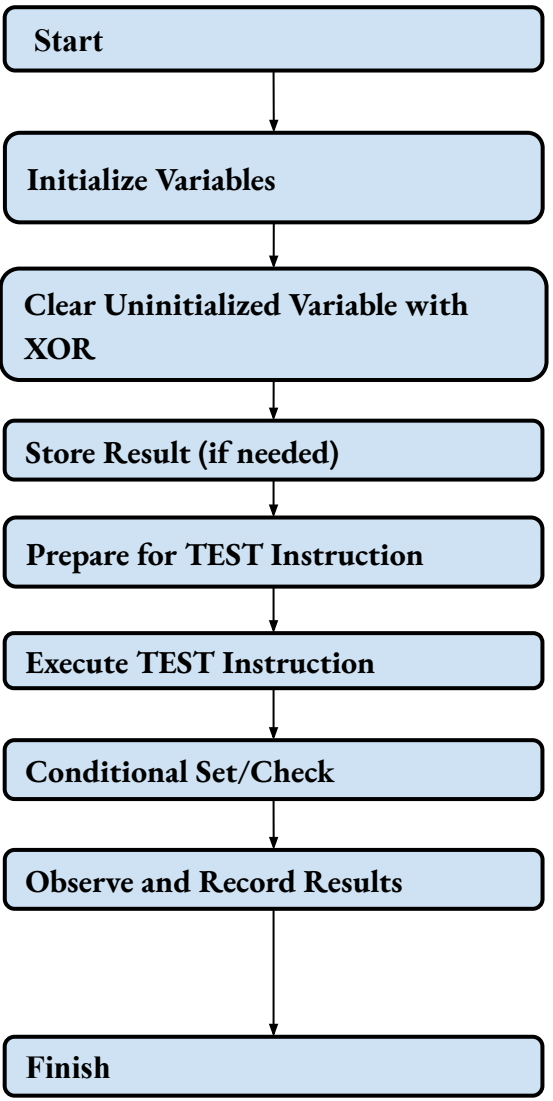
Assembly Logical Instructions Lab



- Assign starting values to the initialized variables (right-hand side of equations).

- Use xor instruction: xor reg, reg
- This sets the destination register (or variable) to zero.
- Proof Step:
  - Show that after execution, the variable is zero.

- Move the zeroed value into the target variable.

- Set up a scenario where a logical test between variables or registers is needed.

- Use the test instruction to logically AND two operands (without changing their values).
- This updates CPU flags based on the result.

- Use a conditional instruction (like setne, sete, or similar) to store the test result (1 or 0) in a result variable.

- Step through each instruction using GDB.
- Watch the values of your variables to verify the expected behavior:
  - XOR sets variable to zero.
  - TEST/conditional sets result variable to 1 or 0 as expected.