Exercise 5.7

First, we have that

$$\ddot{a}_{x:\overline{10|}} = \ddot{a}_x - {}_{10|}\ddot{a}_x = 10 - 4 = 6$$

so that

$$
\begin{aligned}
A_{x:\overline{10|}} &= 1 - d\ddot{a}_{x:\overline{10|}} \\
&= 1 - (1 - v)\ddot{a}_{x:\overline{10|}} \\
&= 1 - (1 - 0.94)(6) = 0.64
\end{aligned}
$$

Finally, we then have

$$A^1_{x:\overline{10|}} = A_{x:\overline{10|}} - {}_{10}E_x = 0.64 - 0.375 = 0.265$$