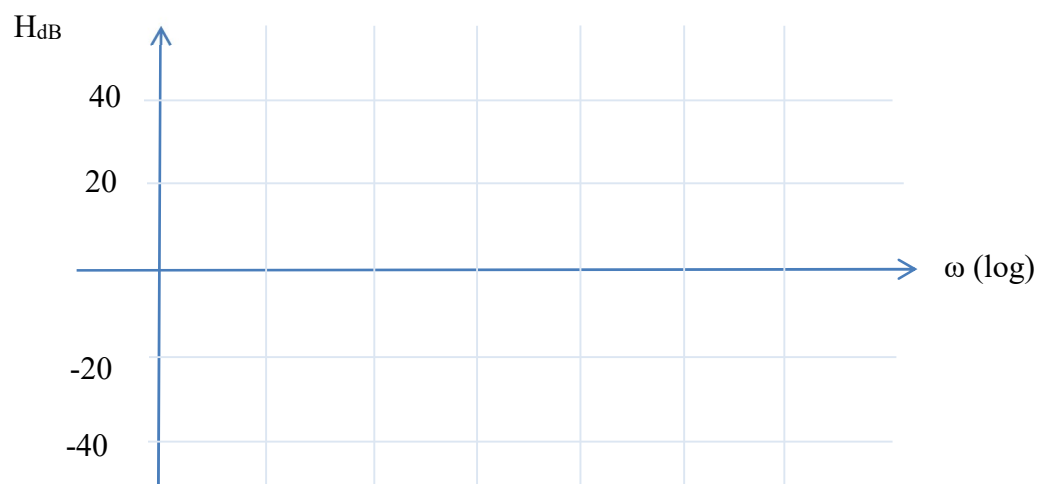**Pre-tutorial 11 Questions (to be attempted before class on Oct 4th, 2019)**

Chapter 16, Ex 56 a) – c)
Draw the Bode amplitude plot for

a) $\dfrac{20(s+1)}{s+100}$

H_{dB}

40

20

ω (log)

-20

-40

b) $\dfrac{2000s(s+1)}{(s+100)^2}$

H_{dB}

40

20

ω (log)

-20

-40

c) $s + 45 + \dfrac{200}{s}$

H_{dB}

60	
40	
20	

ω (log)
rad/sec

-20

-40

-60

Q2: System identification

Use straight line sketching techniques to identify the transfer function described by the following Bode diagram.