

Разложить на множители методом группировки

$$1) ak - 7at + 2bk - 14bt - 3ck + 21ct = a(k-7t) + 2b(k-7t) - 3c(k-7t) = (a+2b-3c)(k-7t)$$

$$2) 3xy - xz - 6y^2 + 5yz - z^2 = 3xy - xz - 6y^2 + 2yz + 3yz - z^2 = 3y(x-2y+z) - z(x-2y+z) = (3y-z)(x-2y+z)$$

$$3) 14xy - 63xk + 20yz - 90zk = 7x(2y-9k) + 10z(2y-9k) = (7x+10z)(2y-9k) \quad x^2+2xy+y^2=x^2+xy+xy+y^2=...$$

$$4) -15ax + 6ay - 3az + 32bx - 14by + 7bz = \text{не решается}$$

$$5) -15ax + 6ay - 3az + 35bx - 14by + 7bz = 3a(-5x+2y-z) - 7b(-5x+2y-z) = (3a-7b)(-5x+2y-z)$$

$$6) 14ax + 7ay - 2bx - by + 6kx + 3ky = 7a(2x+y) - b(2x+y) + 3k(2x+y) = (2x+y)(7a-b+3k)$$