Philosophy 3330 Spring 2021 Reading questions #10 Due Tue, March 30

Read Chapter 8 of James Ladyman's *Understanding Philosophy of Science* and then answer the following questions. Your answers should be uploaded in Blackboard.

- 1) Strong scientific realism says that you should believe that our current scientific theories are true or approximately true. The pessimistic meta-induction is an argument against this conclusion. Briefly explain this argument.
- 2) You often hear or see slogans like 'trust the science' or 'trust science' as if there is one thing 'science' giving testimony about what to believe. Ladyman's book also sometimes treats science as a whole when, for example, scientific realism is about our 'best scientific theories.' Here is a list of things that most scientists believe (or accept): that space and time are curved, that carbon atoms have six protons, that life evolved on our planet billions of years ago, that smoking causes cancer, that the average temperature on the surface of the earth has been going up recently, and that vaccines generally work. But the evidence for these claims came from different people in different disciplines working in very different ways. Is there a reason to treat all of these things the same way? Should we just believe all of them? Be critical of all of them? Or is there some room for examining them one at a time or maybe being selectively skeptical? ---- Obviously, I am not looking for you to write a whole essay here, just to think about phrases like "trust science" and what that means in light of thinking about scientific realism and our class. Writing one thoughtful paragraph would be plenty.
- 3) After reading the chapter, try to come up with a question that you want answered or a topic that you would like to be discussed further. This could be something that the chapter forced you think about or it could be something that you thought was particularly confusing in the chapter.