

# York University

## Dept. of Computer Science and Engineering

### Digital Logic Design

### CSE3201

### Lab 5

In this lab you will use the circuits (modules) that you implemented in Lab 4 to design a more complicated circuit.

#### ***Problem***

Design a 4-bit multiplier using shift-and-add technique. Use the ripple carry adder you implemented in the last lab.

#### ***Preparatory work***

Draw the circuit diagram for the multiplier and write the Verilog code

#### ***In the lab***

Simulate the circuit, show the simulation result to the TA, and then implement it on the board