

Publicationes Mathematicae Debrecen Year: 2023 Vol.: 103 Fasc.: 3-4

Title: On the Diophantine equation $F_{n_1} + F_{n_2} + F_{n_3} = p_1^{z_1} \cdots p_s^{z_s}$

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Let F_n denote the n -th Fibonacci number, and p_i the i -th prime number. In this paper, we consider the Diophantine equation $F_{n_1} + F_{n_2} + F_{n_3} = p_1^{z_1} \cdots p_s^{z_s}$ in non-negative integers $n_1 \geq n_2 \geq n_3 \geq 0$ and non-negative integers z_i with $1 \leq i \leq s$. In particular, we completely solve the case that $s = 12$.

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