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***DIGITAL SIGNAL PROCESSING (LAB)***

***LIST OF EXPERIMENTS***

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| **S.NO** | **EXPERIMENTS** |
| 1 | MATLAB basic operation and Implementation |
| 2 | Signal Representation and Classification |
| 3 | To demonstrate the Sampling of signals |
| 4 | To compute the Convolution of signals |
| 5 | To Check Linearity, Non linearity, Time Variance and different responses (Impulse, step and sinusoidal ) of a system via filter and convolution command |
| 6 | To represent the transfer function and compute the Z- Transform |
| 7 | To Compute the frequency samples of the DTFT and IDFT and observe Frequency-Shifting and Time-Shifting Properties of DTFT |
| 8 | To compute the Auto Correlation and Cross Correlation of the signal |
| 9 | Implementation of FIR Filters |
| 10 | Implementation of IIR Filters |
| 11 | Demonstration of Up Sampling and Down Sampling |
| 12 | To plot the signals using Simulink |

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