Place Value Piles

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The Positive Engagement Project

Making a difference...not a dollar.

Teaching Expanded Form Pile By Pile

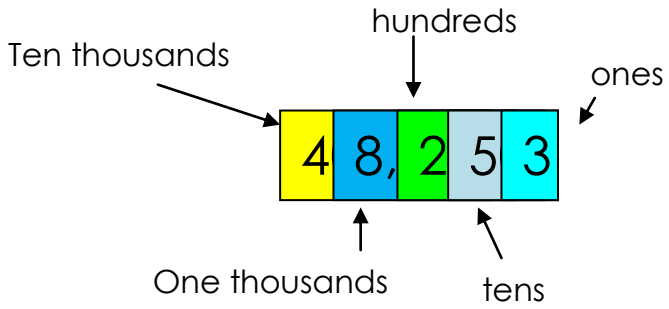
Place Value Piles

The Positive Engagement Project created **Place Value Piles** to give students a hands-on visual that helps them comprehend both expanded form and expanded form with exponents. Before students can really connect expanded form, it is important that they have a genuine understanding of place value. **Place Value Piles** is intended to do both: teach place value and expanded form!

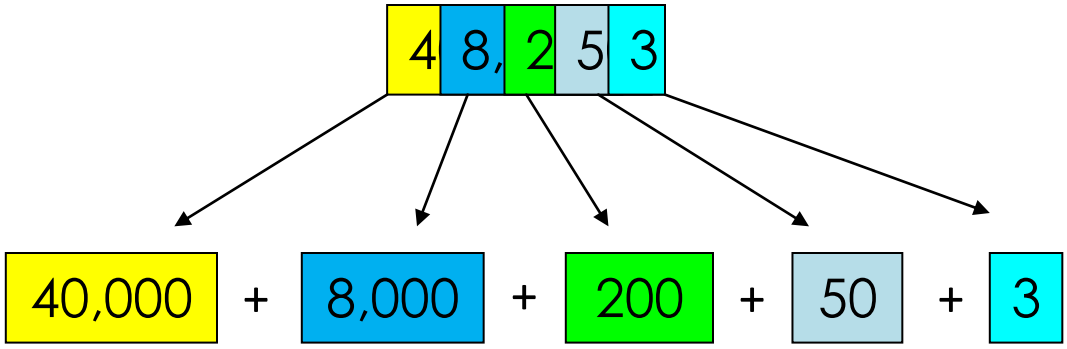
How do I use Place Value Piles?

Depending on how you use the piles, as a teacher demonstration, hands on center, or in depth group exploration, we suggest that you print the place values pile cards in color (pages 4 to 21) or run them on colored paper (pages 23 to 39). For durability purposes, be sure to laminate them.

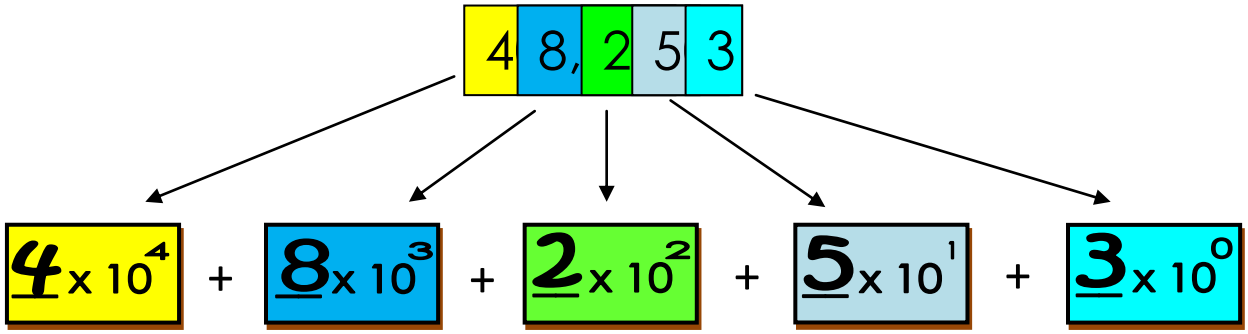
The idea of the cards is that you can pile one number from each place value position to create a number. Each place value has an assigned color.



As you take the cards apart, expanded form comes to life as a visual representation.

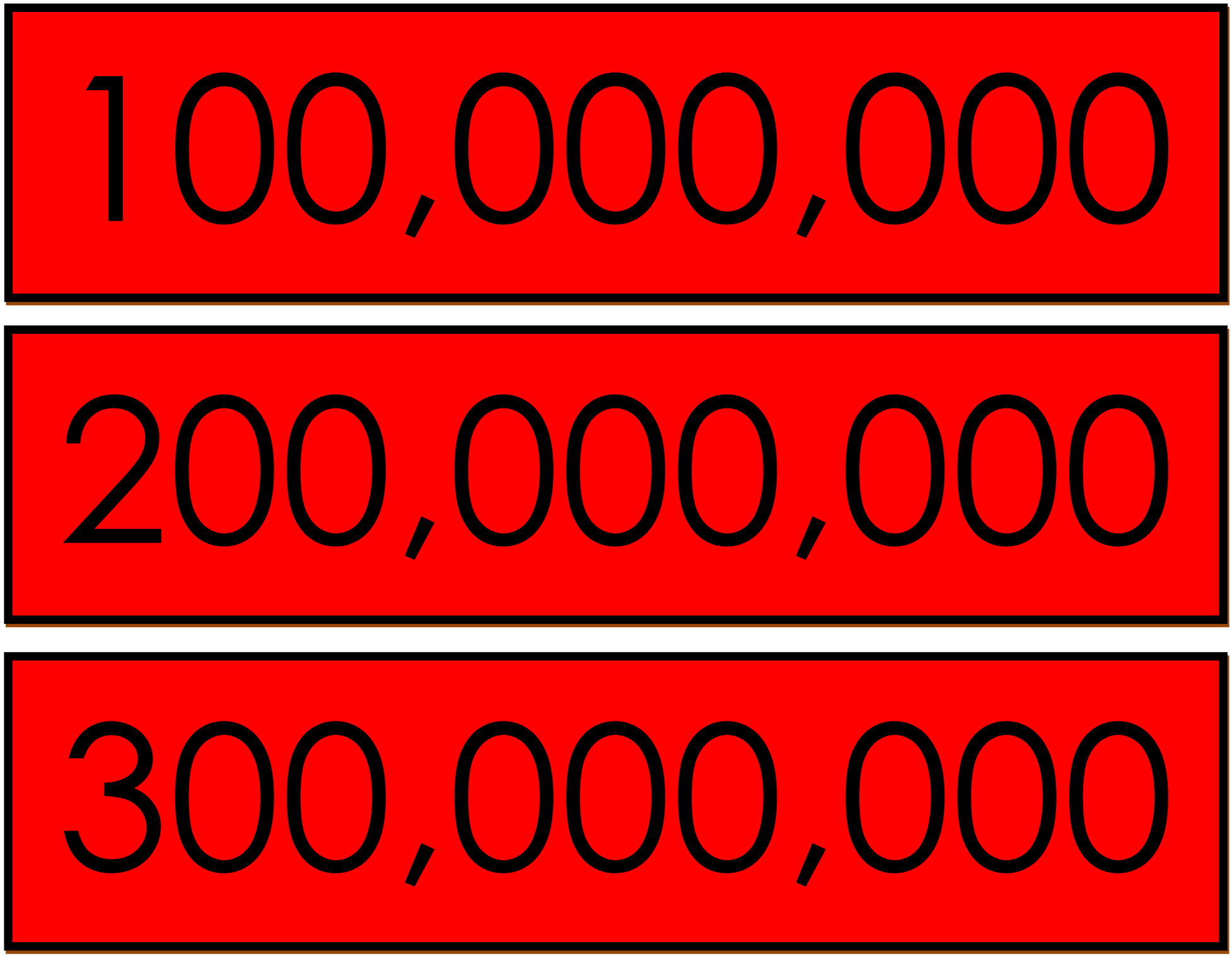


We have also added exponent cards for grade levels that have to expand a number with exponents. Let's use the same number as before.



The exponent cards have a blank place for your students to write the proper digit (so be sure to laminate them and use a dry erase marker). The colors for each exponent card match the place value color.

