EE 2905

Dr. Johnson

Homework 8

1 – Match each term to its description. 40 pts

A) Service(ing)   ☐ The activity that creates an interrupt
B) Flag (interrupt bit) ☐ A bit in a register to indicate a specific event has occurred
C) Nested   ☐ Act of running the code associated with the interrupt
D) Context switch   ☐ Order in which events (interrupts) are serviced
E) Maskable   ☐ A higher priority interrupt can "interrupt" an active, lower priority interrupt
F) Non-maskable   ☐ these interrupts can be selectively enabled or disabled
G) Priority   ☐ these interrupts cannot be disabled
H) Active   ☐ An interrupt that has occurred but has not yet been serviced by the processor
 I) Pending   ☐ Currently being serviced
J) Event   ☐ The code run when an interrupt is Active
K) ISR   ☐ All the activity associated with changing from one task to another

2 – Short answer   40 pts

a)   Describe 2 ways in which an ISR is different from any other common function

b) Describe 2 ways in which an ISR is similar to any other common function

3 – Short answer   20 pts

Compare the operation of a Timer, Ticker, and Timeout object