

If $\quad v(t)=155.6 \cos \left(2 \pi 60 t+85^{\circ}\right) V$
and $i(t)=565.7 \cos \left(2 \pi 60 t+15^{\circ}\right) m A$

## Find

a) $V_{R M S}$ and $I_{R M S}$ phasors.
b) Complex power phasor (include units). Draw power triangle.
c) Apparent power (include units).
d) Real power (include units).
e) Reactive power (include units).
f) Power factor (include leading or lagging).
g) Load impedance in $\Omega$.
h) Model of load impedance as series RL or RC.
i) Average power dissipated in load (include units).

