## ANGULAR MODULATION - FREQUENCY MODULATION:

CODE:

```
clc;
clear all;
close all;
t=[0:0.001:4];
f1=2.5;
m=cos(2*pi*f1*t);
subplot(4,2,[1,2]);
plot(t,m);
title('message');
f2=30;
c=sin(2*pi*f2*t);
subplot(4,2,[3,4]);
plot(t,c);
title('carrier');
mf=10;
s=sin((2*pi*f2*t)+(mf*sin(2*pi*f1*t)));
subplot(4,2,[5,6]);
plot(t,s);
title('fm');
syms t1;
x=diff(s);
y=abs(x);
[b,a]=butter(10,0.033);
s1=filter(b,a,y);
subplot(6,2,[11,12]);
plot(s1);
title('demodulation');
```

## OUTPUT:

