What I've Learned From Project Euler

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Contents

1 Problems

In this section of the document, I'll discuss how I solved each of the different equations. Here is a list of solutions I'm especially pleased with:

- Problem 39

2 Math

2.1 Pythagorean Triples

2.1.1 Generation

Linear Algebra

$$A = \begin{bmatrix} 1 & -2 & 2 \\ 2 & -1 & 2 \\ 2 & -2 & 3 \end{bmatrix} \quad B = \begin{bmatrix} 1 & 2 & 2 \\ 2 & 1 & 2 \\ 2 & 2 & 3 \end{bmatrix} \quad C = \begin{bmatrix} -1 & 2 & 2 \\ -2 & 1 & 2 \\ -2 & 2 & 3 \end{bmatrix} \tag{1}$$

- Wikipedia - Formulas for generating Pythagorean triples

- Wikipedia - Tree of primitive Pythagorean triples