Course No: PHRM 1307
Course Title: Applied Math.
Date: 25/10/2017
No. of Questions: (3)
Time: 1hours
Using Calculator (No)

University of Palestine

First Midterm Exam
2017/2018
Total Grade:15

Instructor Name: _____
Student No.: _____
Student Name: _____
College Name: Pharmacy Collage
Dep. / Specialist: _____
Using Dictionary (No)

Question One:

(a) Let $f(x)=2x-3$ and $g(x)=\sqrt{1-x}$ (2Marks)

Find

1) $(g\circ f)(x)$

2) Dom$(g\circ f)$

b) Let $g(x)=\frac{1}{x}$ find a function $f(x)$ so that $(f\circ g)(x)=x$ (OneMark)

(c) Graph $f(x) = x^2 - 2x - 3$ (2Marks)

Question Two:

(a) Solve for y in term of x if $Ln(y-1) - Ln(5) = 2x - Ln(x)$ (2Marks)

(**b) For what value of a is** $f(x) = \begin{cases} a^2x - 2a, & x \geq 2 \\ 12, & x \angle 3 \end{cases}$ continuous at every x.(2Marks)

(c) Solve for k if $100e^{10k} = 2oo$ (One Mark)

Question Three:

(1) Find the following limits (5 Marks)

(a) $\lim_{x\to 2} \frac{Sin(x-2)}{\sqrt{x+3}-\sqrt{2x+1}}$

(c) $\lim_{x\to 2} \frac{x^4-16}{x-2}$

(d) $\lim_{x\to 0} \frac{\tan^2(Sin5x)}{x^2}$

(2) Show that $\lim_{x\to 2}(3x+5)=11$ (Use the definition of a limit)

End of Questions

Good Luck