Place Value Piles helps students understand and write a given number in expanded form or expanded form with exponents. In which context you let your students use the cards is up to you, so have fun!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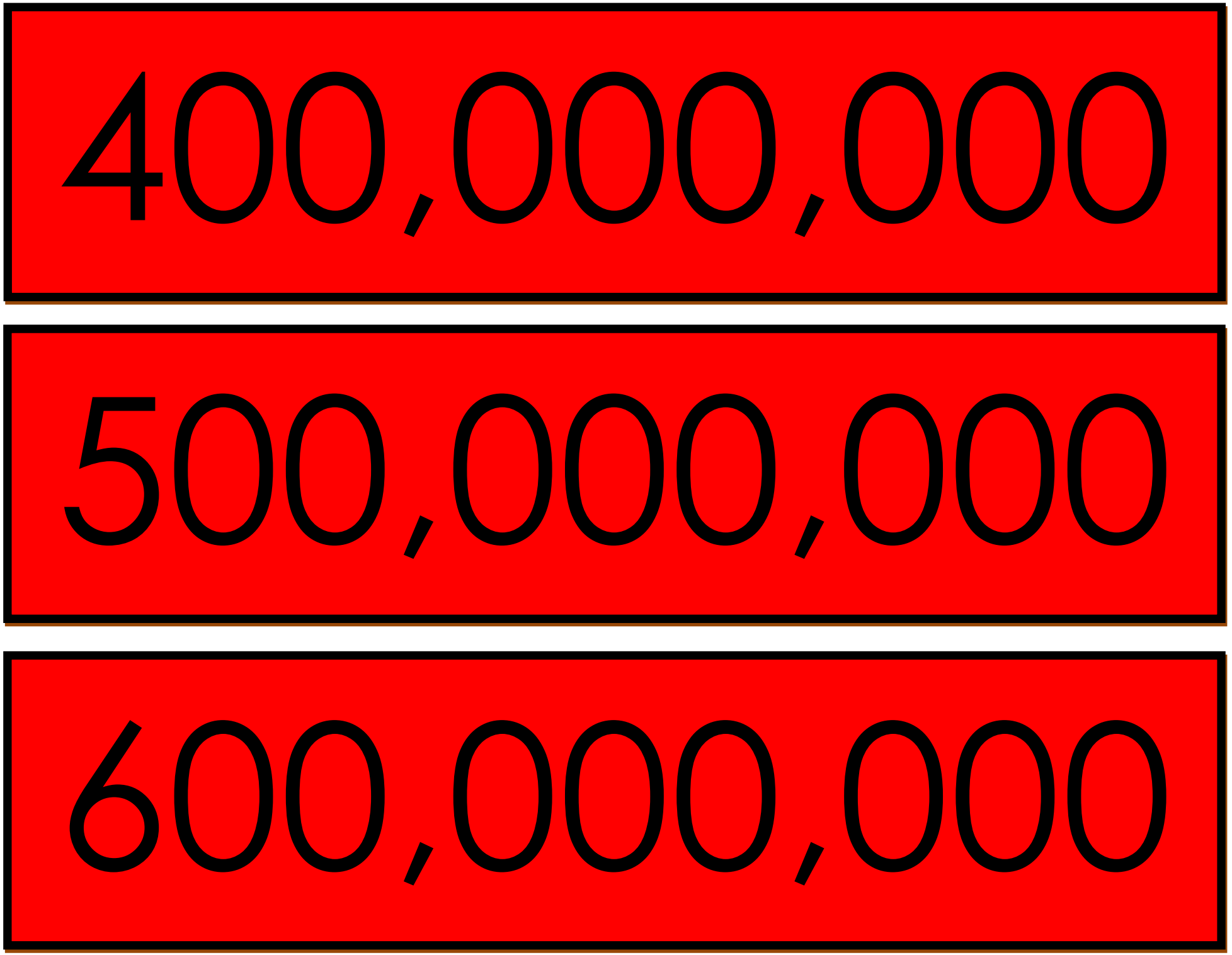
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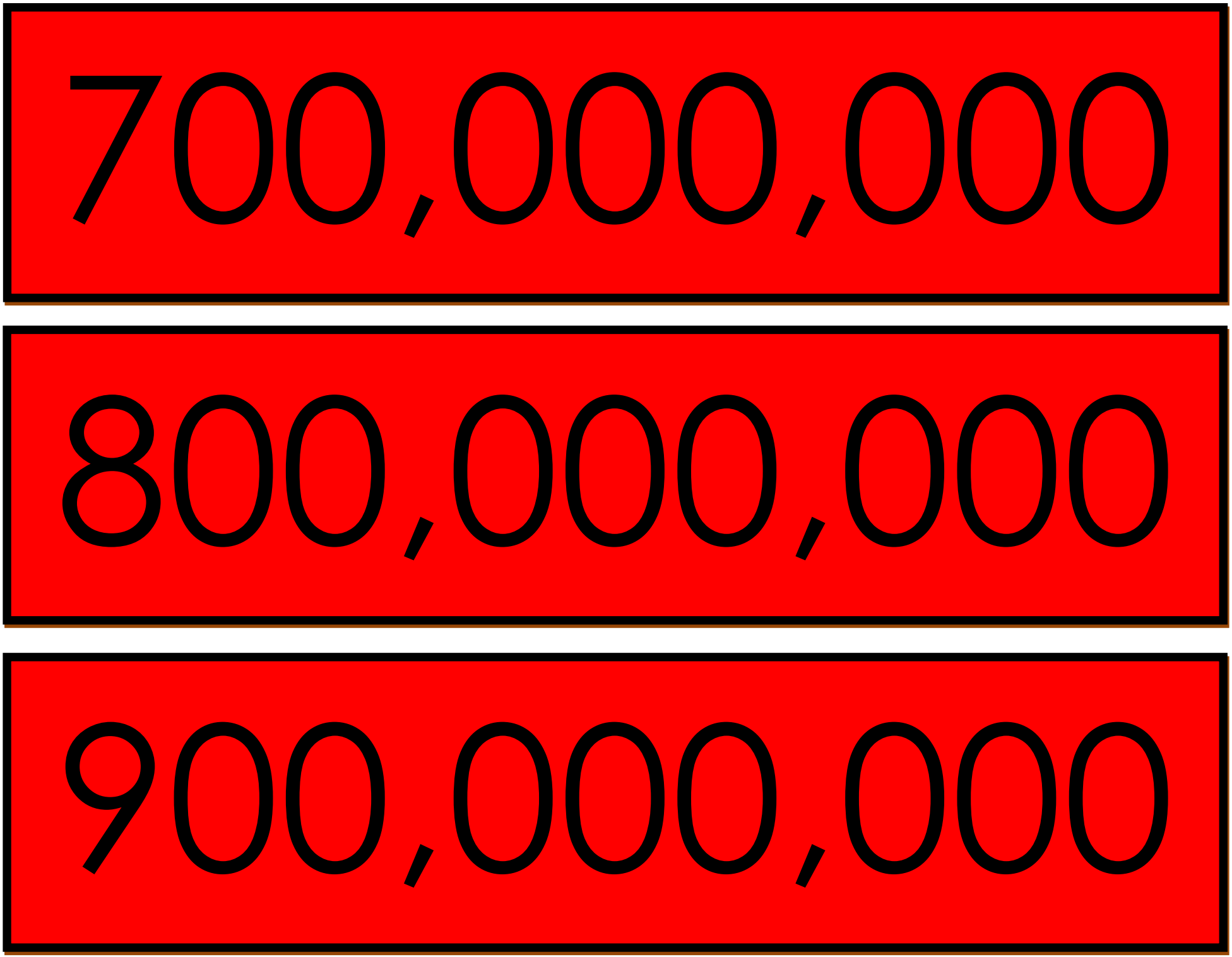
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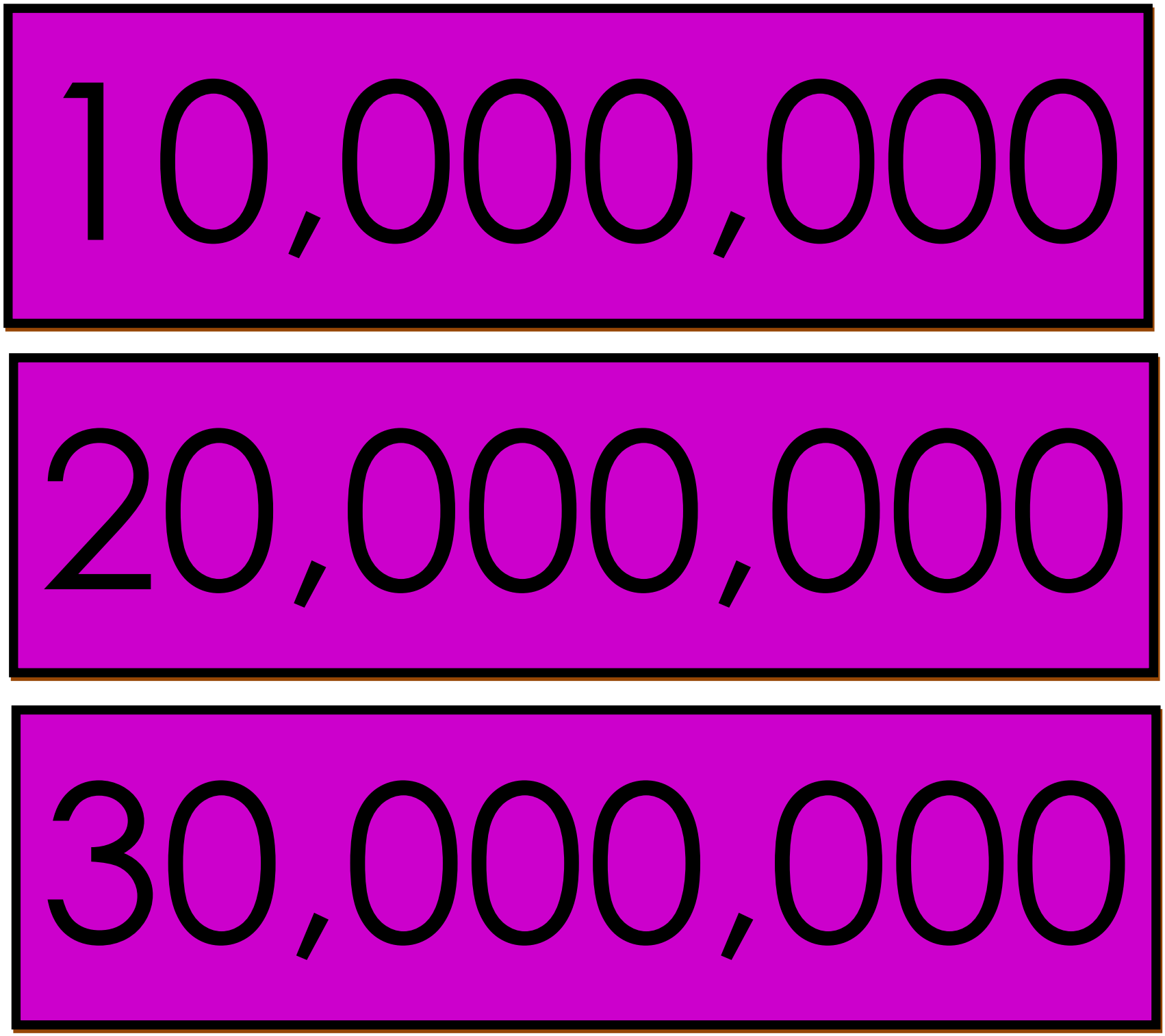
