C Programming

: Intro. to Computing with the C Programming Lang.

Course Overview

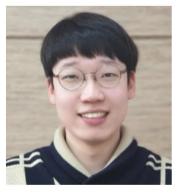
Shin Hong

28 August 2023

ITP 10003-01 Director & TAs

- Shin Hong
 - Class director: lead lecture, manage classes, design learning materials
 - 313 Oseok Hall (OH 313)
 - https://hongshin.github.io, https://arise.handong.edu/
 - hongshin@handong.edu

Teaching assistants



Jeewoong Kim

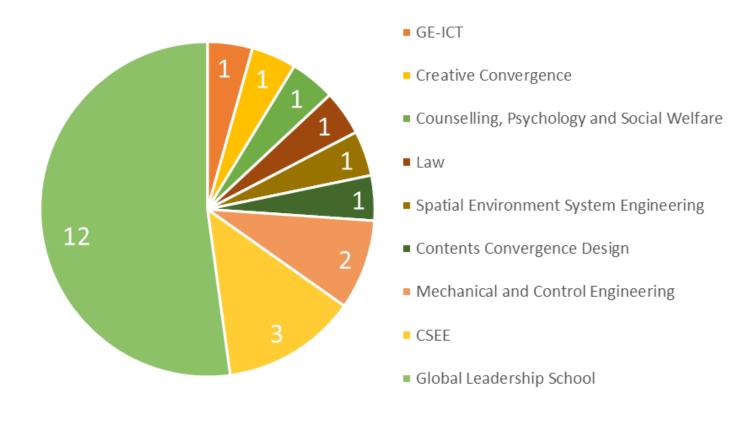
- Ph.D student
- 318A Oseok Hall
- jeewoong@handong.ac.kr



Sungbin Lim

- Master's student
- 318A Oseok Hall
- sungbin@handong.ac.kr

ITP 10003-01 Enrollees: 23 students



- retakers: 6
- international students: 8
- freshmen: 10
- exchange students: 2

Entrance survey (mandatory)

 submit the following Google Form by 9 PM today as a mean of declaring your attendance for this meeting

https://forms.gle/zRknmD6nxKTik56H6

(you can find this link at HDLMS)

Course Objectives

 cultivate the ability to comprehend simple computation with the C programming language

- 2. understand how computer systems work in association with the C programming aspect
- 3. learn basic computation strategies for problem solving

in other words

- Introduction to Programming (50%)
- Introduction to Computer (30%)
- Introduction to Computer Science (20%)

Learning Activities

- Textbook reading
- Lecture & discussion
- Teaching assistant's session
- Programming exercises
- Exam

Main Textbooks

[HtCS] How to Think Like a Computer Scientist: C Version

- written by Thomas Scheffler
- https://github.com/tscheffl/ThinkC/blob/master/PDF/Think-C.pdf

[DSys] Dive into Systems

- written by S. J. Matthew, T. Newhall, and K. C. Webb
- https://diveintosystems.org

[GNUC] The GNU C Reference Manual

https://www.gnu.org/software/gnu-c-manual/gnu-c-manual.html

Class Meetings

- Regular meeting (mandatory)
 - 10:00—11:15 AM, Mon & Thur (3 hours/week)
 - 313 Newton Hall
 - Discuss the study topic based on textbook description and examples
- TA session (optional & highly recommended)
 - To be decided (1 hour/week)
 - Q&A, hands-on, programming exercise review
- Meetings are basically held in-person; online meetings (Zoom) for exceptional cases with prior arrangements

Discussion Contribution

- Your question, answers or in a class time is considered as discussion contribution
- Declare your discussion contribution point by leaving a comment on the corresponding cell at the Google spreadsheet
 - https://docs.google.com/spreadsheets/d/1rhF6zo4lx9vy5DeKGZrNPGZ4IT5c mSMlrfFUDnXTklw/edit?usp=sharing

Schedule

Week	Class Topic	Textbook coverage
1	Course intro / What is programming	HtCS:Ch.1
2	Variables and types / Function	HtCS:Ch.2 & Ch. 3
3	Conditional statements / Test #1	HtCS: Ch. 4
4	More on function / Iteration	HtCS: Ch. 5 & Ch. 6
5	Iteration (con'd) / Test #2	HtCS: Ch. 6
6	Array, String	HtCS: Ch. 7 & Ch. 8
7	Structure	HtCS: Ch. 9
8	Test #3	
9	Basics of computer systems / pointer	DSYS: Ch. 2
10	Dynamic memory allocation / Test #4	DSYS: Ch. 2
11	Input and output	DSYS: Ch. 2
12	Binary and data representation / Test #5	DSYS: Ch. 4
13	Primitive and Compound Type	GNUC: Ch. 2
14	Statements and function / Test #6	GNUC: Ch. 4 & Ch. 5
15	Program structure	GNUC: Ch. 6
16	Final exam	-

Programming Exercise

• 5 to 8 programming exercises will be given a weekly basis without obligation to submit answers

The TAs will review these exercises at the TA's session

 It is highly recommended to take Coding Studio together with this class, which offers comprehensive C programming practices

Evaluation

- Components
 - Attendance: 10%
 - Discussion: 10% (+10% in extra for extraordinary contributor)
 - Tests (six times): 40%
 - Final exam: 40%
- Grading: relative evaluation
 - A:B:C = 25-40%: 40-50%: 10-30%
 - Retakers are graded separately

Tests and Exam

Tests

- 5 to 6 times in this semester
- A test will be made after completion of certain textbook chapters. The schedule will be announced 3 days before the test.
- A test may have programming problems and descriptive problems.

Exam

- 2 hours x 2 times at the final week (16th week)
- It is planned to give you descriptive problem and a project problem for which you need to construct a solution program in 2 hours.

Communication

- Github Repository: http://github.com/hongshin/c-programming
 - for study materials (lecture note, programming exercise, etc.)
- Instant Messaging: TBD (Google chat, Slack, or Kakaotalk)
 - for announcement, timely communication, and Q&A
- Hisnet LMS
 - for attendance record and bookkeeping

Class Policies

