

**Math 1300**  
**Homework 17**  
**Section 4.2**

1. 4.2.12a
  - a.  $(x+5)(x+5)$
  - b.  $x^2 - 25$
  - c.  $(x+5)(x-5)$
  - d.  $(x-5)(x-5)$
  - e. None of the above
  
2. 4.2.12b
  - a.  $(x-5)(x+5)$
  - b.  $x^2 + 25$
  - c.  $(x-5)(x-5)$
  - d.  $(x+5)(x+5)$
  - e. None of the above
  
3. 4.2.18
  - a.  $(1-p)(1+p)$
  - b.  $1-p^2$
  - c.  $(1-p)(1-p)$
  - d.  $(1+p)(1+p)$
  - e. None of the above
  
4. 4.2.24
  - a.  $(5x-7)(5x-7)$
  - b.  $25x^2 - 49$
  - c.  $(5x+7)(5x+7)$
  - d.  $(5x-7)(5x+7)$
  - e. None of the above
  
5. 4.2.28
  - a.  $(8a+5b)(8a+5b)$
  - b.  $64a^2 - 25b^2$
  - c.  $(8a-5b)(8a-5b)$
  - d.  $(8a-5b)(8a+5b)$
  - e. None of the above

6. 4.2.38

- a.  $(x-4)(x+4)$
- b.  $(x+4)^2$
- c.  $(x-4)^2$
- d.  $x^2 + 8x + 16$
- e. None of the above

7. 4.2.42

- a.  $x^2 - 24x + 144$
- b.  $(x-12)^2$
- c.  $(x+12)^2$
- d.  $(x-12)(x+12)$
- e. None of the above

8. 4.2.44

- a.  $(3x+5)^2$
- b.  $9x^2 - 30x + 25$
- c.  $(3x-5)^2$
- d.  $(3x+5)(3x-5)$
- e. None of the above

9. 4.2.54

- a.  $(m+1)^3$
- b.  $(m-1)^3$
- c.  $(m-1)(m^2 + m + 1)$
- d.  $m^3 - 1$
- e. None of the above

10. 4.2.58

- a.  $c^3 + d^3$
- b.  $(c+d)^3$
- c.  $(c-d)^3$
- d.  $(c+d)(c^2 - cd + d^2)$
- e. None of the above