

SINE X (Infinite Series)

The sine of x in degrees can be calculated approximately by summing the first 15 terms in the infinite series.

$$\sum_{n=1}^{15} \frac{(-1)^{n+1} X^{(2n-1)}}{(2n-1)!}$$

where X is expressed in decimal radians

Write a program to evaluate 30, 100, 210 and 343 degrees. Your output should include the angle and the approximate sine calculated.