

Ch_7_Lesson_6_Ex_1.m

```
clear  
C = .5;  
L = .5;  
dt = 0.001;  
vc(1) = 5;  
I(1) = 0;  
t=0;  
tt(1) = 0;  
for i=2:10001  
    vc(i) = vc(i-1) + I(i-1)/C*dt;  
    I(i) = I(i-1) - vc(i-1)/L*dt;  
    t = t + dt;  
    tt(i) = t;  
end  
plot(tt,vc)
```