

Unit I: Assessment: Assignments**Assignment – Lecture 27**

1. A non-inductive resistor is connected in series with a coil and capacitor of $25.5\mu\text{F}$. The current in the circuit is 0.4A and the potential difference across the non-inductive resistor is 20V , across the coil is 35V , across the capacitor is 50V and across the combination of non-inductive resistor and coil is 45V . Find the resistance and inductance of the coil. Also find the applied voltage, frequency and the power dissipated in the coil and the whole circuit.