

ECE 6780: Lab 07

Bruce Englert
U1010546
Apr. 2, 2021

Prelab 07

-
1. What is the basic difference between an open and closed-loop control system?

Open-loop systems apply a process/algorithm to generate output state from inputs and cannot measure the affect of their own actions. Closed-loop systems use their own output as a secondary input and make decisions based on the error between the desired and current state, 'feedback'.

-
2. What does the acronym "PID" stand for?

PID is an acronym for three mathematical relations used within the control system; and stand for proportional, integral, and derivative.

-
3. When does proportional control lose effectiveness?

Proportional control provides rapid correction when the error signal is large and loses its effectiveness when the plant output near the setpoint.

-
4. Did you watch the intro videos?

Yes. They skipped the math :(