

Associative Law of Multiplication (I)

Name: _____

Date: _____

Re-write each expression with different parentheses to change the order of operations.

Example: $(8 \times 5) \times 12 = 8 \times (5 \times 12)$

1. $(6 \times 1) \times 10 =$
2. $10 \times (15 \times 5) =$
3. $(25 \times 8) \times 13 =$
4. $26 \times (9 \times 36) =$
5. $6 \times (40 \times 82) =$
6. $(6 \times 3) \times (12 \times 7) =$
7. $1 \times (15 \times (8 \times 20)) =$
8. $6 \times ((39 \times 22) \times 27) =$
9. $((36 \times 79) \times 64) \times 5 =$
10. $((61 \times 81) \times 29) \times 14 =$

Are the expressions in each question equal? Check a few to confirm.

Associative Law of Multiplication (I) Answers

Name: _____

Date: _____

Re-write each expression with different parentheses to change the order of operations.

Example: $(8 \times 5) \times 12 = 8 \times (5 \times 12)$

- $(6 \times 1) \times 10 = 6 \times (1 \times 10)$
- $10 \times (15 \times 5) = (10 \times 15) \times 5$
- $(25 \times 8) \times 13 = 25 \times (8 \times 13)$
- $26 \times (9 \times 36) = (26 \times 9) \times 36$
- $6 \times (40 \times 82) = (6 \times 40) \times 82$
- $(6 \times 3) \times (12 \times 7) = ((6 \times 3) \times 12) \times 7$
 $= (6 \times (3 \times 12)) \times 7 = 6 \times ((3 \times 12) \times 7) = 6 \times (3 \times (12 \times 7))$
- $1 \times (15 \times (8 \times 20)) = ((1 \times 15) \times 8) \times 20$
 $= (1 \times 15) \times (8 \times 20) = (1 \times (15 \times 8)) \times 20 = 1 \times ((15 \times 8) \times 20)$
- $6 \times ((39 \times 22) \times 27) = ((6 \times 39) \times 22) \times 27$
 $= (6 \times 39) \times (22 \times 27) = (6 \times (39 \times 22)) \times 27 = 6 \times (39 \times (22 \times 27))$
- $((36 \times 79) \times 64) \times 5 = (36 \times 79) \times (64 \times 5)$
 $= (36 \times (79 \times 64)) \times 5 = 36 \times ((79 \times 64) \times 5) = 36 \times (79 \times (64 \times 5))$
- $((61 \times 81) \times 29) \times 14 = (61 \times 81) \times (29 \times 14)$
 $= (61 \times (81 \times 29)) \times 14 = 61 \times ((81 \times 29) \times 14) = 61 \times (81 \times (29 \times 14))$

Are the expressions in each question equal? Check a few to confirm.