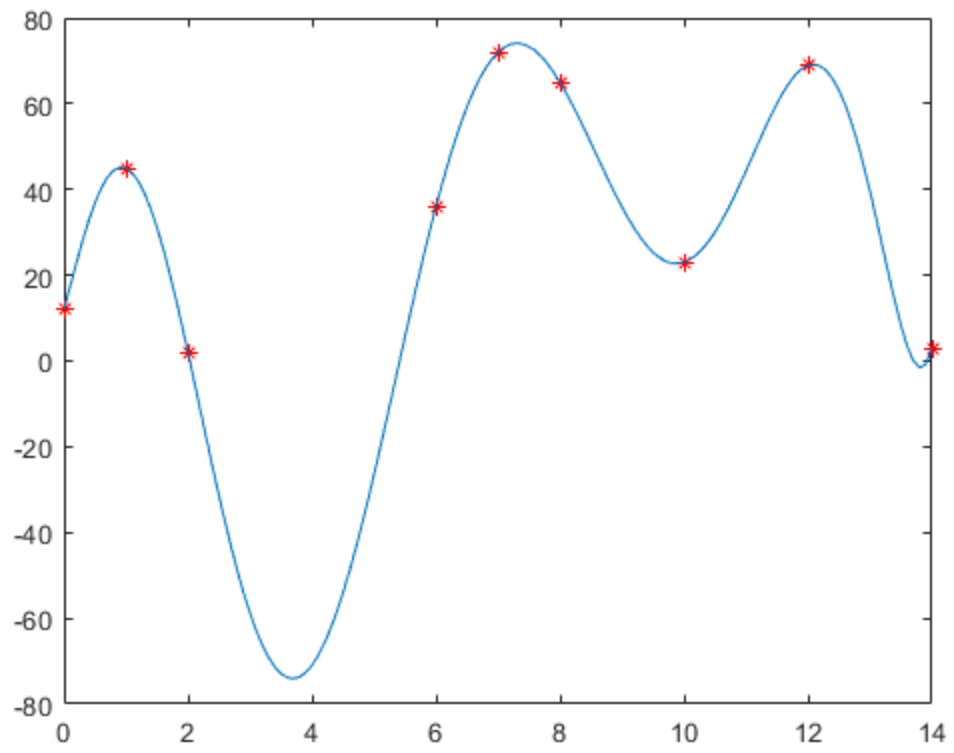

Lagrange interpolation

```
t=[0:0.1:14];
x =[0 1 2 6 7 8 10 12 14];
y = [12 45 2 36 72 65 23 69 3];
plot(x,y,'r*');hold on %####(x,y)###
plot(t,LagrangePol(t,x,y)); % ###(x1,y1)##(x2,y2)###Lagrange##

function y = LagrangePol(x,px,py)
    n = size(px,2)
    % m = size(X,dim);#####dim=1#####dim=2####
    L=ones(n,size(x,2)); % ones(n1,n2) ##n1xn2#####1
    for i=1:n
        for j=1:n
            if (i~=j)
                L(i,:) = L(i,:).*(x-px(j))/(px(i)-px(j));
                % ##px#####Lagrange equation coefficient
            end
        end
    end
    y = 0;
    for i=1:n
        y = y + py(i)*L(i,:); % #####y#####
    end
end

n =
```



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