## **RAJAGIRI SCHOOL OF ENGINEERING & TECHNOLOGY (AUTONOMOUS)**

**Department of Computer Science & Business Systems**

**101009/IT700B IT WORKSHOP – MATLAB**

**Viva Questions- Module 1**

1. How do you create a variable in MATLAB, and what rules must you follow when naming a variable?
2. What are the different data types that can be stored in MATLAB variables? Can you give examples of how to create variables of these types?
3. What happens if you create a variable without initializing it? Is it possible in MATLAB?
4. How can you clear all variables from the workspace? Why might you want to do this?
5. Name some of the default variables in MATLAB
6. What happens when you assign a new value to an existing variable in MATLAB?
7. How does MATLAB handle variable overwriting with different data types? For example, what happens if you first assign a numeric value to a variable and then assign a string to the same variable?
8. How can you use the MATLAB debugger to identify and fix errors in your code?
9. What is the importance of comments and indentation when correcting errors?
10. Explain the order of operations (precedence) in MATLAB. How does MATLAB decide which operations to perform first?
11. How can you change the precedence of operations in a MATLAB expression? Provide an example using parentheses.
12. What are the different operators in MATLAB
13. What is the difference between using ^ and .^ ,\* and ‘.\*’,”=’ and ‘.+’ in MATLAB, and how does precedence affect their usage?
14. How can you control the display format of floating-point numbers in MATLAB? Differentiate format short, format long,format loose, format compact and format bank.
15. What is the effect of using the format command on calculations? Does it affect the precision of computations?
16. How can you limit the number of decimal places displayed for a floating-point number?
17. What are the different types of windows on the matlab IDE screen
18. Explain the impact of using a semicolon at the end of a MATLAB statement. What happens if you omit it?
19. What is the MATLAB workspace, and what information does it contain?
20. How can you view all the variables currently stored in the workspace?
21. Describe how to clear specific variables from the workspace. What is the difference between clear and clearvars?
22. How would you save the current workspace variables to a file for later use? How can you load them back into a future session?
23. Explain how to use the who and whos commands. What additional information does whos provide compared to who?
24. What is the diary function, and how can it help you keep track of your work session?
25. What is the difference between separating commands with a semicolon (;) versus a comma (,) on the same line?