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References: Deitel and Deitel – How to program with C++.

Projects and Homeworks will be uploaded on the LMS (vclass.uok.ac.ir) every Thursday.

Evaluation: **30**% Midtern+**30**% final exam+**40**% projects.

Session No.	Week	Topic
Session 1	1	Introduction
Session 2	1	Introduction to Computer systems
Session 3	2	How instructions would be processed in computer?
Session 4	2	How materials are saved on the memory? (1)
Session 5	3	How materials are saved on the memory? (2)
Session 6	3	How to be a good programmer? How to create a flowchart? (1)
Session 7	4	How to create a flowchart? (2)
Session 8	4	How to implement a program and running it? An introduction to environments and c++ compiler.
Session 9	5	Introducing structure of programs and using I/O.
Session 10	5	Implementing some sample programs. Implementing mathematical expressions.
Session 11	6	Introduction to different type of operators and how to utilize them.
Session 12	6	How to use conditions in programs. (1)
Session 13	7	How to use conditions in programs. (2)
Session 14	7	How to use loops in programs. Using while.
Session 15	8	How to use loops in programs. Using for.
Session 16	8	Some more sample programs.
Session 17	9	How to use switch in programs.
Session 18	9	Introduction to arrays.
Session 19	10	How to use arrays in especial programs.
Session 20	10	How to use multi-dimension arrays
Session 21	11	Implementing sample programs.
Session 22	11	Midterm
Session 23	12	Introduction to functions.
Session 24	12	Using functions in programs. Functions with input and output values.
Session 25	13	Some examples.
Session 26	13	How to use recursive functions.
Session 27	14	Implementing sample recursive functions.
Session 28	14	Introduction to Addresses and pointers
Session 29	15	How to use pointers in c++?
Session 30	15	Why pointers must be used?+some examples
Session 31	16	More examples
Session 32	16	Overview