Jomaica Lei OMSBA 5068 – Seattle University 2/18/24

How much time did you spend on the assignment?

2-5 days, 5-8 hours each day – because I have to watch all the videos first before starting the assignment and I was struggling to implement the Bayes Rule for the code.

Were there aspects of the assignment that were particularly challenging? Particularly confusing?

I really enjoyed this week's lab but it was very challenging. I was a little bit confused why the pacman is not probing any squares on the lower half of the Vacuum Environment, but it was only probing squares on the top half – because of this, when you try to run the simulation multiple times, and the red and orange square is nearby the top half, then the chances of the ghost being busted is higher compared to if it was on the bottom half, this would only show green squares being probed on the top half if the ghost was on the bottom half. I think my code need to be improved for sure.

What were the main learning take-aways from this lab – that is, did it change your understanding of what AI is? Did it introduce particular concepts or techniques that might help you as an analyst or engineer or AI specialist in the future?

Some important lessons I can think of is the DFS and BFS algorithm could also be applied to this. For example, BFS: After sensing something suspicious nearby, BFS helps the agent focus on nearby places, updating their map of where ghosts might be hiding as they go. As with DFS: If the agent decides to explore far-away places or has a strong hunch about where a ghost might be, DFS helps them get there efficiently, considering their updated knowledge. So, by using these methods along with Bayesian updates, our Ghostbuster Agent can explore the area smartly, adjust their plans based on what they learn, and catch the ghosts effectively. I might look back in this assignment and use this in the future again.