

Mark:

GE1354 Introduction to Electronic Design

Python Practices 1

Name: _____ Student Number: _____ Date: _____

Q1. Based on p.10 of powerpoint “Unit 2 (Part II), write a simple python program which can calculate the perceived frequency heard by the observer under the conditions that (1) the observer is moving or (2) the source is moving. The program should allow user to input (i) the source frequency (ii) the travelling speed of the sound and (iii) the line-of-sight velocity of the moving party (either the source or the observer)

Q2. Please write the python coding for the flowchart shown in p.6 of the powerpoint “Programming Language – Python (Part II)”. The program should allow users to input the value of a, b, c.

Q3. Write a python program to determine if a given input is a prime number or not.

Further task:

The above program can only run one time per execution. Try to modify your program by using looping so that user can indicate whether to want to continue running the program for one more time. You may consider to use “while” loop in your program

Q4. Write a python program which can calculate sum of first n square numbers. The number n can be input by user.

Further task:

The above program can only run one time per execution. Try to modify your program by using looping so that user can indicate whether he/she to want to continue/stop running the program for one more time or not. You may consider to use “while” loop in your program.