Algebra 2 Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Remainder & Factor Theorem Date: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Block: \_\_\_\_\_\_\_

**Use the Remainder Theorem to evaluate the polynomial.**

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| 1.)  | 2.) |

**Using the Remainder Theorem, determine if the value is a zero of the polynomial.**

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| 3.)  | 4.)  | 5.) Determine the value of d if x = 3 is a zero of the polynomial **.** |

**Using the Factor Theorem, determine if the polynomial expression is a factor of the polynomial.**

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| 6.) (x – 2);  | 7.) (x – 7);  |

**Factor the polynomial function completely given one of its factors:**

|  |  |
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| 8.) ; (x – 2) | 9.); (x + 3) |