

14° Primality test and factorization of Lepore (conjecture)

Let be given a number N that we know is written in the form $a^2 + n \cdot a = N$.

Consider (B) $3 \cdot a^2 - m \cdot a = N$

Then

$$C = N - B = a^2 + r \cdot a$$

$$D = B - C = a^2 + s \cdot a$$

$$F = C - D = a^2 + t \cdot a$$

$$G = D - F = a^2 + v \cdot a$$

etc. etc.

Testing m, r, s, t, v, z, etc. equal to 1

Example N=77

$$(3 \cdot a^2 - 77)$$

$$A = a^2 + r \cdot a = 77 - [3 \cdot a^2 - 77]$$

$$B = a^2 + s \cdot a = [3 \cdot a^2 - 77] - [77 - [3 \cdot a^2 - 77]]$$

$$[[3 \cdot a^2 - 77] - [77 - [3 \cdot a^2 - 77]]] - [77 - [3 \cdot a^2 - 77]] = a^2 + t \cdot a$$

$$t = 1$$

This conjecture has been posted on

mersenneforum.org

forum.ubuntu-it.org/

www.matematicamente.it/forum/

inforge.net/xi/

Hopefully I did not make errors.

Alberico Lepore 20 Dicembre 2017

contact twitter [@albericolep](https://twitter.com/albericolep)

mail: albericolepore@gmail.com