**Mathematics in Economics**

**TASK 2 – 5 points**

Name: …………………………………

1. Find Taylor series of at the point *a* = 2.
2. Find Maclaurin series of at the point *a* = 0.

3) Find the increment (find differential) of the function for *x* = 1, *dx* = 0.1

(*x* represents the price of product, *y* represents the number of products sold). If we increase the price from 1 to 1.1, then the number of products sold will ***increase*** or ***decrease***? ***And by how many pieces?***

**Mathematics in Economics**

**TASK 2 – 5 points**

Name: …………………………………

1. Find Taylor series of at the point *a* = 1.
2. Find Maclaurin series of at the point *a* = 0.

3) Find the increment (find differential) of the function for *x* = 1, *dx* = 0.2

(*x* represents the price of product, *y* represents the number of products sold). If we increase the price from 1 to 1.2, then the number of products sold will ***increase*** or ***decrease***? ***And by how many pieces?***

**Mathematics in Economics**

**TASK 2 – 5 points**

Name: …………………………………

1. Find Taylor series of at the point *a* = -1.
2. Find Maclaurin series of at the point *a* = 0.

3) Find the increment (find differential) of the function for *x* = 1, *dx* = 0.3

(*x* represents the price of product, *y* represents the number of products sold). If we increase the price from 1 to 1.3, then the number of products sold will ***increase*** or ***decrease***? ***And by how many pieces?***