

Answers to Homework 1

Quiz 1

- (1) **B** (0.1/0.4);
- (2) **A** (0.010 + 0.012 + 0.010);
- (3) **C** (0.010/0.032);
- (4) **E** (10/30);
- (5) **D** $(1 - (1-p)(1-p^2))$ or addition theorem, $\Pr(T \cup B)$.

Homework 1

- (1) **C** $(0.5g = g - 0.2)$;
- (2) **E** $(1 - 0.8 \times 0.7 \times 0.6)$;
- (3) **C** $(3 \times \frac{1}{3} \times \frac{2}{3} \times \frac{2}{3})$;
- (4) **B** $(\Pr(F \cap G) / \Pr(G) = \Pr(F \cap G) / \Pr(F))$;
- (5) **D** (0.0198/0.0296)

(6)

	P	P'	
F_0	0.0090	0.8910	0.90
F_1	0.0630	0.0270	0.09
F_2	0.0099	0.0001	0.01
	0.0819	0.9172	1

- i. $\Pr(P) = 0.0819$;
- ii. $\Pr(F_i | P) = (0.0090, 0.0630, 0.0099) / 0.0819 = 0.110, 0.769, 0.121$.