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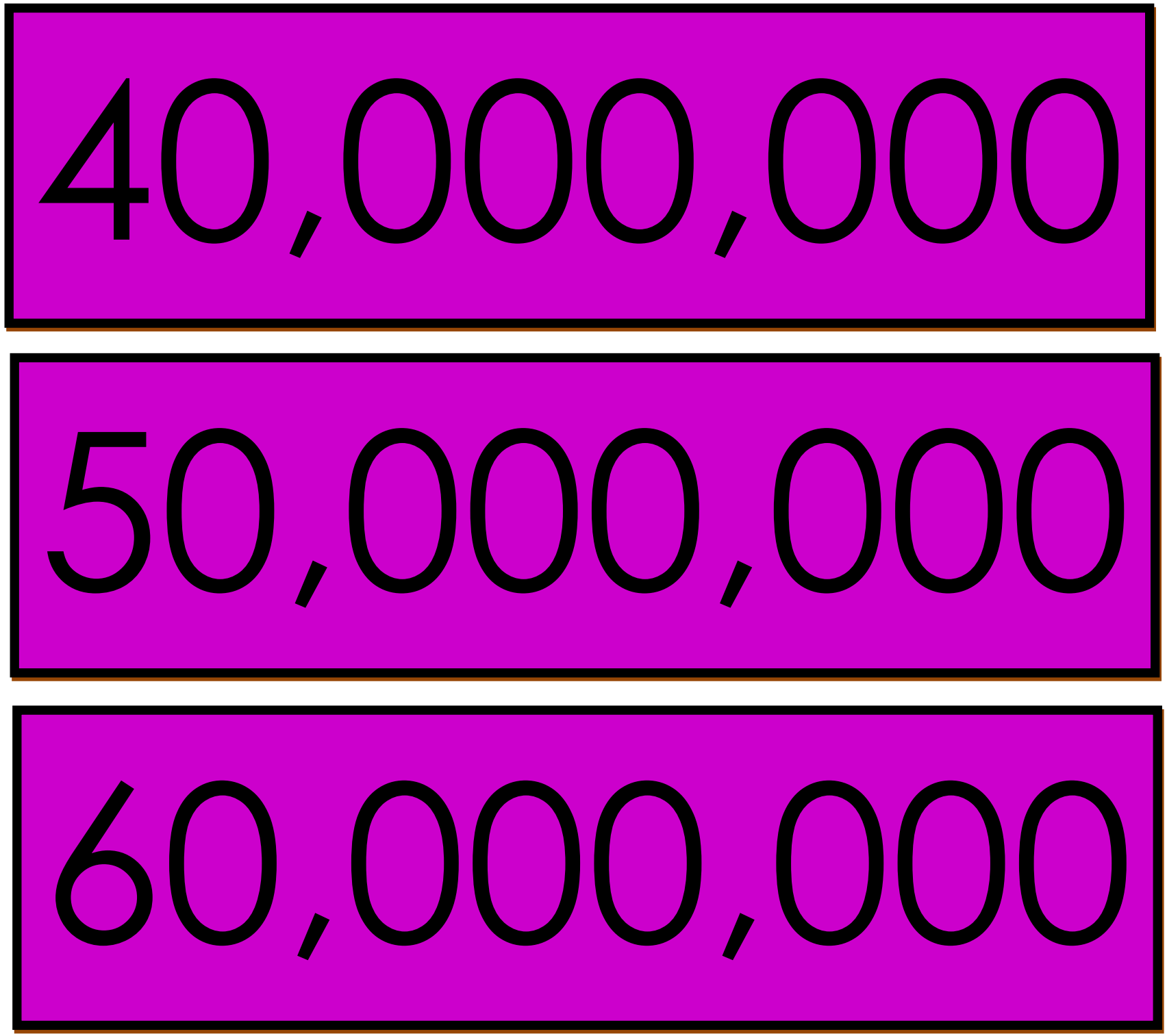
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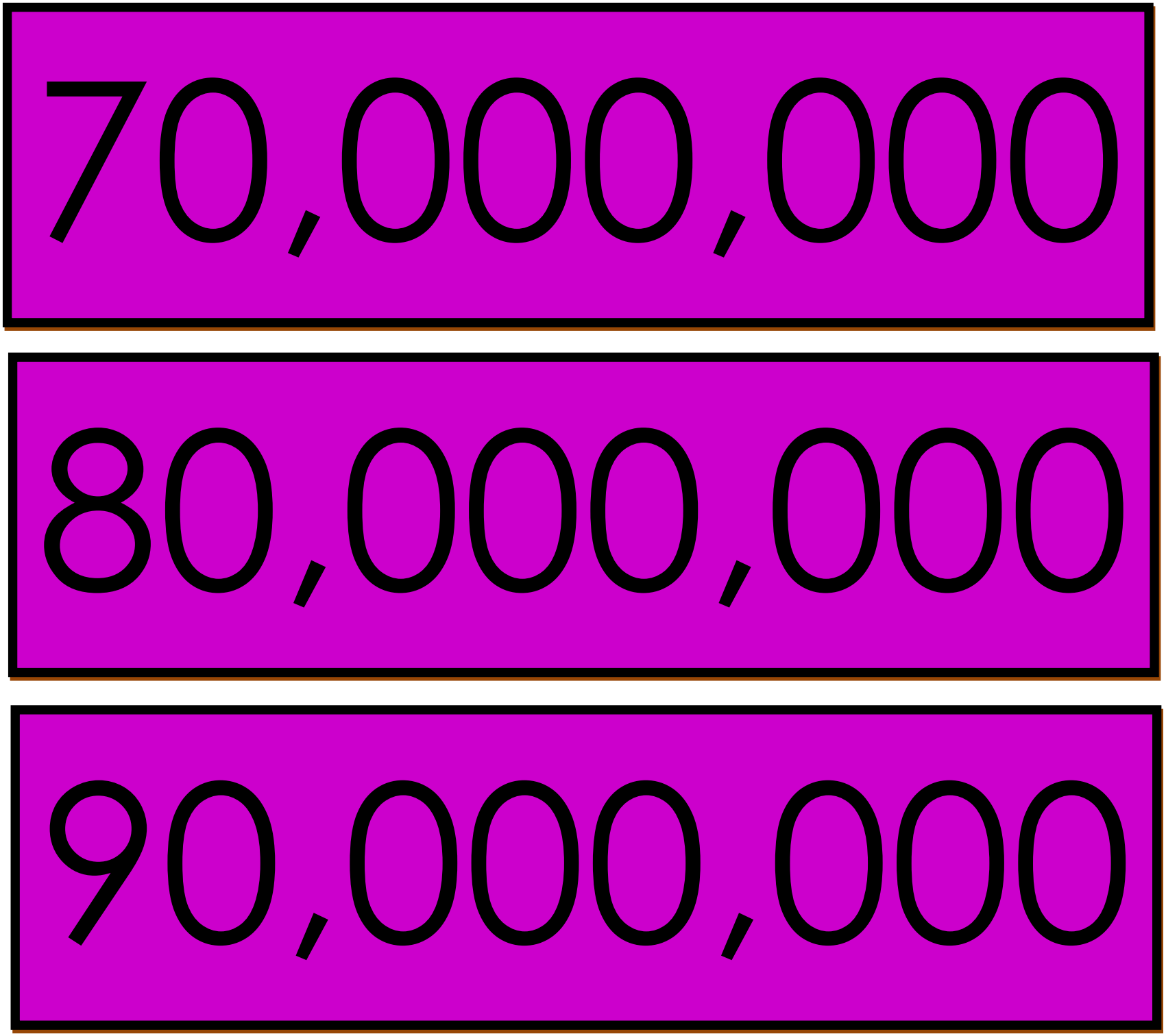
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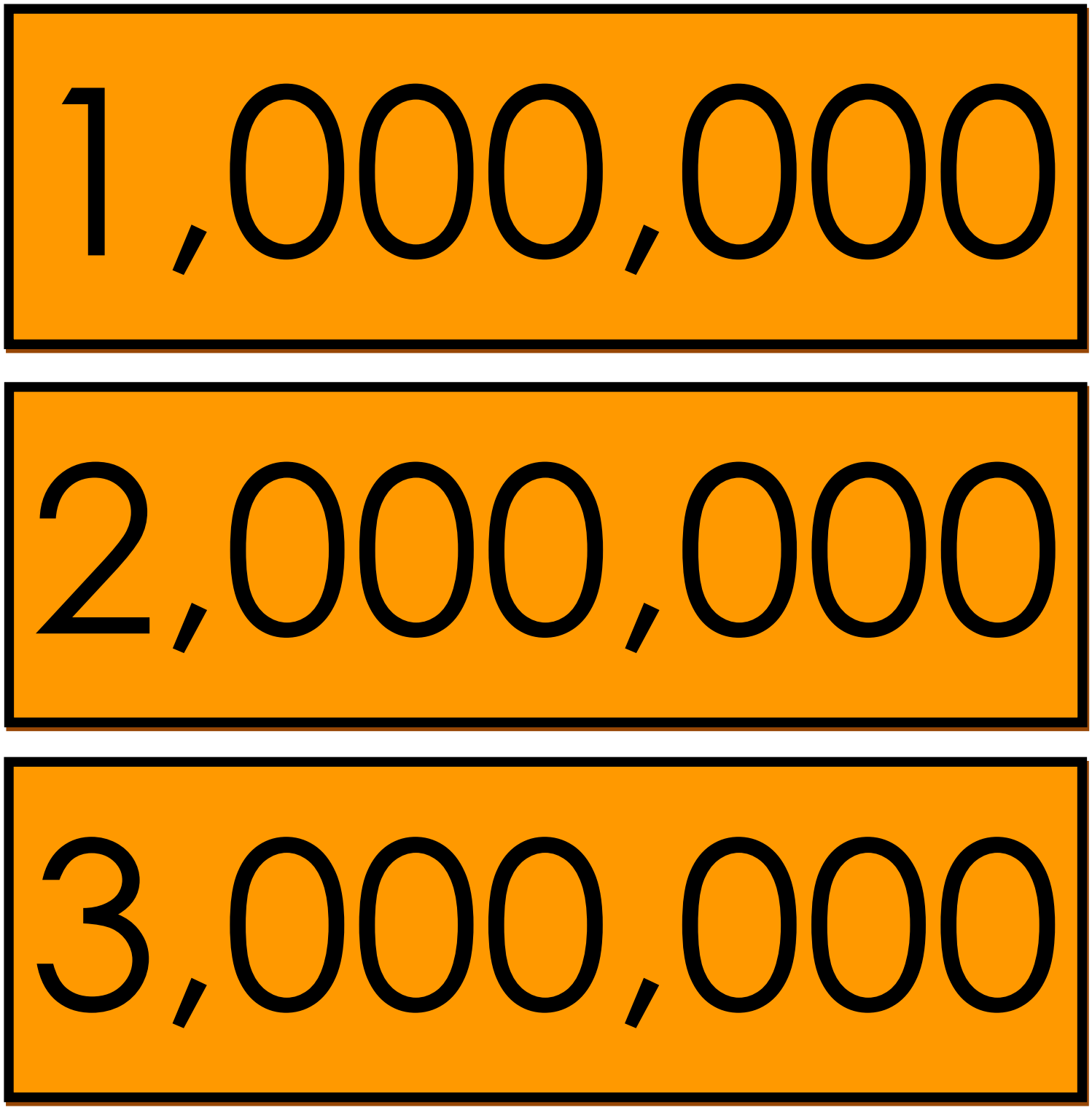
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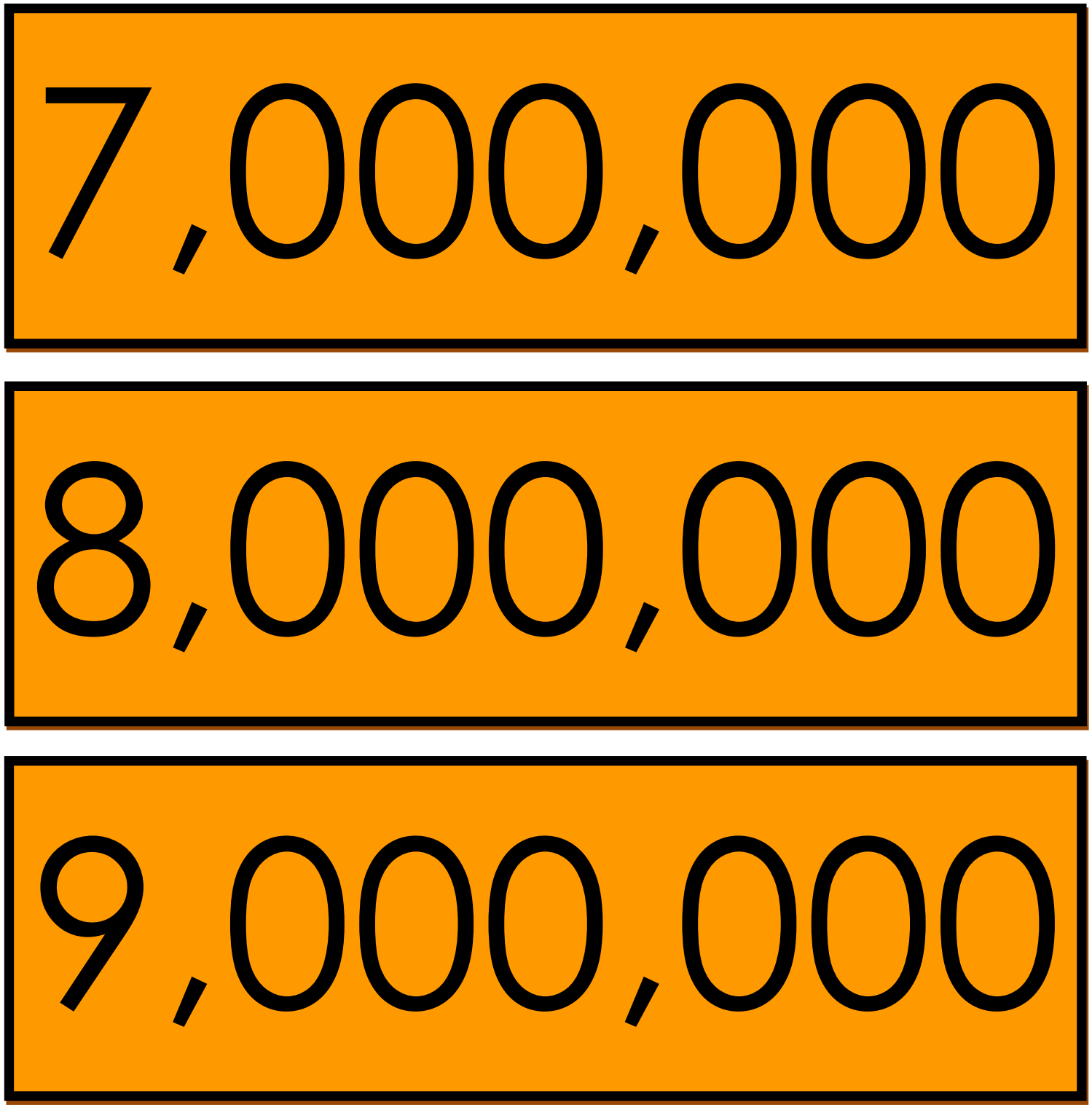
