

因数分解 発展（20問） 版Cの答え

※ 答えの中に、まだ分解できる因数が残っていないかを確認してください。

$$\begin{aligned}(1) \quad & x^2 - y^2 + 2y - 1 \\ & = (x - y + 1)(x + y - 1)\end{aligned}$$

$$\begin{aligned}(2) \quad & x^4 - 35x^2 - 36 \\ & = (x - 6)(x + 6)(x^2 + 1)\end{aligned}$$

$$\begin{aligned}(3) \quad & x^2 - y^2 + 10y - 25 \\ & = (x - y + 5)(x + y - 5)\end{aligned}$$

$$\begin{aligned}(4) \quad & (x + y)^2 + 3(x + y) - 4 \\ & = (x + y - 1)(x + y + 4)\end{aligned}$$

$$\begin{aligned}(5) \quad & x^2 + 5xy + 6y^2 + 7x + 18y + 12 \\ & = (x + 2y + 4)(x + 3y + 3)\end{aligned}$$

$$\begin{aligned}(6) \quad & (x + y)^2 + 13(x + y) + 42 \\ & = (x + y + 6)(x + y + 7)\end{aligned}$$

$$\begin{aligned}(7) \quad & 3x^2 + 9x - 54 \\ & = 3(x - 3)(x + 6)\end{aligned}$$

$$\begin{aligned}(8) \quad & 15x^2 + 55x - 20 \\ & = 5(x + 4)(3x - 1)\end{aligned}$$

$$\begin{aligned}(9) \quad & 12x^2 - 8x - 4 \\ & = 4(x - 1)(3x + 1)\end{aligned}$$

$$\begin{aligned}(10) \quad & x^2 + 5xy + 6y^2 + 2y - 4 \\ & = (x + 2y + 2)(x + 3y - 2)\end{aligned}$$

$$\begin{aligned}(11) \quad & x^4 - 13x^2 + 36 \\ & = (x - 3)(x - 2)(x + 2)(x + 3)\end{aligned}$$

$$\begin{aligned}(12) \quad & x^2 - 9y^2 - 2x - 18y - 8 \\ & = (x - 3y - 4)(x + 3y + 2)\end{aligned}$$

$$\begin{aligned}(13) \quad & 12x^2 - 16x - 16 \\ & = 4(x - 2)(3x + 2)\end{aligned}$$

$$\begin{aligned}(14) \quad & (x + y)^2 - 6(x + y) - 7 \\ & = (x + y - 7)(x + y + 1)\end{aligned}$$

$$\begin{aligned}(15) \quad & x^2 - y^2 + 8y - 16 \\ & = (x - y + 4)(x + y - 4)\end{aligned}$$

$$\begin{aligned}(16) \quad & x^2 - 9y^2 + 10x + 25 \\ & = (x - 3y + 5)(x + 3y + 5)\end{aligned}$$

$$\begin{aligned}(17) \quad & x^4 - 52x^2 + 576 \\ & = (x - 6)(x - 4)(x + 4)(x + 6)\end{aligned}$$

$$\begin{aligned}(18) \quad & x^4 + 2x^2 - 24 \\ & = (x - 2)(x + 2)(x^2 + 6)\end{aligned}$$

$$\begin{aligned}(19) \quad & x^2 - y^2 + 12y - 36 \\ & = (x - y + 6)(x + y - 6)\end{aligned}$$

$$\begin{aligned}(20) \quad & (x + y)^2 + 9(x + y) + 14 \\ & = (x + y + 2)(x + y + 7)\end{aligned}$$