

File: c:\My\_Designs\design3\design3\src\adder.v

```
1 module adder(A, B, CI, S, CO);
2
3   input A, B, CI;
4   output S, CO;
5
6   assign S = A ^ B ^ CI;
7   assign CO = (A & B) + ((A ^ B) & CI);
8
9 endmodule
```