

solve these quadratic equations

$$1) \ n(n + 2) + n + 2 = 12$$

$$2) \ n^2 + (n + 1)^2 = 13$$

$$3) \ n + (n + 1)(n + 2) = 14$$

$$4) \ (3n - 1)(2n - 1) = 15$$

$$5) \ n(n - 2) + 2n(n + 2) = 16$$

$$6) \ 2n(n + 2) + 3n(n - 2) + 1 = 17$$

$$7) \ n(n + 1) + (n + 1)(n + 2) = 18$$

$$8) \ (2n + 4)(2n - 1) - 1 = 19$$

$$9) \ 3n(2n - 1) + 2(n - 1)(3n - 5) = 20$$

$$10) \ 2(n - 1)(2n - 1) + (3n - 1)(n + 1) = 21$$