

## Unit Practice Test

**Factor the common factor out of each expression (only do that).**

1)  $9r^4 - 18r^2$

$9r^2(r^2 - 2)$

2)  $35k^2 + 56k^3 + 63k^4$

$7k^2(5 + 8k + 9k^2)$

**Expand/FOIL the binomials.**

3)  $(4r + 8)(r - 1)$

$4r^2 + 4r - 8$

4)  $(7x + 4)^2$

$49x^2 + 56x + 16$

5)  $(7x - 4)(5x - 2)$

$35x^2 - 34x + 8$

6)  $3(2x - 2)(4x + 1)$

$24x^2 - 18x - 6$

**Factor each trinomial as (binomial)(binomial). Always check for GCF**

7)  $2p^2 - 9p + 9$

$(2p - 3)(p - 3)$

8)  $49p^2 - 36$

$(7p + 6)(7p - 6)$

9)  $6x^2 + 13x - 28$

$(2x + 7)(3x - 4)$

10)  $4x^2 + 42x + 80$

$2(2x + 5)(x + 8)$

11)  $2p^2 + 8p - 42$

$2(p - 3)(p + 7)$

12)  $r^2 + r - 20$

$(r - 4)(r + 5)$