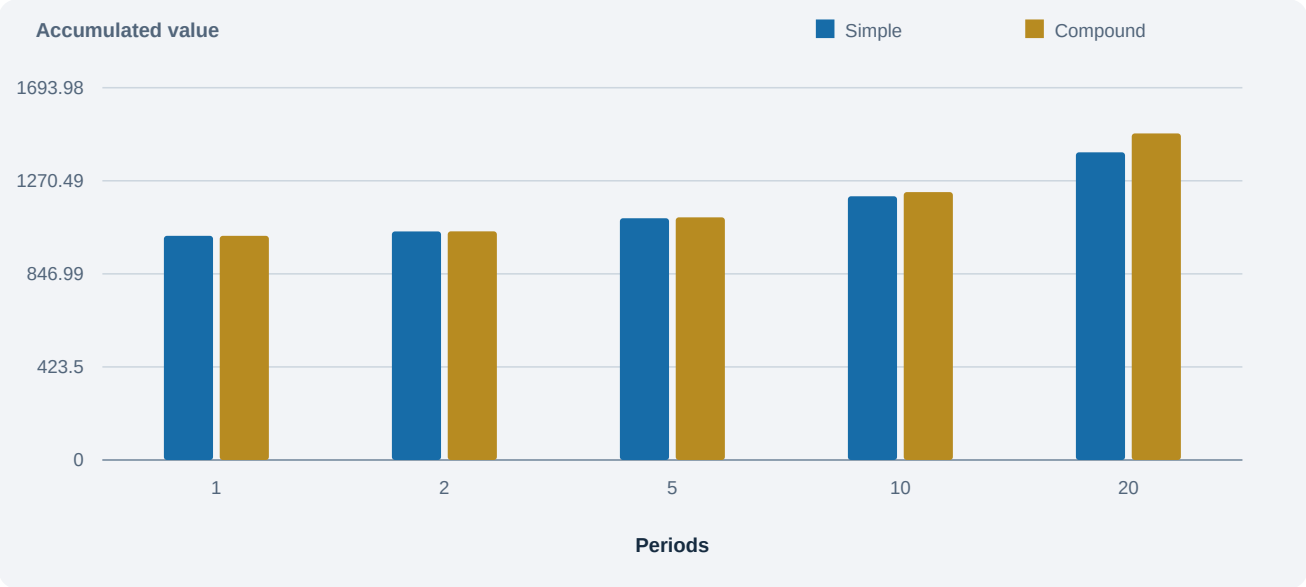
Simple interest and compound interest

Return comparisons | Original synthetic example | Edition 2026-11-26

Simple interest accrues on the original principal while compound interest also accrues on past accumulated interest. The two methods diverge with time under positive constant rates.

FORMULA Simple value = principal x (1 + rate x periods)

SCENARIO 01: Principal 1,000; fixed rate 2% per period



WORKED EXAMPLE

At five periods, simple interest gives 1100; compounding the same rate gives 1104.08.

COMMON MISTAKE

Using a compound-growth result to describe a simple-interest contract changes the promised calculation method.

BEFORE YOU USE THE CALCULATION

1. Read the accrual convention.
2. Match rate and period length.
3. Separate hypothetical growth from contractual terms.

COMPARE TWO MORE INPUT SETS

Scenario 05: Principal 1,000; fixed rate 4% per period. At five periods, simple interest gives 1200; compounding the same rate gives 1216.65.

Scenario 10: Principal 1,000; fixed rate 6.5% per period. At five periods, simple interest gives 1325; compounding the same rate gives 1370.09.

Synthetic values are not historical market data. Educational material; trading can result in substantial losses.