**3.22**

a)

>> b=[1,1];

>> a=[1,1/4,-1/8];

>> zplane(b,a);



b)

x=[1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0];

>> y=filter(b,a,x);

>> stem(y);



[h,t] = impz(b,a);

>> stem(h);



c)

>> [r,p,k] = residuez(b,a);

>> r

r =

 -0.6667

 1.6667

>> p

p =

 -0.5000

 0.2500

>> k

k =

 [ ]

**6.43**

 function [ xhat,t] = DAC1( x,N,T )

for t = 0:N\*T

 for n = 0:N

 xhat = x\*(sin(pi\*(t-n\*T))/T)/(pi\*(t-N\*T)/T);

 end

end

end