public class FinancialForecast {

// Recursive method to calculate future value

public static double futureValue(double principal, double rate, int years) {

if (years == 0) {

return principal;

}

return futureValue(principal \* (1 + rate), rate, years - 1);

}

public static void main(String[] args) {

double principal = 10000; // Initial amount

double rate = 0.10; // 10% growth rate

int years = 5; // Forecast for 5 years

double result = futureValue(principal, rate, years);

System.out.printf("Future value after %d years: %.2f\n", years, result);

}

}

