To hear and view this Pencast PDF on your computer, click here to get the latest version of Adobe® Reader.®
EG-247
Filfers.
Example 1: find the nots of PG)
$p(s) = S^{2} + \omega_{c}\sqrt{2} S + \omega_{c}^{2} = 0$ $S_{1,2} = -\omega_{c}\sqrt{2} \pm \sqrt{\omega_{c}^{2} \cdot 2 - 4\omega_{c}^{2}} C$
2.
$= - \left(\frac{1}{2} \right) \left(\frac{2}{2} \right)$
$= -\omega_{c} + j + \frac{1}{2} \omega_{c}$ $= \frac{1}{2} \omega_{c}$
$S_{11} = W_{C}\left(-\frac{1}{\sqrt{2}} + j\sqrt{\frac{1}{2}}\right)$
(5 + Wc(\frac{1}{2} + j\frac{1}{12}))(5 + Wc(\frac{1}{2} - j\frac{1}{12}))

To hear and view this Pencast PDF on your computer, <u>click here</u> to get the latest version of Adobe[®] Reader.[®] 5) 1350 = 17 + 17 = 1310 N=2 N= 9x. What is To hear and view this Pencast PDF on your computer, click here to get the latest version of Adobe® Reader®

(\$2+ we \$5+ we)= (s) = we U(s) d²y(t) + westedy + wey = we²u(t) $H_B(s) = \frac{\sqrt{(s)}}{X(s)} = \frac{\omega_c^2}{\sqrt{(s)}}$ Example 3 HB (jw) = Y (w) X(w) $S \rightarrow J \omega$ HB(jw)= Wc2 (w)2+wcJzjwtwc2 $H_{\mathcal{B}}\left(\frac{\omega}{\omega_{\mathcal{C}}}\right) =$ $(j\omega)^2+j\sqrt{2}\omega+1$. $= \frac{1}{-(w_{we})^2 + j\sqrt{2}w_{c}} + 1$

+((,	
	$1-(w_c)^2+\sqrt{12}(w_c)$
	Example 4
_	H(w) -> h(t) Inverse Fourier
	$e^{-\alpha t} sin w_0 u_0(t) \iff w_0$ $(jw+a)^2 + w_0^2$
	WC ²
	(Jw)2 + \$17 w c jw + w 22
	$V_{\mathcal{B}}(t) = \sqrt{2}\omega_{\mathcal{C}} \mathcal{C} \operatorname{Sin}\left(\frac{\omega_{\mathcal{C}}}{\sqrt{2}}\right) V_{\mathcal{O}}(t)$

To hear and view this Pencast PDF on your computer, <u>click here</u> to get the latest version of Adobe[®] Reader.[®]