

Carleton University
Department of Systems and Computer Engineering
SYSC 3006 (Computer Organization) Fall 2020
Lab / Assignment 7 – Answers file

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Part 1 – Fragment 1

1. [1-mark] Complete the Fragment1SRC code by replacing all occurrences of “***” with the necessary details. Do not add any additional instructions. Then Submit your completed (working) Fragment1SRC code.

Your included code file will be verified and graded (nothing to add here).

Part 2 – Fragment 2

1. [1-mark] Complete the Fragment2SRC code by replacing all occurrences of “***” with the necessary details. Do not add any additional instructions. Then Submit your completed (working) Fragment2SRC code

Your included code file will be verified and graded (nothing to add here).

2. [0.5-mark] Describe the difference between the Bcc and BLcc instructions, and why the difference is important.

The difference between Bcc and BLcc instructions, is that Bcc is branch however BLcc is a branch with link that calls subroutines when executed, also the return address is saved before branching.

3. [0.5-mark] Briefly describe the programming conventions associated with subroutines that are used in this course.

The subroutines are invoked by executing the BL instruction. R0, R1, R2, and R3 pass the parameters when called, also R0 will return the return value.

Must be submitted on cuLearn, locate (Assignment 7 submission) and follow instructions. The submission must include all completed code files. Submission exact deadline (date and time) is displayed clearly within the Assignment 7 submission on cuLearn.

Note: If you have any question please contact your respective group TA (see TA / group information posted on cuLearn) or use Discord class server.

Good Luck