



$$P(A=T, D=\perp | B=T, C=T) = \frac{P(A=T, B=T, C=T, D=\perp)}{\sum_{a=\perp} \sum_{d=\perp} P(A=a, B=T, C=T, D=d)}$$

d

	A	
	T	$\perp$
T	$(0.2)(0.1)(0.6)(\underline{0.5})$	$(0.8)(0.3)(0.7)(\underline{0.5})$
$\perp$	$(0.2)(0.1)(0.1)(\underline{0.5})$	$(0.8)(0.3)(0.7)(\underline{0.5})$

$$P(A=T, D=\perp | B=T, C=T) = \frac{(0.2)(0.1)(0.6)(0.5)}{(0.2)(0.1)(0.6) + (0.8)(0.3)(0.7)}$$