$