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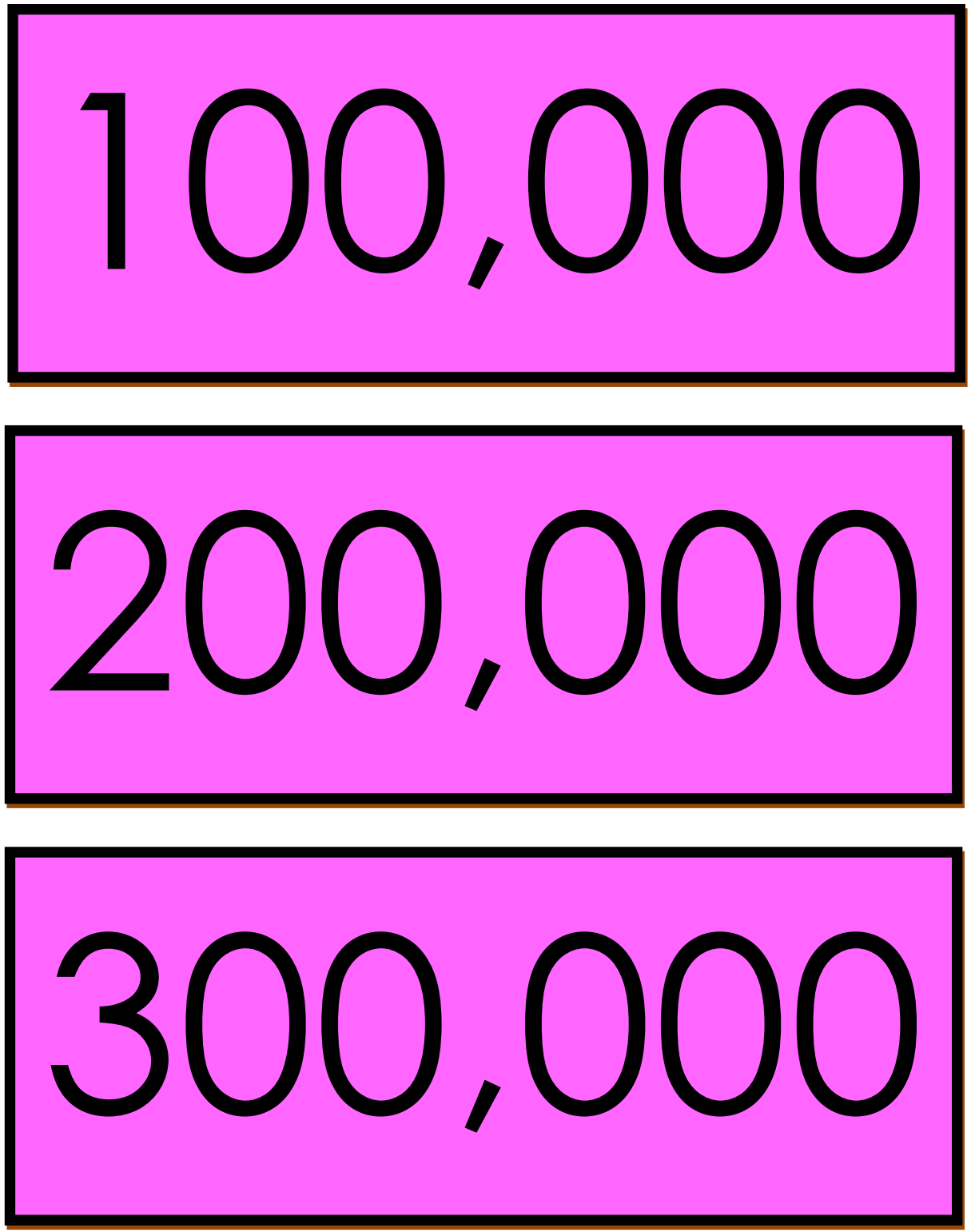
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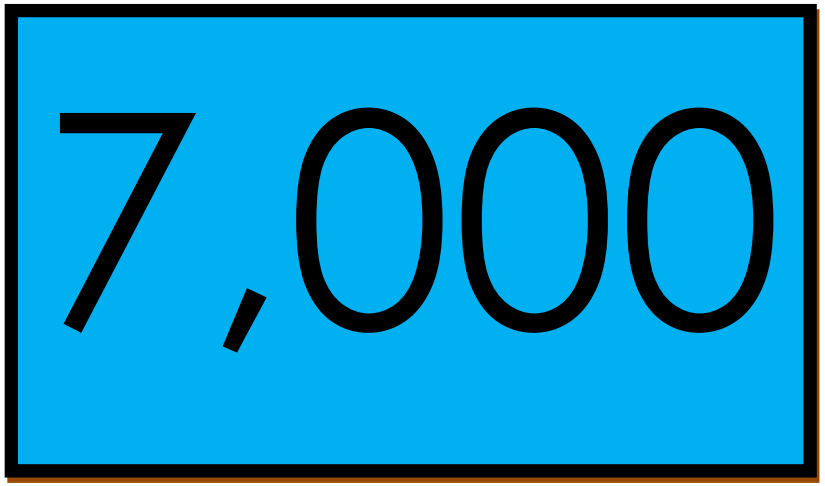
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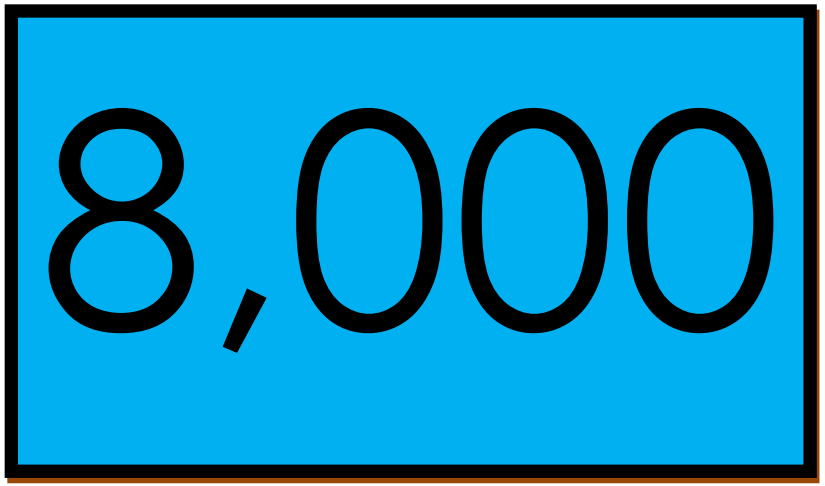
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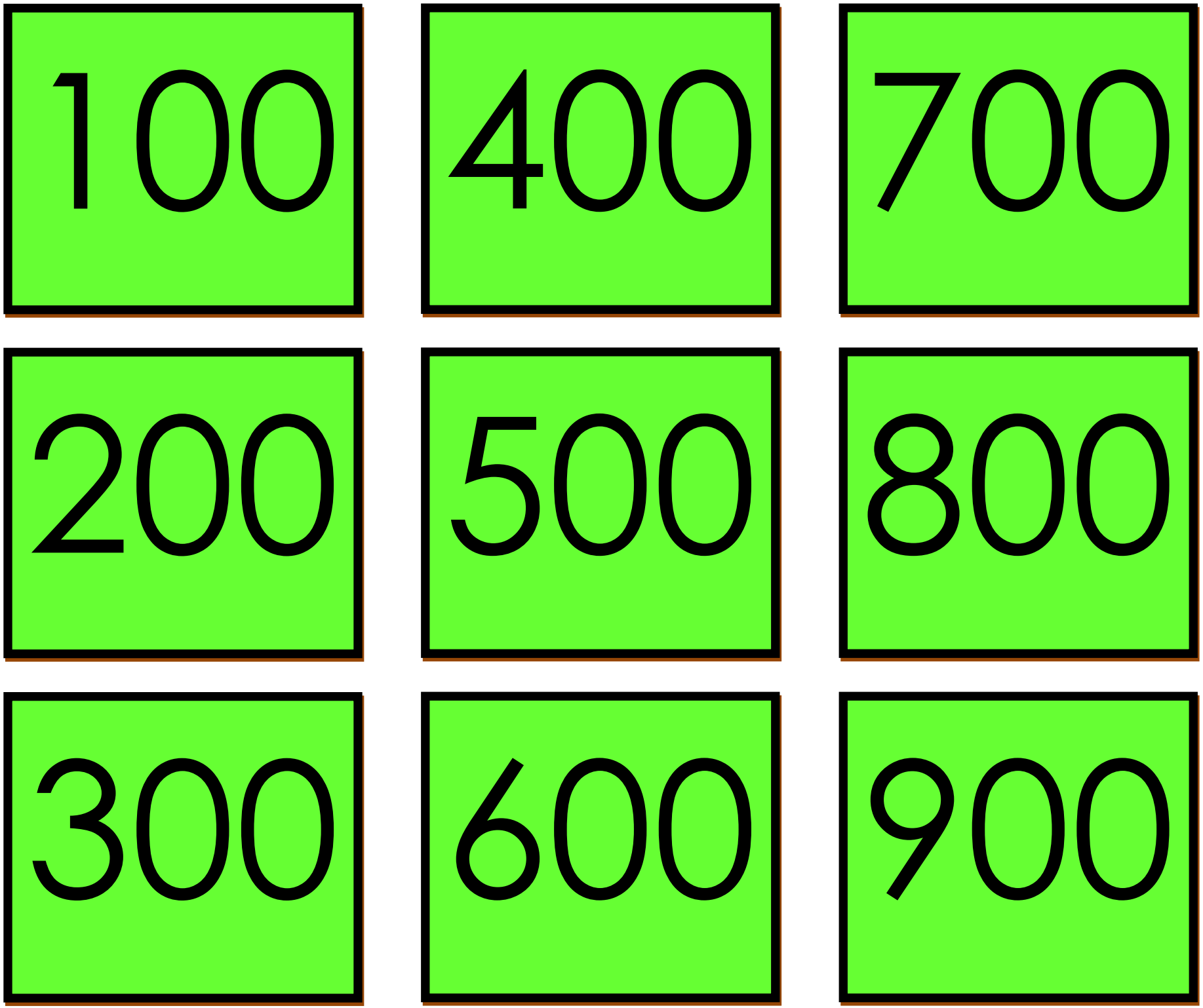
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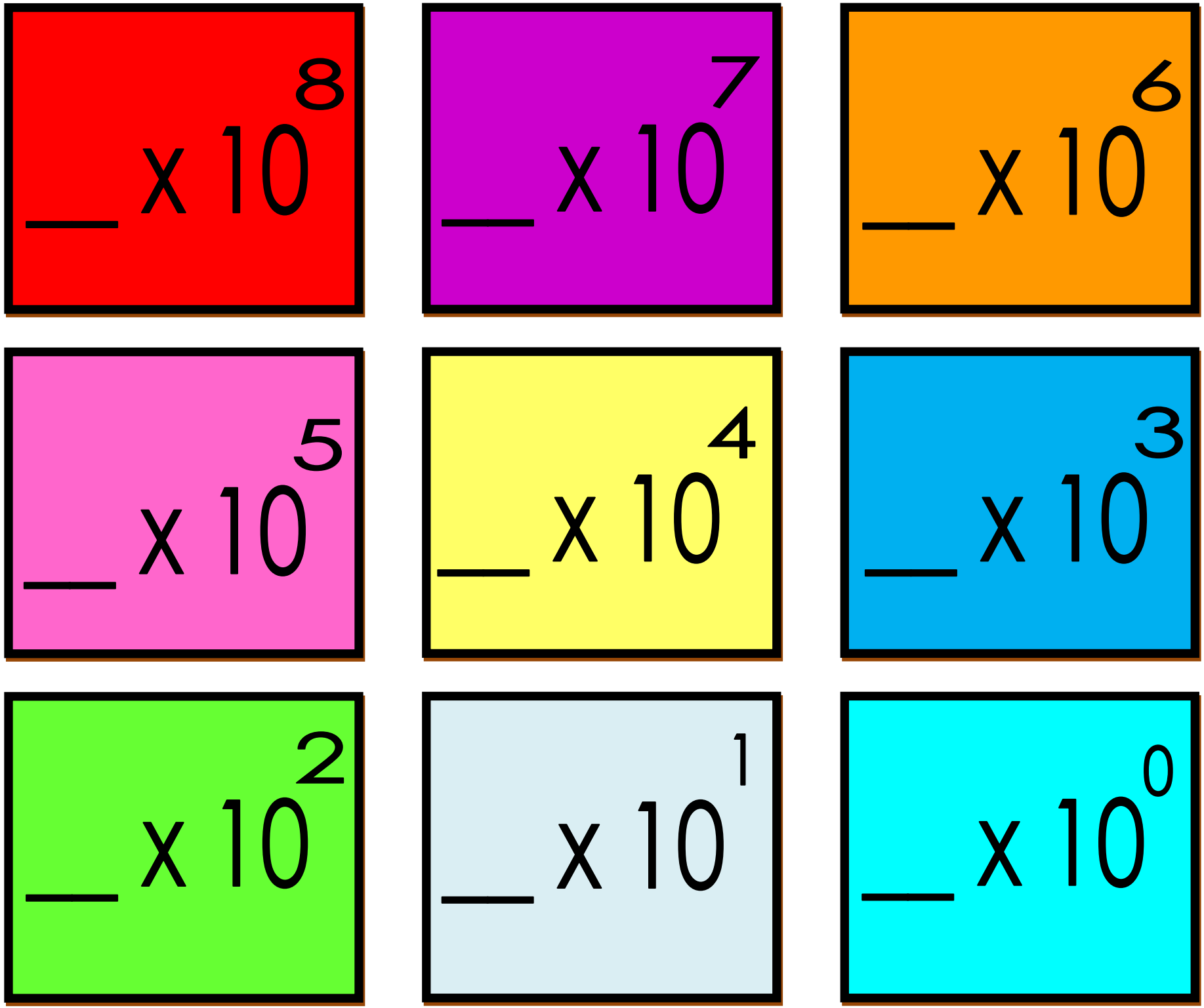
