

Factor Stretch Answer Key

1. 5×5
2. $3 \times 3 \times 3 \times 3$
3. $8 \times 8 \times 8$
4. 10×10
5. $2 \times 2 \times 2 \times 2 \times 2 \times 2$
6. $7 \times 7 \times 7$
7. $4 \times 4 \times 4 \times 4 \times 4$
8. 9×9
9. $6 \times 6 \times 6 \times 6$
10. $12 \times 12 \times 12$
11. 11×11
12. $1 \times 1 \times 1 \times 1 \times 1$

Teacher's Guide

- Review that the base tells which number is repeated and the exponent tells how many times it appears as a factor.
- Remind students not to multiply the factors. They are only expanding the exponent expression.
- Support students by having them count aloud as they write each repeated factor.
- Differentiate by giving smaller exponents to students who need extra practice and larger exponents to students who are ready for a challenge.
- Make it engaging by having students compare answers with a partner and check that the correct number of factors was written.
- Extend learning by asking students to write an exponent expression for each repeated multiplication they create on their own.
- For an additional challenge, have students explain in one sentence how the exponent changes the repeated multiplication expression.