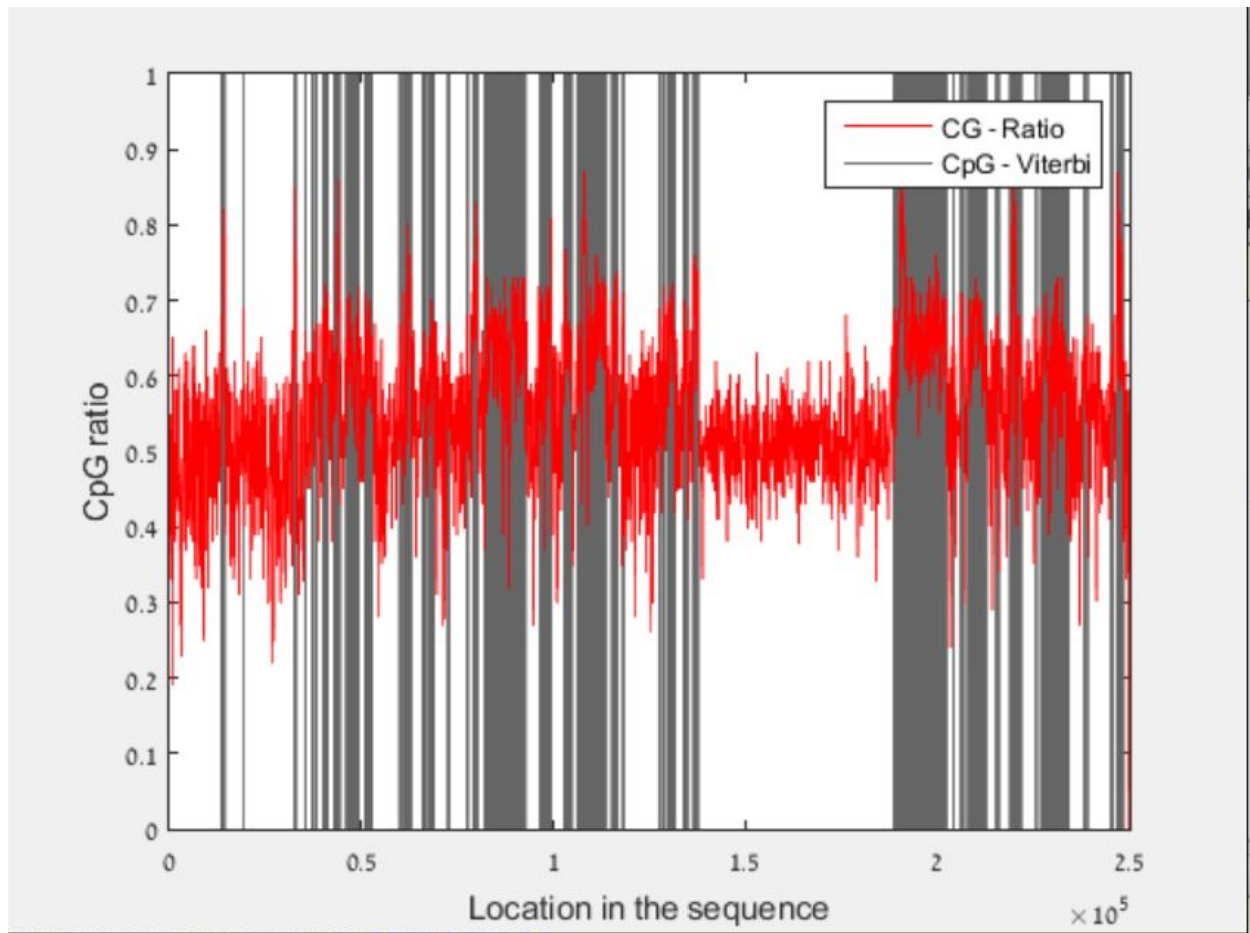


CBIO - EX2 - Lior ziv 305742611

a.1.Code is attached.

2.



b.1.Code is attached

2. The log log likelihood of chrom17 is $-3.4422e+05$

3.The log log likelihood of random sequence is $-3.4731e+05$

4.The log log likelihood of all 'A' sequence is $-3.2732e+05$

According to the emission and transition tables we got we can see that the most probable letter to emit in Non CpG is 'A', plus we will get NonCpg probability is also the highest among states. Both of the points i just mentioned supports the fact we got the highest log likelihood for the 'A' sequence.

For a random sequence we get the lowest probability since the matrices we got are more suitable for 17 sequence we got, if we want to calculate the probability for another different sequence we should prepare the right matrices for it.

