Overview - Lecture Information

Prof. Hyunggon Park

Email: hyunggon.park@ewha.ac.kr
Homepage: http://mcnl.ewha.ac.kr

Multimedia Communications and Networking Lab.
Department of Electronic and Electrical Engineering
Ewha Womans University

Course Objective

- Variety of fundamental communications and signal processing concepts
  - modulation/demodulation (MODEM) techniques
  - analog-to-digital conversion (ADC) techniques
  - signal sampling, etc.
  - using Lab-Volt FACET digital communication board
- Basic MATLAB implementation for communication systems

Texts and References

- Texts
  - Handouts
- References
  - Lab-Volt FACET Manual
  - Mathwork MATLAB Documentation
  - J.G. Proakis and D.G. Manolakis, Digital Signal Processing: Principles, Algorithms and Applications, Prentice Hall, 4th Ed. 2006.
  - Alan V. Oppenheim, Ronald W. Schafer, John R. Buck: *Discrete-Time Signal Processing*, Prentice Hall.

* We have prepared several manuals and instructions. Please use them for your study!

Course Structures and Teaching Methods

- In every class,
  - brief introductions to main goals, objectives, and important concepts are given
  - students exercise team-based several experiment and have discussion

Course Requirements and Assignments

- Prepare **a few pages of slides** and have **brief presentations** in English in each class.
- Submit your **slides** and **reports** for lab session after each class.
- Submit your **MATLAB codes** if necessary
- Do class **projects**

Evaluation Guideline

- Slides/Reports: 10%/10%
- Presentation (includes questions and answers): 10%
- Final Exam (theoretical and design concepts): 30%
- Project/Project Reports/Presentation: 20%, 5%, 5%
- Attendance: 10%
- Relative evaluation

Some Notes

- The due date of Lab-reports is the next lecture. For late submissions, it is only allowed to submit within the next one week, with half of the earned points.
- No point will be given for attendance if there are more than 3 times of absences (of course, you will be failed if more than 6 times of absences - upon subject to School policy).
- No grade will be given (F will be given) if you do not take the final exam.
- Questions are always welcome! It is encouraged either you may stop by the office of TA or instructor with an appointment in advance or send/receive via emails.

Tentative Schedules

- Planned no classes
  - 10/4 (Wed): 추석

Information of Class

- In class
  - Prepare preslides and final reports
    - see examples and information for reports
  - For preslides: conversation (questions and answers) in English
    - see video clip
- Teams for Labs and Projects
  - three members (two members can be possible if necessary) in each team
  - randomly formed (try to make teams in the same grades)
- TAs and PI
  - TAs for all labs and projects and evaluations of preslides and final reports
  - PI for MATLAB labs (potentially for projects)