53. You are given:

(i) The distribution of the number of claims per policy during a one-year period for 10,000 insurance policies is:

Number of Claims per Policy	Number of Policies
0	5000
1	5000
2 or more	0

(ii) You fit a binomial model with parameters m and q using the method of maximum likelihood.

Calculate the maximum value of the loglikelihood function when $m = 2$.

(A) −10,397

(B) −7,781

(C) −7,750

(D) −6,931

(E) −6,730