**Computer Programming 1
Essential Standard 4.00 Understand Variables and Naming Conventions
Study Guide**

1. What is the syntax to declare a variable?
2. Name the data type.
	* int
	* str
	* dbl
	* dec
	* chr
	* bln
3. Complete the table (you may make up variable names for the Declaration Example column, just ensure you use the proper prefix and syntax).

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| DataType | Values | Storage | Prefix | Declaration Example |
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1. How do you clear a label in visual basic?
2. What is an assignment statement?
3. How would you declare the following variabes and initialize the values?
	* strColor, red
	* intAge, 16
4. What is concatenation?
5. Write the statement to concatenate strString1, intVar and strString2 and display the result in lblDisplay.
6. Write the statement to display dblNumVar in the label lblAnswer and formatted to show a dollar sign.
7. Numbers can be declared using these data types:
8. Give an example of setting an empty string.
9. How many bytes are used to store a string data type?
10. Dim intNumber as Integer = 15. What is the value of 15 called?
11. What is scope?
12. What is lifetime?
13. What are the 3 types of variable scopes?
14. This variable can be used anywhere: \_\_\_\_\_\_\_\_\_\_\_\_
15. The variable can only be used where it was declared: \_\_\_\_\_\_\_\_\_\_\_
16. What is the format function?
17. How would you use the format function to display dlbNumVar in the label lblAnswer and formatted to show a dollar sign?
18. This method allows you to format a numeric variable for display.
19. What is the syntax for the ToString Method?
20. \_\_\_\_\_\_\_\_\_\_\_ allow you to get input from the user when your programming in running (runtime).
21. The properties of a textbox
	* \_\_\_\_\_\_\_ – start with txt
	* \_\_\_\_\_\_\_ – what is displayed inside the text box
	* \_\_\_\_\_\_\_\_ – aligns the text relative to the text box.
	* \_\_\_\_\_\_\_\_– Sets an asterisk (\*) character to be displayed in the textbox as the user types.
22. Write the syntax of:
	* Textbox
	* Messagebox
23. \_\_\_\_\_\_\_\_\_\_ holds its value between runs of the program.
24. What are static variables?
25. How do you declare a static variable?
26. What are constant variables?
27. How do you declare a constant variable?
28. What is a counter?
29. Instead of Dim what do you use for a Static variable?
30. Can Static Variables be defined globally?
31. A variable that once declared cannot be changed by the program - \_\_\_\_\_\_\_\_\_\_\_\_
32. Constant variables should be declared using all \_\_\_\_\_\_\_\_\_
33. A variable that is used to determine how many times something happens
34. How are counters declared?
35. Hungarian Notation prefixes
	* Form
	* Button
	* Label
	* Text Box
	* Radio Button
	* Check box
	* Image
	* Combo Box
	* Picture Box
	* List box
	* Menu
36. What is a prompt?
37. What datatype does a TextBox return?
38. Write a statement to get input from the txtInput TextBox to the variable dblInput.
39. What is a TextChanged Event?
40. What is a MessageBox?
41. Write the statement to show the message “Programming” in a messagebox.
42. What is the syntax?