

Short Quiz - 3

EE-407 Sec 1

Set A

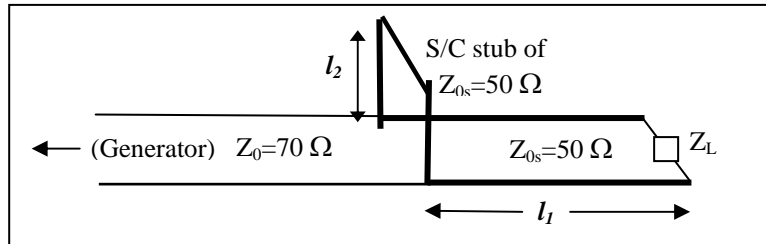
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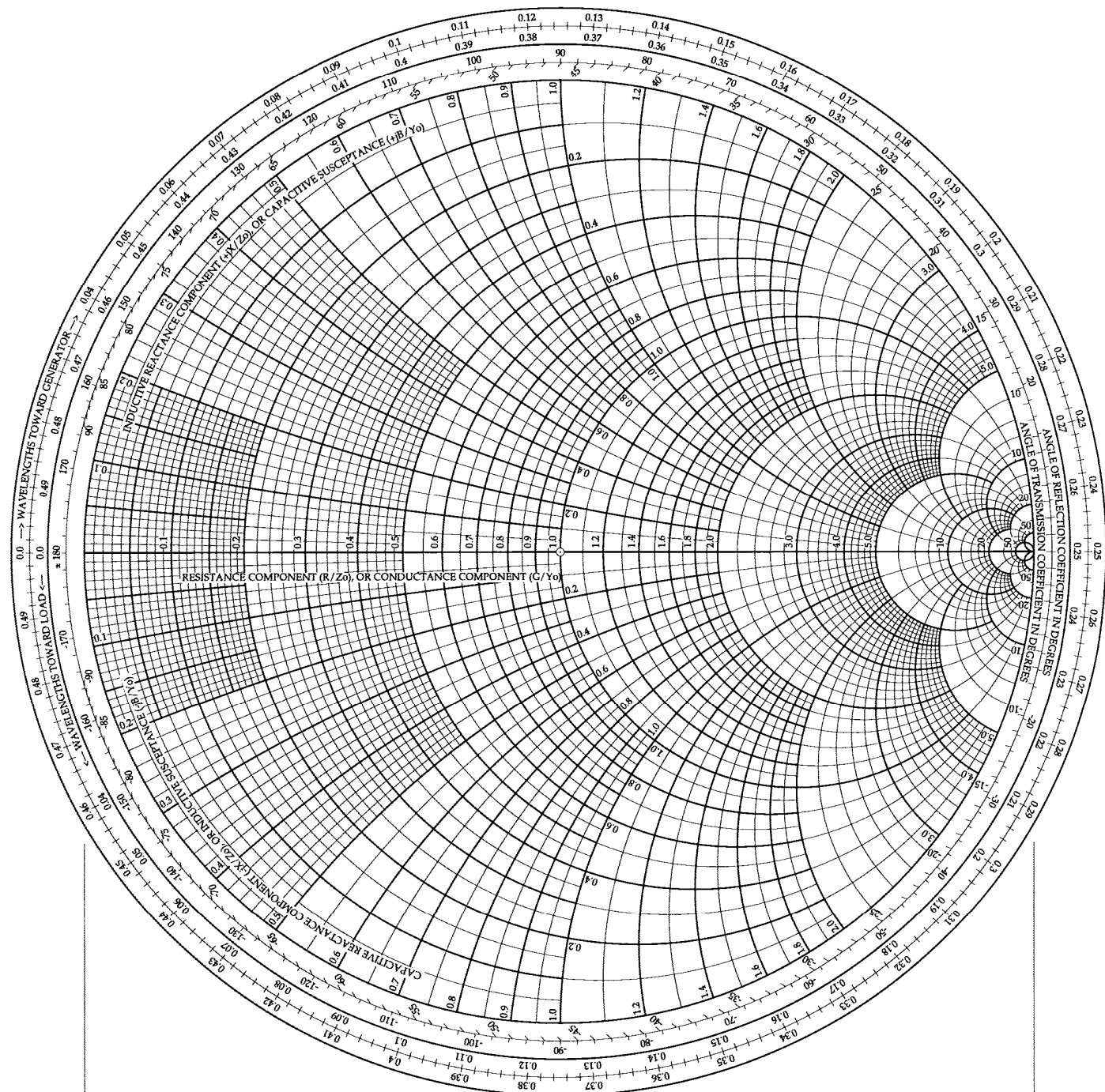
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Q.1 (a) A load impedance of $50 - j100 \Omega$ has to be matched to a 70Ω loss-less transmission line using a parallelly connected shorted-circuited single-stub, as illustrated in figure. Use calculations and smith-chart to determine;

(a) the **VSWR** of the transmission line.

(b) the required shortest **length l_1** and related **length l_2** in terms of a wavelength.





RADIALLY SCALED PARAMETERS

