

N-RN Checking a calculation of a decimal exponent

Task

Alicia and Zara are scientists working together. Alicia uses a calculator to evaluate $3^{1.4}$ and gets an answer of 6.473. Zara thinks for a moment, makes some calculations on paper, and says "That cannot be right, because $3^{1.4}$ must be less than 6."

Find some hand calculations which show that, as Zara says, $3^{1.4}$ must be less than 6.



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