Multiplying Exponents Homework Name \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Simplify each expression (no negative exponents).

1. 3 · 33 2. a5 · a · a-3 3. m-3 · m3

4. x2y4x3y 5. -2x2 · 3x-1 6. 6a3 · 3a

7. (4x2y2)(3x4)(x6y-3) 8. -7(3m2n3)(2m12n3)

9. 9x2y – 2(4x2y) + 3x 10. a2(3ab) – a3b

11. (-7m)(m2n)(2m-3) + 6m2n 12. -32x2y(9xy2)

Power to a Power: Simplify (no negative exponents).

13. (22)3 14. (c5)-3 15. (2a)3

16. (2a-2b3)-4 17. -3(-2a2b2)2 18. (3xy) · (2x2y-2)3

19. (3a · 4a)-2 20. (5k6)2 · -25k3