

```
%program for Linear sequence convolution
```

```
clc;
```

```
close all;
```

```
clear all;
```

```
x=input('enter input sequence 1: ');
```

```
y=input('enter input sequence 2: ');
```

```
z=conv(x,y);
```

```
subplot(3,1,1);
```

```
stem(x);
```

```
xlabel('n');
```

```
ylabel('x(n)');
```

```
title('input sequence 1') ;
```

```
subplot(3,1,2);
```

```
stem(y);
```

```
xlabel('n');
```

```
ylabel('y(n)');
```

```
title('input sequence 2')
```

```
subplot(3,1,3);
```

```
stem(z);
```

```
xlabel('n');
```

```
ylabel('z(n)');
```

```
title('linear convolution') ;
```

```
disp('linear convolution z=');
```

```
disp(z);
```

```
%program for signal convolution
```

```
t=0:0.1:10;
```

```
x1=sin(2*pi*1*t);
```

```
y1=cos(2*pi*1*t);
```

```
z1=conv(x1,y1);  
figure;  
subplot(3,1,1);  
plot(x1);  
xlabel('t');  
ylabel('x(t)');  
title('input signal 1') ;
```

```
subplot(3,1,2);  
plot(y1);  
xlabel('t');  
ylabel('y(t)');  
title('input signal 2')
```

```
subplot(3,1,3);  
plot(z1);  
xlabel('n');  
ylabel('z(n)');  
title('linear convolution');
```