Phys 651 Fall 2023

Worksheet #16

(Wednesday, November 8, 2023)

Name

Questions (5 pts):

Consider a particle of mass m moving in 1D in a constant field f, so that the Hamiltonian is given by $H = P^2/2m - fX$. Write down the time-independent Schroedinger equation in:

(i) x-basis

(ii) p-basis

Which one would you prefer to solve? Why?