Digital Signal Processing

Year : 2016-17 **Div : B.E. A,B,C**

Lecture – 09

Q. 1) Find circular convolution of following signals using matrix representation:

a. x1[n] = [-3, 1, -1, 3] and x2[n] = [1, 0, 1]

b. x1[n] = [1.5, 0.5, -0. 4] and x2[n] = [-1, -1, -1]

c. x1[n] = [-1.3,-5.5, 2] and x2[n] = [1, 1, 1]

Q1) $x_1[n] = [-3, 1, -1, 3]$ & $x_2[n] = [1, 0, 1]$.

	-3	1	-1	3
1	-3	1	-1	3
0	0	0	0	0
1	-3	1	-1	3

$-3, 1, -4, 4, -1, 3$

$-3 + (-1)$

$-3 - 1$

$\therefore y(n) = [-3, 1, -4, 4, -1, 3]$