Half adder X27385_en

Design a **half adder** that is a circuit that performs the addition of two binary digits, a and b. It outputs the *sum* and the output *carry*.

Specification

module *halfadder*(a, b, *sum*, *carry*);
  input a, b;
  output *sum*, *carry*;

Input

- a and b are the two input values.

Output

- *sum* is the least significant digit of $a + b$.
- *carry* is the output carry, i.e., the most significant digit of $a + b$.

Problem information

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Generation: 2026-07-14T06:42:09.446Z

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