GENERAL INSTRUCTIONS

1. **VERY IMPORTANT – You are NOT allowed to share the contents of the question paper with others in any form (DOC,PDF, JPG etc). You are also NOT allowed to share your answers (Java code) with anyone else except MVI Technologies. As soon as you have completed the test, you need to delete the question paper physically from your system and maintain STRICT CONFIDENTIALITY. If we come to know that you have shared your questions/answers with others, it will lead to your INSTANT DISQUALIFICATION**

2. **It is compulsory to answer all the questions.**

3. **Only NOTEPAD can be used to write the code. IDE's such as Eclipse are not allowed.**

4. **You are NOT allowed to compile and execute the code.**

5. **As soon as you have finished answering all the questions, you need to email the source code (with .java extension) in separate files as attachment. For example, if there are 4 questions, there will be 4 files with .JAVA extension**

6. **For file related questions, you need to create sample TXT file/s. These TXT file/s also need to be emailed along with the JAVA files.**

7. **All the Java and txt files should be compressed and sent in a single file named <Your_Name>.zip. For e.g., if your name is Arun Kumar, the file name will be "Arun_Kumar.zip"**

8. **While taking the written test, it is MANDATORY to turn on the video camera and share your screen throughout the entire duration of the test**

9. **Indulging in malpractices such as referring to Google or taking any other form of assistance will lead to immediate disqualification.**

10. **You are NOT allowed to refer to the Java online API documentation (Java libraries) during the test**

11. **It is allowed to use classes provided by the Java library such as String, Scanner, List, Map etc. However, for certain questions, restrictions will be imposed on the usage of some library classes.**

12. **All inputs (for arrays, other objects etc) need to be taken from the keyboard by using the Scanner class. You are NOT allowed to initialize values by hard coding values.**

13. **For your solutions, GUI (Graphical User Interface) is NOT required. Instead, you can use the Scanner class to accept input and then use System.out.println( ) to display output on the screen**

14. **You need to send the JAVA files (and TXT files if required) within 5 minutes of the completion of the test. Else your code will not be considered.**

1. Write a java program to read a sentence with at least 10 words from the command line using Scanner

   a) Print the following
   i.   **Number of CONSONANTS(characters which are not vowels)** in **each word** of the **sentence** (Each word is separated by space)
   ii. For each of the word in the sentence convert the **first letter to lowercase** and **last letter to uppercase**

2. Create a Map to hold Integer objects as key and String objects as value.

   Use scanner to accept keys and values from the user to create 10 entries in the map (10 key value pairs).

   Iterate through the map and remove those entries where the length of the String corresponding to the value is greater than 10.

   Then display the contents of the map on the screen.

3. Manually create a file called "Numbers.txt" which has 25 random integers each separated by a space. Write Java code to read these integers into an array and then find the average of these numbers.

4. Initialize a String array with 10 words (no need to use Scanner. For each word, convert the first character to upper case, and store the converted words in a LinkedList