EE 210 Signals and Systems

Week 5 Summary:

- 1. Response of LTI systems to complex exponentials
- 2. Continuous time periodic signals derived from combination of harmonically related complex exponentials
- 3. Fourier series representation of continuous time periodic signals; analysis and synthesis equations.
- 4. Computing Fourier series coefficients (magnitude and phase spectra) for periodic signals such as square, triangular and rectangular waveforms.

Homework exercises (all problems from the textbook):

3.13,

3.17,

3.22(a) waveform(e),

3.47

Textbook: Alan V. Oppenheim and Alan S. Willsky with S.H. Nawab, Signals and Systems, Second Edition, PHI (Indian reprint: 2014)