```
Python 3.7.4 (default, Aug  9 2019, 18:34:13) [MSC v.1915 64 bit (AMD64)]
Type "copyright", "credits" or "license" for more information.

IPython 7.8.0 -- An enhanced Interactive Python.

In [1]:
runfile('D:/_First_Semester_of_Senior_Year/Numerical_Analysis(1)/homework/hw2/codes/hw2_6_a.py',
wdir='D:/_First_Semester_of_Senior_Year/Numerical_Analysis(1)/homework/hw2/codes')

enter the number of data points: 5

enter x_0: 1

enter y_0: 0.7651977

enter x_1: 1.3

enter y_1: 0.6200860

enter x_2: 1.6

enter y_2: 0.4554022

enter x_3: 1.9

enter y_3: 0.2818186

enter x_4: 2.2

enter y_4: 0.1103623

enter the evaluate point x: 1.5

--------result of Neville's algorithm--------

p_{00}(1.5000) =  0.7651977
p_{11}(1.5000) =  0.620086
p_{22}(1.5000) =  0.4554022
p_{33}(1.5000) =  0.2818186
p_{44}(1.5000) =  0.1103623

p_{01}(1.5000) =  0.52334487
p_{12}(1.5000) =  0.5102968
p_{23}(1.5000) =  0.5132634
p_{34}(1.5000) =  0.510427

p_{02}(1.5000) =  0.51247148
p_{13}(1.5000) =  0.51128567
p_{24}(1.5000) =  0.51373613

p_{03}(1.5000) =  0.5118127
p_{14}(1.5000) =  0.51183022

p_{04}(1.5000) =  0.51182


In [2]:
```