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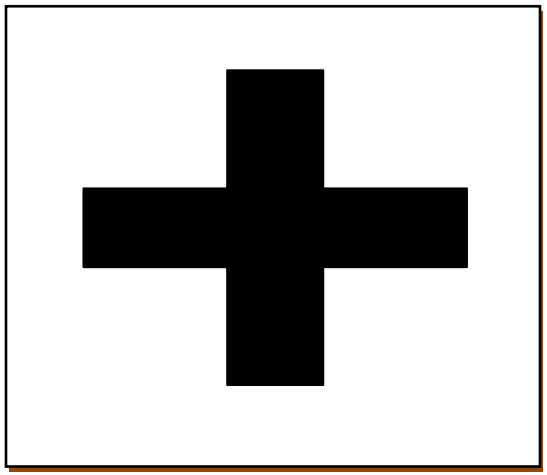
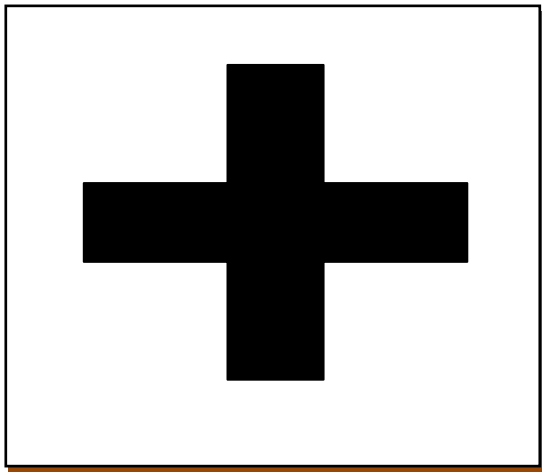
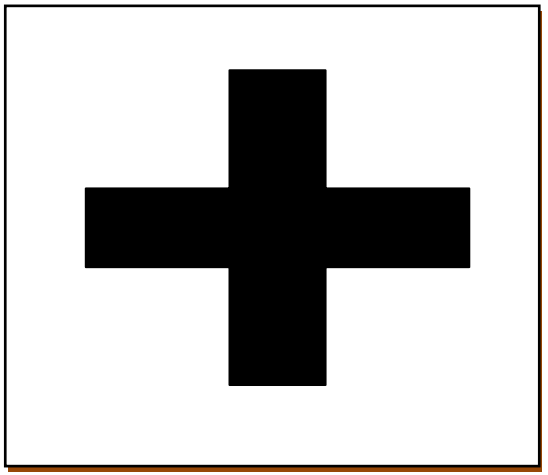
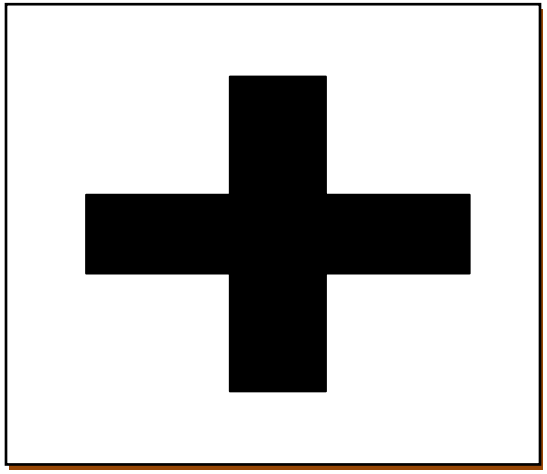
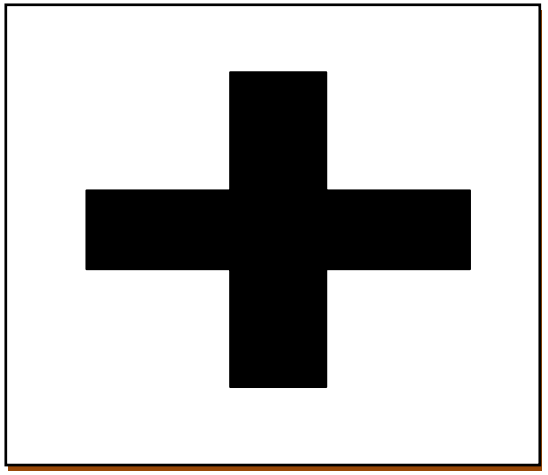
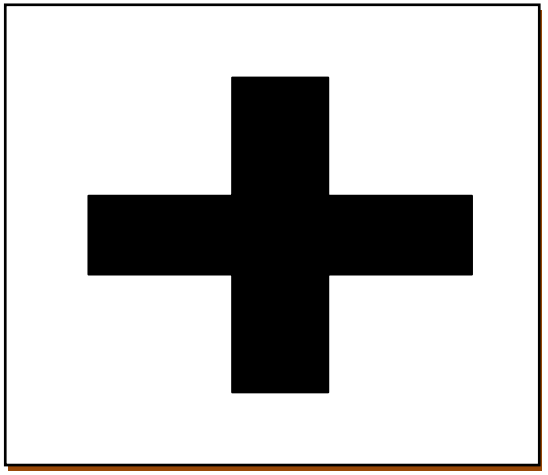
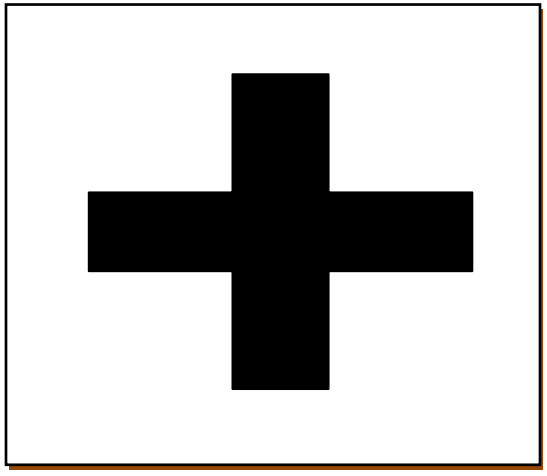
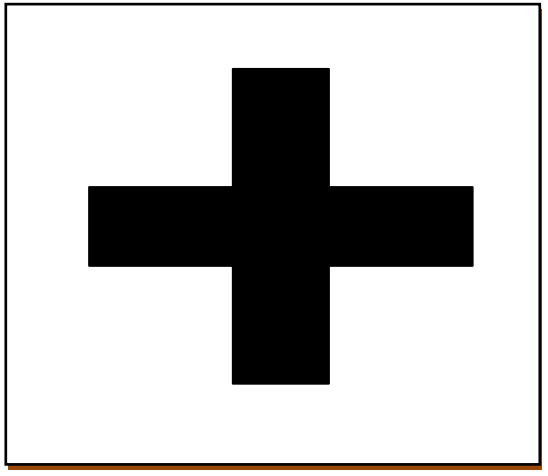
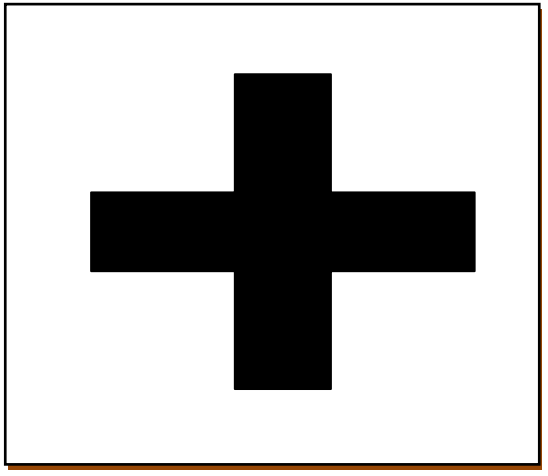

