ME2L8070
G. Hadis Daniel

27/9 ME4010- Prog. Ex 1

2. a). Adding (cs) to G(s) changes the low frequency magnitude of the freq. response

b) Closing the loop betters the low frequency response, but there is still a small steady state error, as expected in a lag compensator.

We can also observe that the range of frequency where operational control is achieved (independence of Magnitude of response wrt frequency) is wider for the closed feedback loop can.

c) There is a small steady state error in a closed loop freq response, as the zero is not exactly at origin. This can be corrected by introducing a static gain.

(c) Observed magnitudes from the sinusoidal time response graphs match the values from the Bode plot