m =1   b =10

x-axis	y-axis
Nbasis Functions	Ground State Energy
2	9.718791
3	9.694172
4	9.675429
5	9.664721
6	9.65665
7	9.650891
8	9.646327
9	9.642758
10	9.639814

PIB Ground State Energy as a Function of Nbasis Functions: v =10, m =1
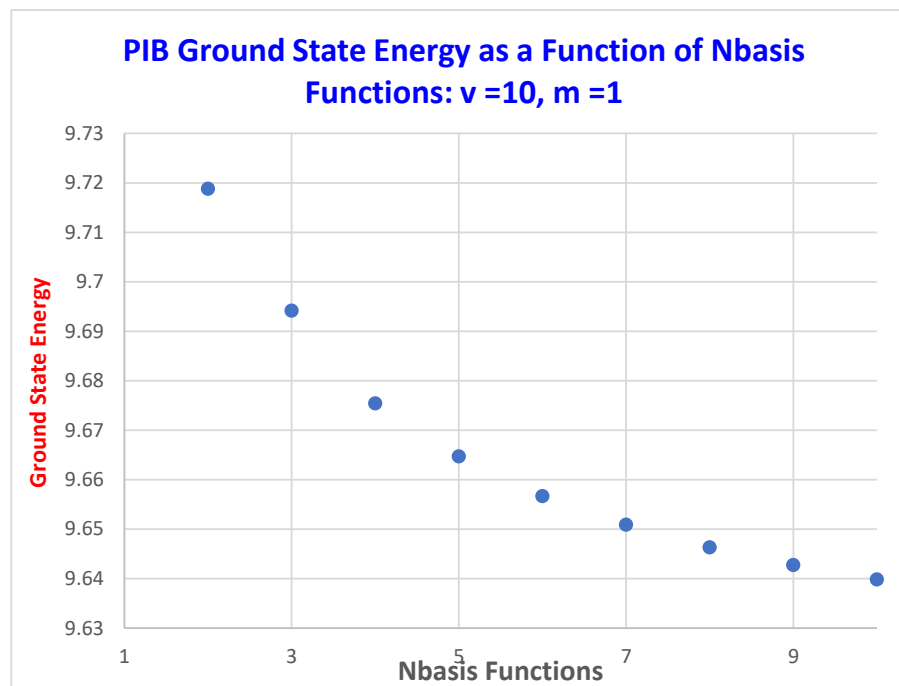
Comment: Using the variational theory, the approximate energy gets closer to the correct energy when more more basis set are added.