*In case you do not want to print these in color, the next set of cards are all white so you can run them on different colored paper.

NOTE: 10,000S TO THE 1,000S AND 10S TO 1S SHARE ONE PAGE IN THIS PACKET. BE SURE TO CHANGE COLORS AS YOU TRANSITION FROM THOSE TWO PAGES.

The exponents page needs to be printed in color, so try to match your color selections to those nine colors.

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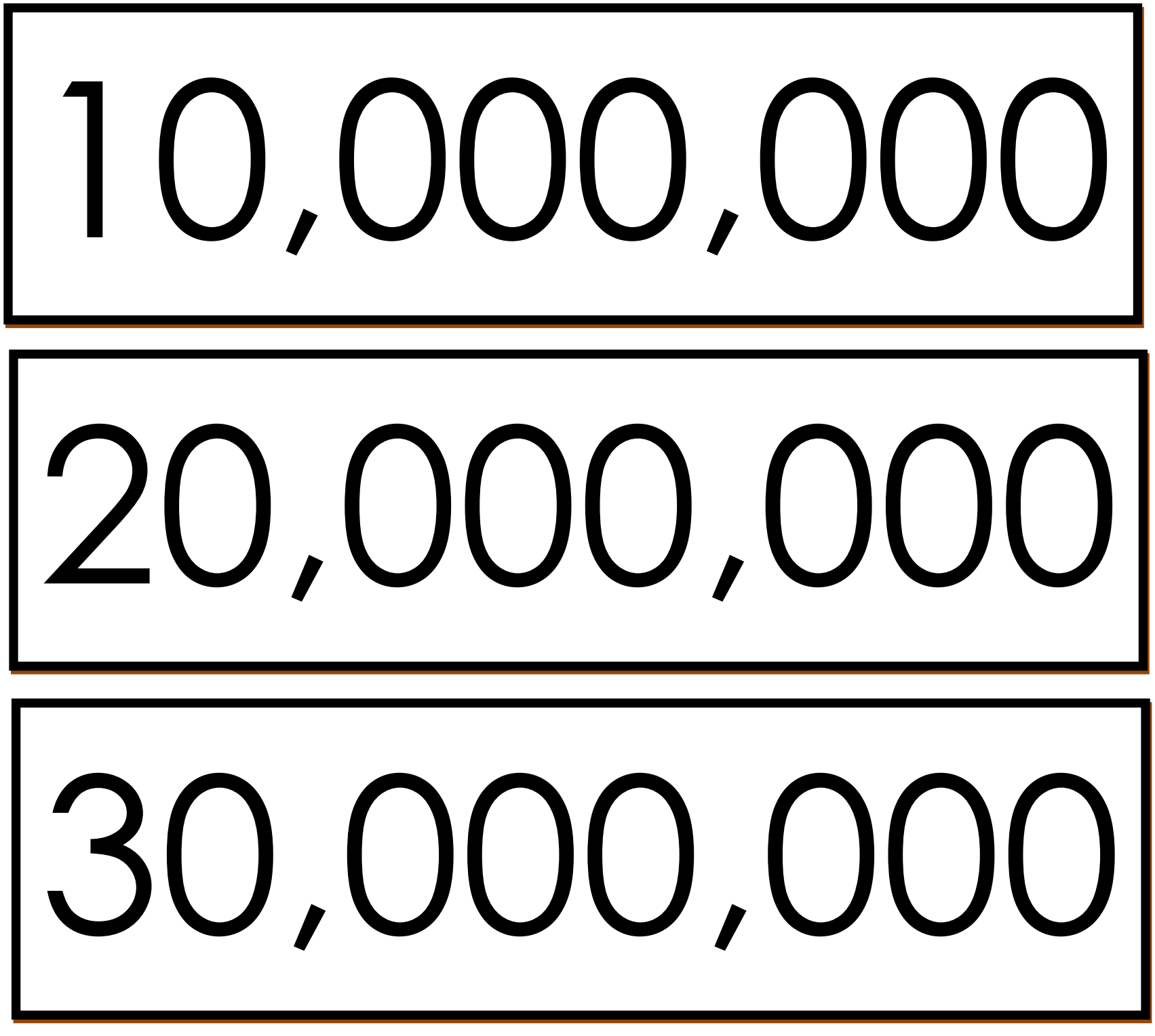
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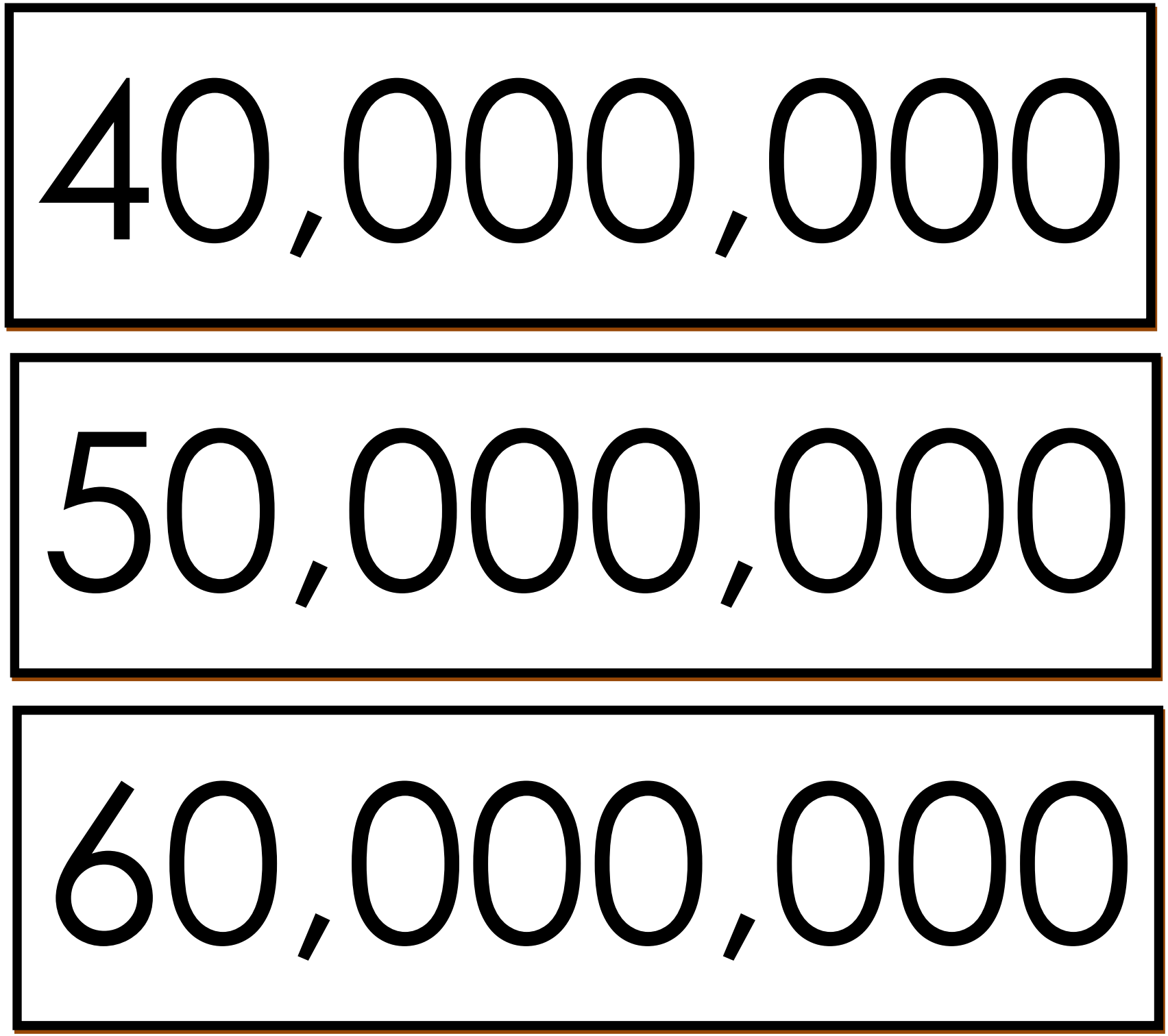
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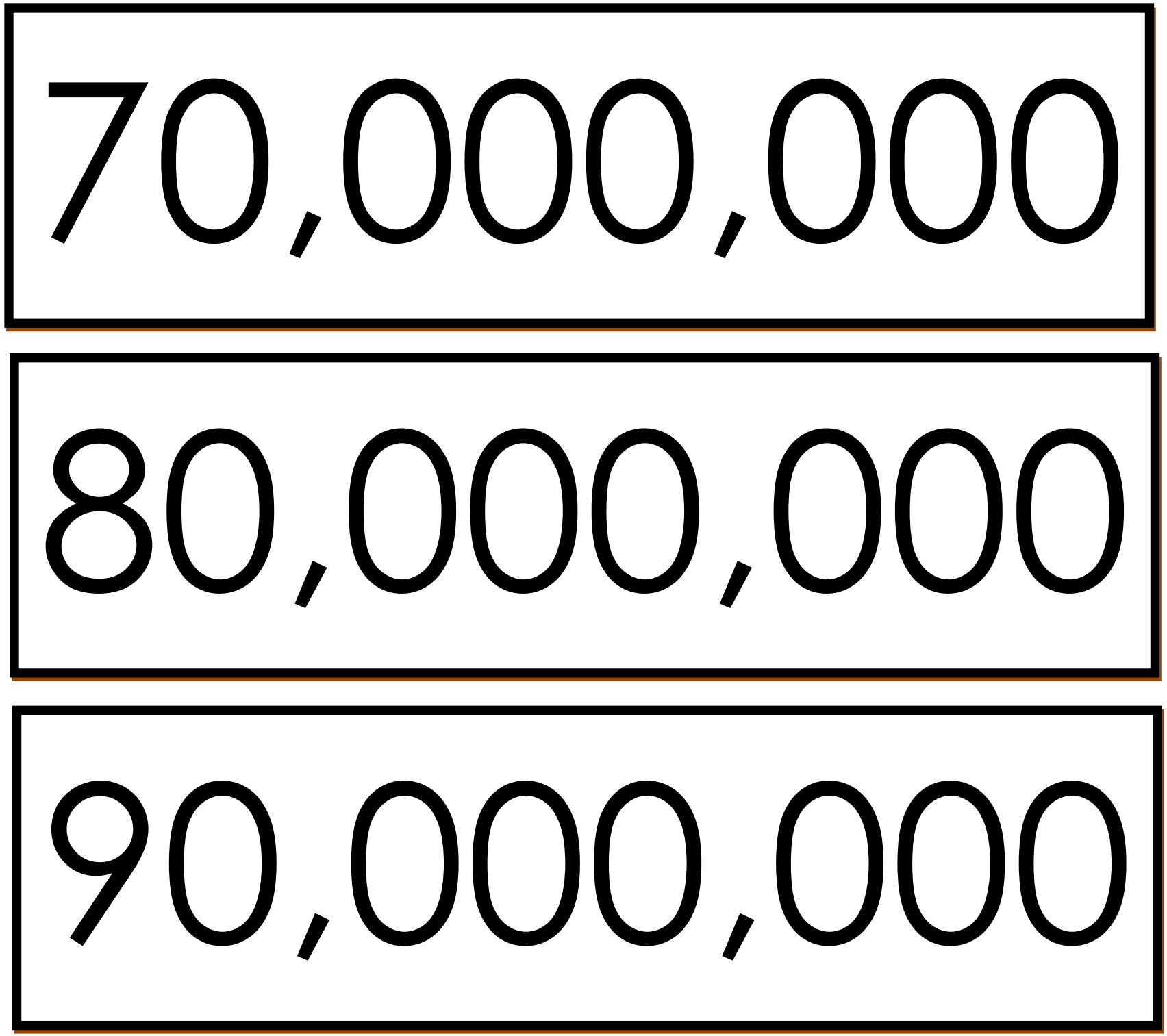
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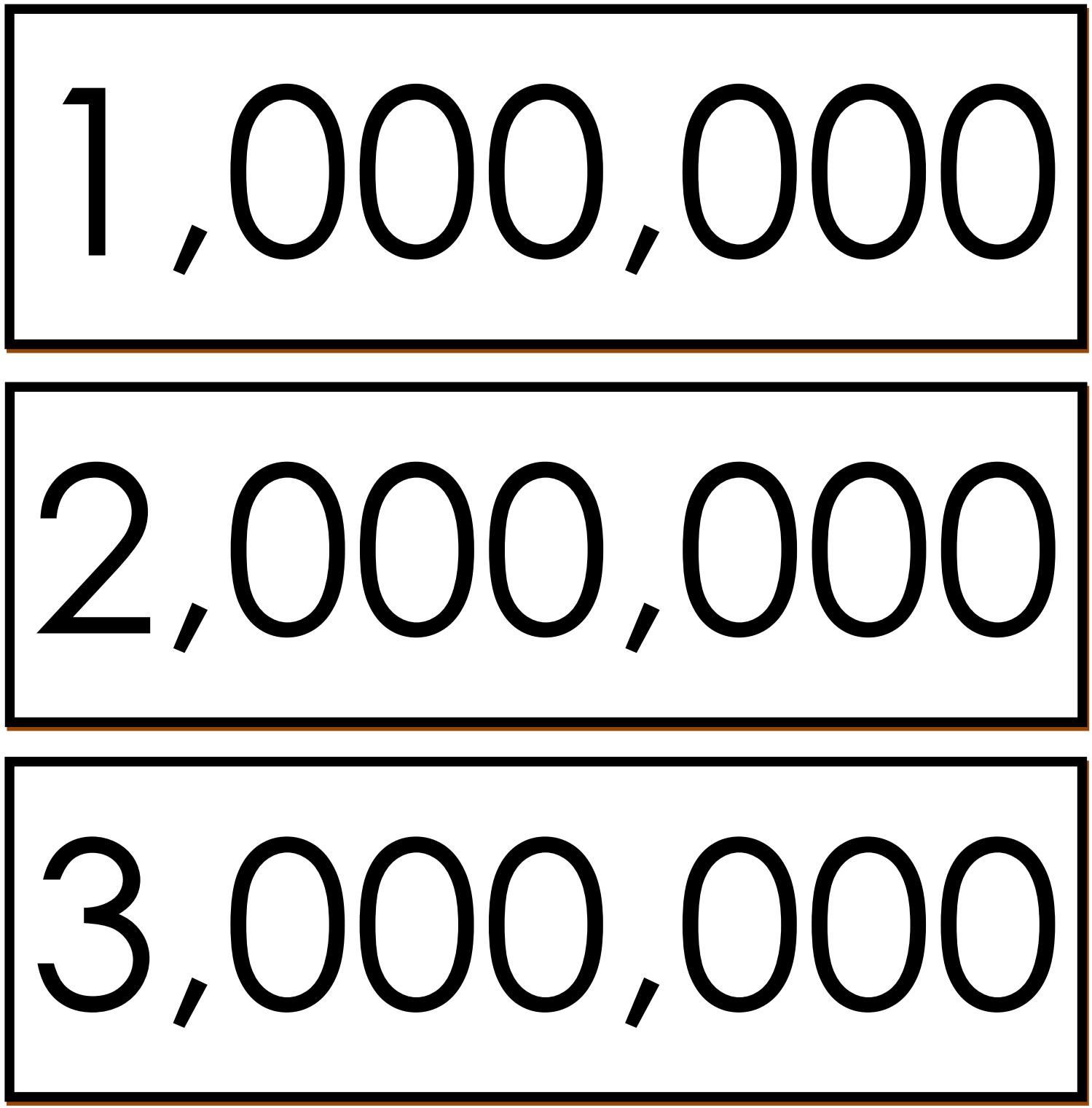
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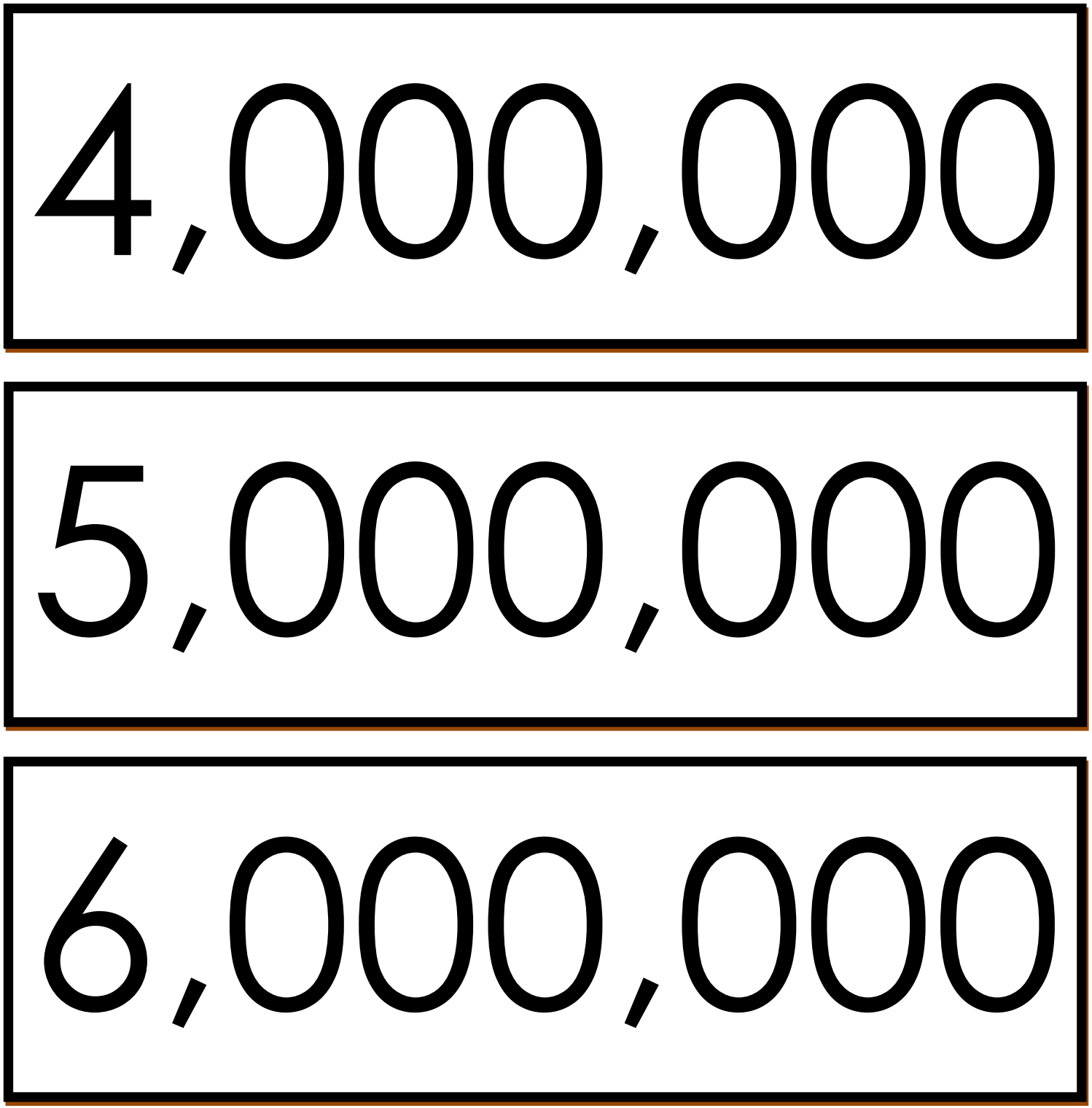
