

Post Session work:

1. Compute the convolution $y[n]$ of the signals

a. $x[n] = a^n$ for $-3 < n < 5$ (Choose any value of $a > 1$)

0 otherwise

$h[n] = 1$ for $0 < n < 4$

0 otherwise

b. $x[n] = (1/3)^n$ for $0 < n < 6$

0 otherwise

$h[n] = 1$ for $-2 < n < 2$

0 otherwise

Verify them using the Scilab code provided.

2. When does convolution of a sequence $x[n]$ with a sequence $h[n]$ result in the output $y[n] = x[n]$?

Give example of such a sequence and plot it using Scilab.

References:

· Link to a tutorial to understand the concept of convolution better.

<http://www.jhu.edu/signals/convolve/index.html>

<http://www.jhu.edu/signals/discreteconv2/index.html>