

abstract

ARITHMETIC COMBINATORICS

Topic:

Speaker:

Affiliation:

Date:

Time/Room:

Let A be subset of $\{1, \dots, n\}$. We say that A is square sum-free if the sum of any two different elements of A is not a square.

Erdos and Sarkozy asked whether a square sum-free set can have more than $n(1/3 + \epsilon)$ elements (motivated by the sequence 1, 4, 7, 10...). Answering this, Massias constructed a square sum-free set of density $11/32$.

In this talk, we show that $11/32$ is, in fact, the sharp bound. Joint work with A. Khalfalah.