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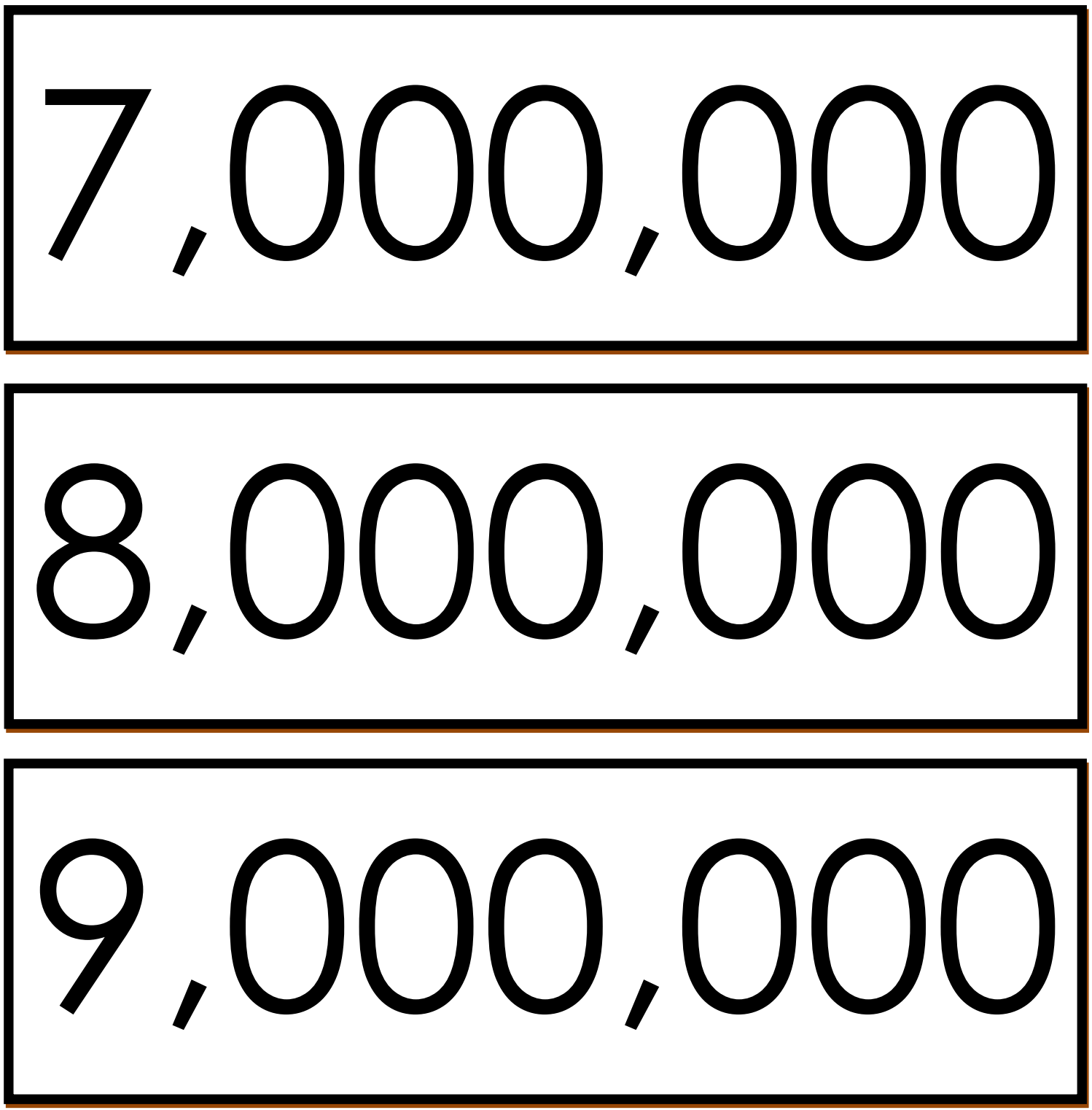
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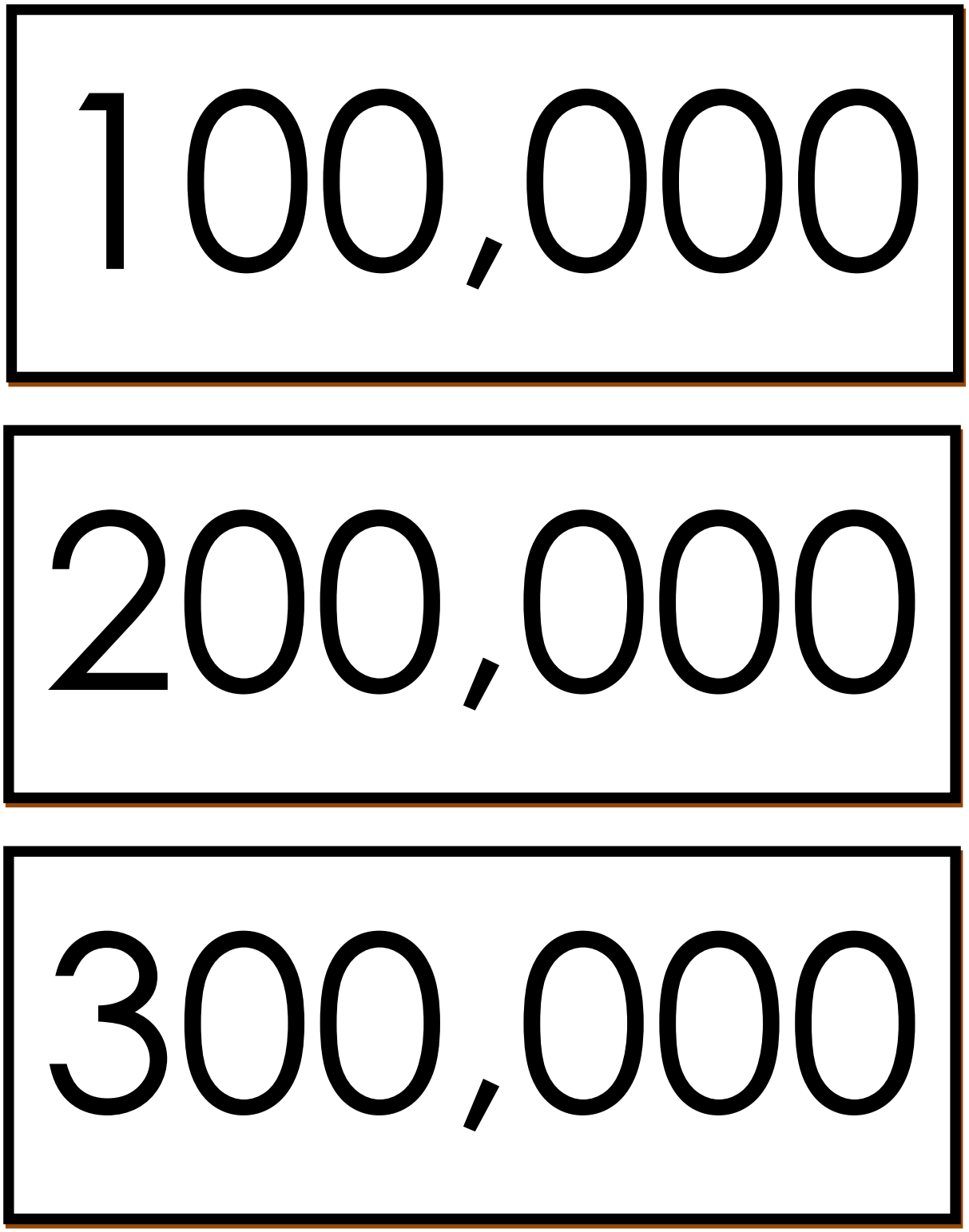
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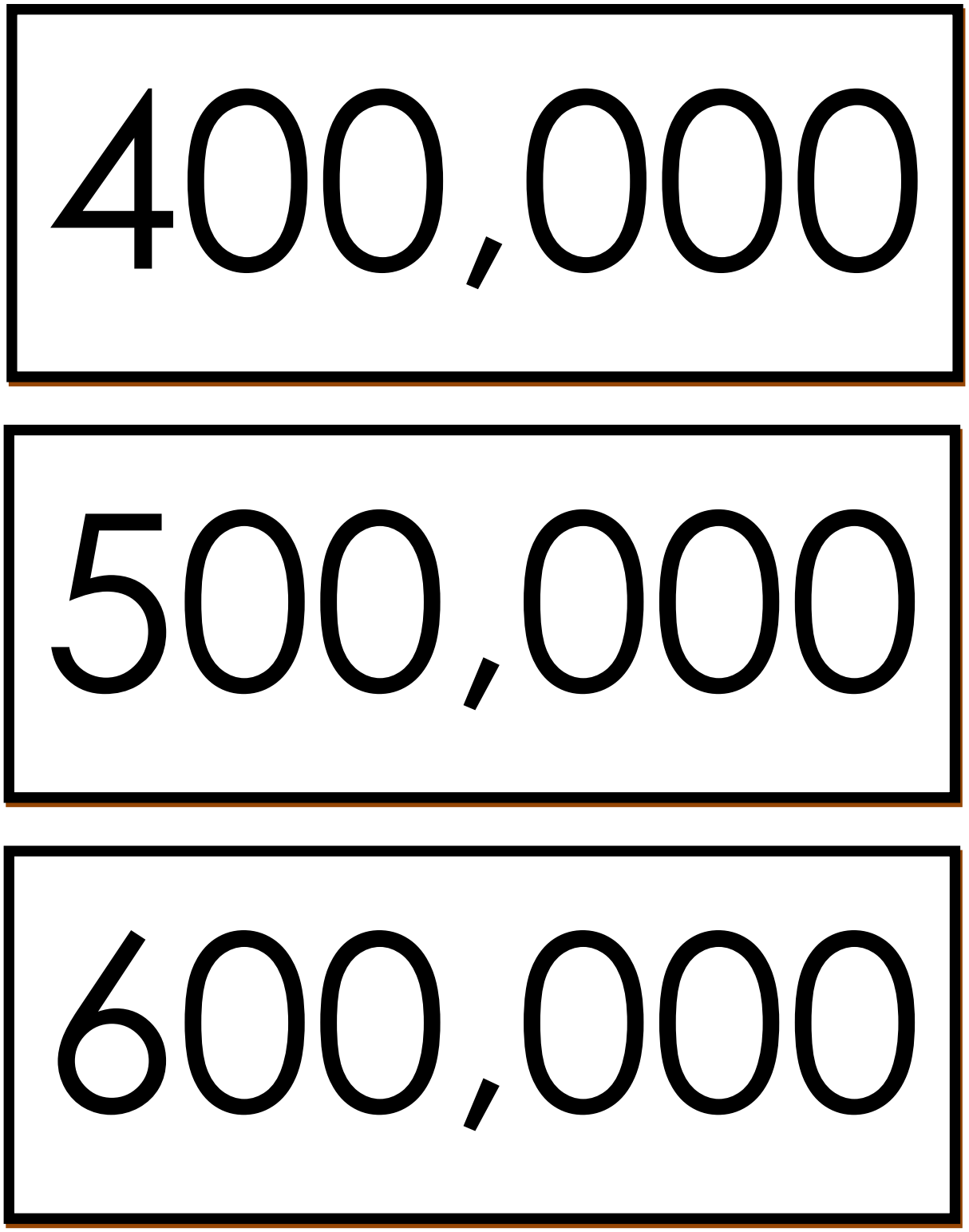
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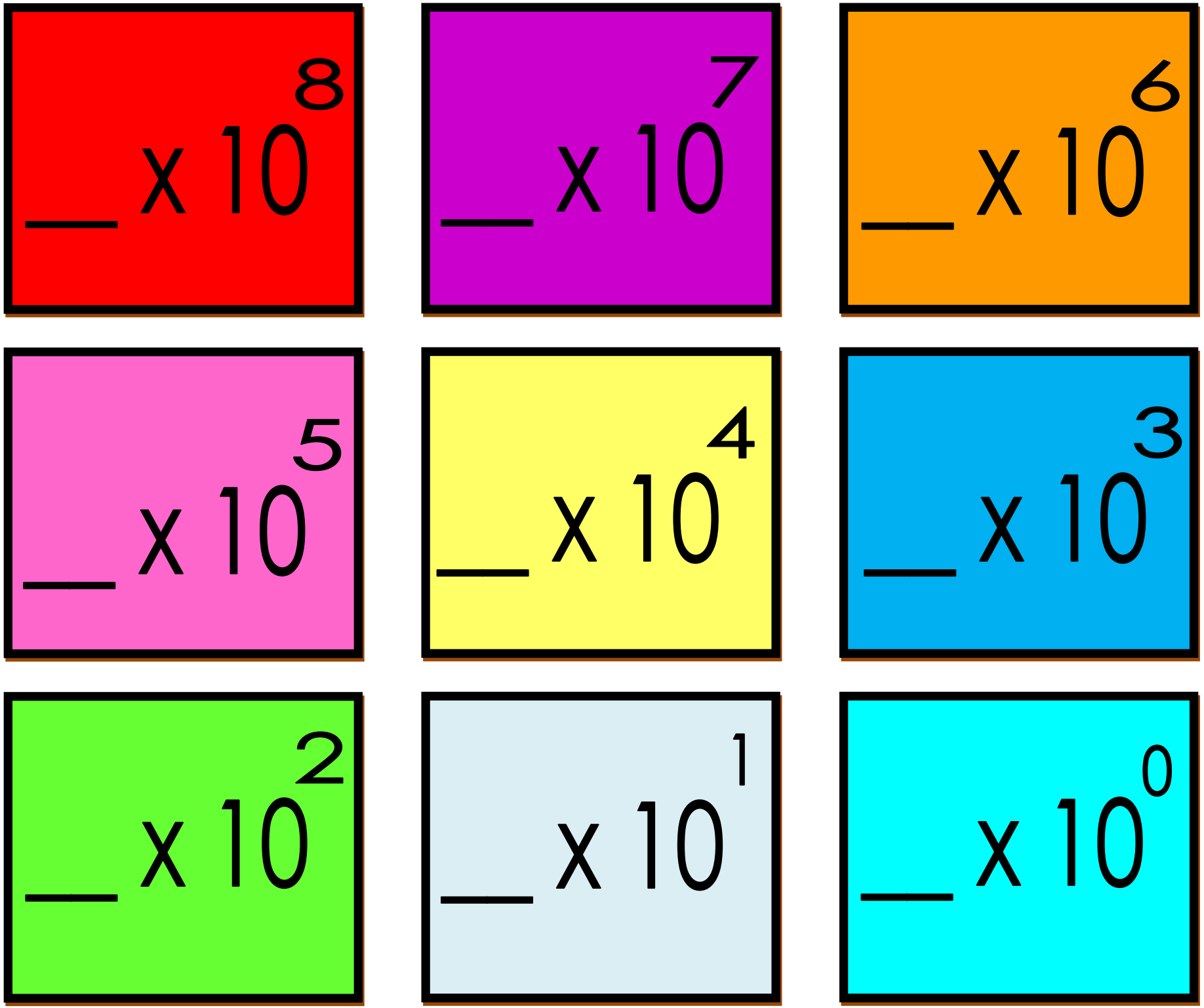
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