Flowchart Diagram for the Calculator Program

Start

Display Menu (Options 1 to 7) → User Inputs option `userChoice`

Is `userChoice` option 1? — **Yes** → Collect inputs `numberOne` `numberTwo` → Add inputs `numberOne+numberTwo` print

No ↓

Is `userChoice` option 2? — **Yes** → Collect inputs `numberOne` `numberTwo` → Subtract inputs `numberOne-numberTwo` print

No ↓

Is `userChoice` option 3? — **Yes** → Collect inputs `numberOne` `numberTwo` → Multiply `numberOne*numberTwo` print

No ↓

Is `userChoice` option 4? — **Yes** → Collect inputs `numberOne` `numberTwo` → Divide `numberOne/numberTwo` print

No ↓

Is `userChoice` option 5? — **Yes** → Collect input `numberOne` → Square `numberOne^2` print

No ↓

Is `userChoice` option 6? — **Yes** → Collect input `numberOne` → Square `numberOne^(1/2)` print

No ↓

Is `userChoice` option 7? — **Yes** → Collect input `numberOne` → Find reciprocal `1/numberOne` print

No ↓

Is `userChoice` any other option? — **Yes** → print: `Invalid input!`

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Ask user to continue calculator or exit

↓

User continues? — **Yes** → (back to Display Menu)

No ↓

End Program