

123. For independent lives (35) and (45):

(i) ${}_5p_{35} = 0.90$

(ii) ${}_5p_{45} = 0.80$

(iii) $q_{40} = 0.03$

(iv) $q_{50} = 0.05$

Calculate the probability that the last death of (35) and (45) occurs in the 6th year.

(A) 0.0095

(B) 0.0105

(C) 0.0115

(D) 0.0125

(E) 0.0135