

Problem I.6

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Multiples of 4 from the first 50 Fibonacci numbers: [8, 144, 2584, 46368, 832040, 14930352, 267914296, 4807526976]

The percentage of the first 100,000 Fibonacci numbers that are even is 33.33%.

In the terms of the sequence $1/3$ of the terms can be divided by 2, almost $1/4$ of the terms can be divided by 3, $1/6$ of the terms can be divided by 4, almost $1/5$ of the terms can be divided by 5. Then, 6, 9, 12, 16, 18, and 24 each divide $1/12$ of the terms, which is given to the fact that almost $1/4$ of the terms are divisible by 3 and $1/3$ of the terms are divisible by 2. When testing if the terms are multiples of both 2 and 3, the percentage was $1/12$ which coincides with 6, 9, 12, 16, 18, and 24.