

```
1  // Eugene Ngo
2  // 4/7/2023
3  // CSE 469
4  // Lab 1 Task 3
5
6  // A module to implement a fullAdder.
7  // This file was reused from a given file in EE 371
8  module fullAdder (a, b, carryIn, Result, carryOut);
9
10     input logic a, b, carryIn;
11     output logic Result, carryOut;
12
13     assign Result = a ^ b ^ carryIn;
14     assign carryOut = (a & b) | (carryIn & (a ^ b));
15
16 endmodule
```