Using Verilog language, design an 4bit ALU that capable of performing four operations (AND, OR, ADD, SUB) based on the diagram shown below
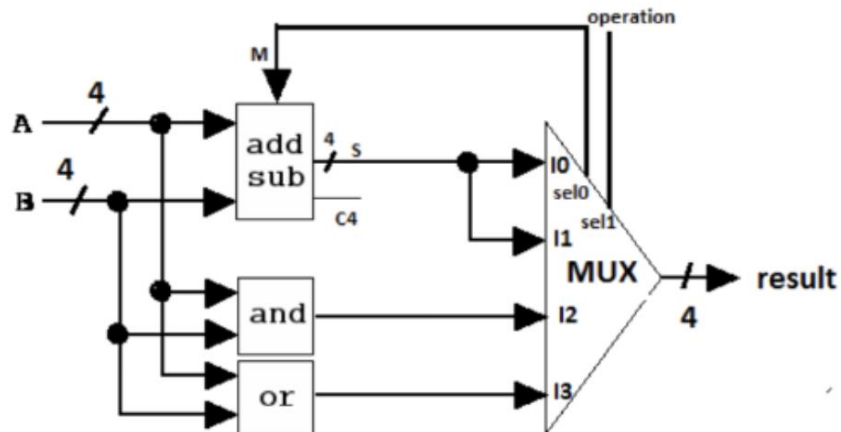
Note:
- Use mix-level implementation for this design
- You are not allowed to use arithmetic operators