Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Algebra II

Score: \_\_\_\_\_\_ / 25

Period: \_\_\_\_\_\_\_\_\_\_\_\_\_ **Cumulative Review #3.2**

***Directions:*** Show all work in order to receive full credit. A correct answer with no supporting work will only receive one credit. Be sure to show all appropriate formulas and formula substitutions as part of your work.

1. Selected values for the functions *f* and *g* are shown in the tables below. **[SHOW ALL WORK FOR FULL CREDIT]**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **x** | **f(x)** |  | **x** | **g(x)** |
|  |  |  |  |
| 0 |  | 0 | 0.58 |
| 1.23 |  | 8.52 | 2.53 |
| 8.52 | 2.53 | 13.11 | 3.01 |
| 9.01 | 3.01 | 16.52 | 3.29 |

A solution to the equation  is

|  |  |  |  |
| --- | --- | --- | --- |
| 1) | 0 | 3) | 3.01 |
| 2) | 2.53 | 4) | 8.52 |

1. If  is an even function, which function must also be even? **[SHOW ALL WORK FOR FULL CREDIT]**
2.  3) 

2)  4) 

1. Given , which statement is true? **[SHOW ALL WORK FOR FULL CREDIT]**

|  |  |  |  |
| --- | --- | --- | --- |
| 1) | is a factor because . | 3) | is a factor because . |
| 2) | is a factor because . | 4) | is a factor because . |

1. What is the inverse of , where ? **SHOW ALL WORK FOR FULL CREDIT**
2.  2)  3)  4) 
3. Simplify , where *i* is the imaginary unit.