

## Multiplication de Trois Trinômes (J)

Simplifiez chaque expression.

$$1. (-4w^3 + 9w^2 - 2w)(5w^5 - w^4 - 6w^3)(7w^2 + 2w + 5)$$

$$2. (-v^2 - 2v - 5)(-3v^4 + 8v^3 - 3v^2)(-8v^5 - 9v^4 + 2v^3)$$

$$3. (9q^3 - q^2 - 2q)(-q^3 + 5q^2 + 4q)(3q^3 - 6q^2 - 2q)$$

$$4. (3s^5 - 4s^4 + 6s^3)(-2s^2 + 3s - 5)(-3s^5 + 6s^4 + 4s^3)$$

$$5. (2x^3 + 2x^2 - 9x)(3x^4 + 9x^3 + 4x^2)(2x^2 + 5x + 5)$$

$$6. (8c^5 - c^4 - 7c^3)(9c^3 + 7c^2 + 9c)(-7c^4 - 8c^3 + 8c^2)$$

$$7. (b^3 + 6b^2 + 7b)(2b^3 - 8b^2 + 5b)(-2b^5 - 7b^4 - 8b^3)$$

$$8. (4b^2 - 4b + 1)(-7b^5 - 8b^4 - 3b^3)(-b^4 - b^3 + 7b^2)$$

$$9. (7s^3 + s^2 - 3s)(-6s^5 - 3s^4 + 4s^3)(9s^5 - 4s^4 + 8s^3)$$

$$10. (-3c^2 - 5c - 1)(7c^3 + c^2 + 3c)(7c^5 + 9c^4 + 5c^3)$$

## Multiplication de Trois Trinômes (J) Réponses

Simplifiez chaque expression.

$$1. (-4w^3 + 9w^2 - 2w)(5w^5 - w^4 - 6w^3)(7w^2 + 2w + 5)$$
$$= -140w^{10} + 303w^9 + 33w^8 - 109w^7 + 5w^6 - 236w^5 + 60w^4$$

$$2. (-v^2 - 2v - 5)(-3v^4 + 8v^3 - 3v^2)(-8v^5 - 9v^4 + 2v^3)$$
$$= -24v^{11} - 11v^{10} + 8v^9 + 250v^8 + 190v^7 - 203v^6 + 30v^5$$

$$3. (9q^3 - q^2 - 2q)(-q^3 + 5q^2 + 4q)(3q^3 - 6q^2 - 2q)$$
$$= -27q^9 + 192q^8 - 159q^7 - 332q^6 - 6q^5 + 76q^4 + 16q^3$$

$$4. (3s^5 - 4s^4 + 6s^3)(-2s^2 + 3s - 5)(-3s^5 + 6s^4 + 4s^3)$$
$$= 18s^{12} - 87s^{11} + 195s^{10} - 280s^9 + 162s^8 - 28s^7 - 120s^6$$

$$5. (2x^3 + 2x^2 - 9x)(3x^4 + 9x^3 + 4x^2)(2x^2 + 5x + 5)$$
$$= 12x^9 + 78x^8 + 148x^7 - 31x^6 - 442x^5 - 545x^4 - 180x^3$$

$$6. (8c^5 - c^4 - 7c^3)(9c^3 + 7c^2 + 9c)(-7c^4 - 8c^3 + 8c^2)$$
$$= -504c^{12} - 905c^{11} + 186c^{10} + 766c^9 + 921c^8 + 40c^7 - 504c^6$$

$$7. (b^3 + 6b^2 + 7b)(2b^3 - 8b^2 + 5b)(-2b^5 - 7b^4 - 8b^3)$$
$$= -4b^{11} - 22b^{10} + 14b^9 + 223b^8 + 344b^7 - 37b^6 - 280b^5$$

$$8. (4b^2 - 4b + 1)(-7b^5 - 8b^4 - 3b^3)(-b^4 - b^3 + 7b^2)$$
$$= 28b^{11} + 32b^{10} - 205b^9 - 45b^8 + 90b^7 + 31b^6 - 21b^5$$

$$9. (7s^3 + s^2 - 3s)(-6s^5 - 3s^4 + 4s^3)(9s^5 - 4s^4 + 8s^3)$$
$$= -378s^{13} - 75s^{12} + 159s^{11} - 271s^{10} + 184s^9 + 152s^8 - 96s^7$$

$$10. (-3c^2 - 5c - 1)(7c^3 + c^2 + 3c)(7c^5 + 9c^4 + 5c^3)$$
$$= -147c^{10} - 455c^9 - 594c^8 - 491c^7 - 270c^6 - 107c^5 - 15c^4$$