

Multiplication HTO x TO using partitioning

Use partitioning to calculate HTO x TO
Estimate and check the answer to a calculation



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|-------------------|-------------------|-------------------|
| 1 a 6×3 | 2 a 7×8 | 3 a 9×6 |
| b 60×3 | b 70×8 | b 90×6 |
| c 60×30 | c 70×80 | c 90×60 |
| d 600×3 | d 700×8 | d 900×6 |
| e 600×30 | e 700×80 | e 900×60 |

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|-------------------|-------------------|-------------------|
| 4 a 4×7 | 5 a 8×9 | 6 a 3×4 |
| b 4×70 | b 80×9 | b 3×40 |
| c 40×70 | c 80×90 | c 30×40 |
| d 4×700 | d 8×900 | d 3×400 |
| e 40×700 | e 80×900 | e 30×400 |

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|-------------------|-------------------|-------------------|
| 7 a 9×7 | 8 a 8×6 | 9 a 5×7 |
| b 9×70 | b 80×6 | b 50×7 |
| c 90×70 | c 80×60 | c 50×70 |
| d 9×700 | d 8×600 | d 500×7 |
| e 90×700 | e 80×600 | e 500×70 |



Example

$$263 \times 38 \rightarrow 300 \times 40 = 12\,000$$

$$= (200 \times 38) + (60 \times 38) + (3 \times 38)$$

$$= 7600 + 2280 + 114$$

$$= 9994$$

1 Estimate the answer first, then partition each of these calculations to work out the answer.

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|-------------------|-------------------|-------------------|-------------------|
| a 246×52 | b 428×35 | c 378×46 | d 138×43 |
| e 246×39 | f 561×73 | g 284×57 | h 714×38 |
| i 485×69 | j 385×27 | k 539×64 | l 656×31 |

2 Find the answers to these problems.

- a The school playground has a length of 328 m and a width of 78 m. What is the area?
- b A basketball court has a perimeter of 86 m. If one of the sides is 28 m in length, what is the area of the basketball court?



Challenge 3

For each question, use each of the 5 number cards once. Make a calculation that gives an answer as close as possible to the answer shown.

a

2 3 4 5 6

\times = 10 000

b

1 3 5 7 9

\times = 10 000

c

2 4 5 6 7

\times = 40 000

