If r>R, $V(r) = -\int_{\infty}^{r} \vec{E} \cdot d\vec{L} = -\int_{\infty}^{r} \frac{Q}{4\pi\varepsilon_0 r^2} dr = +\frac{Q}{4\pi\varepsilon_0} \frac{1}{r}\Big|_{\infty}^{r} = +\frac{Q}{4\pi\varepsilon_0 r}$