**Scientific Computing Lab MA – 322 Lab – 4**

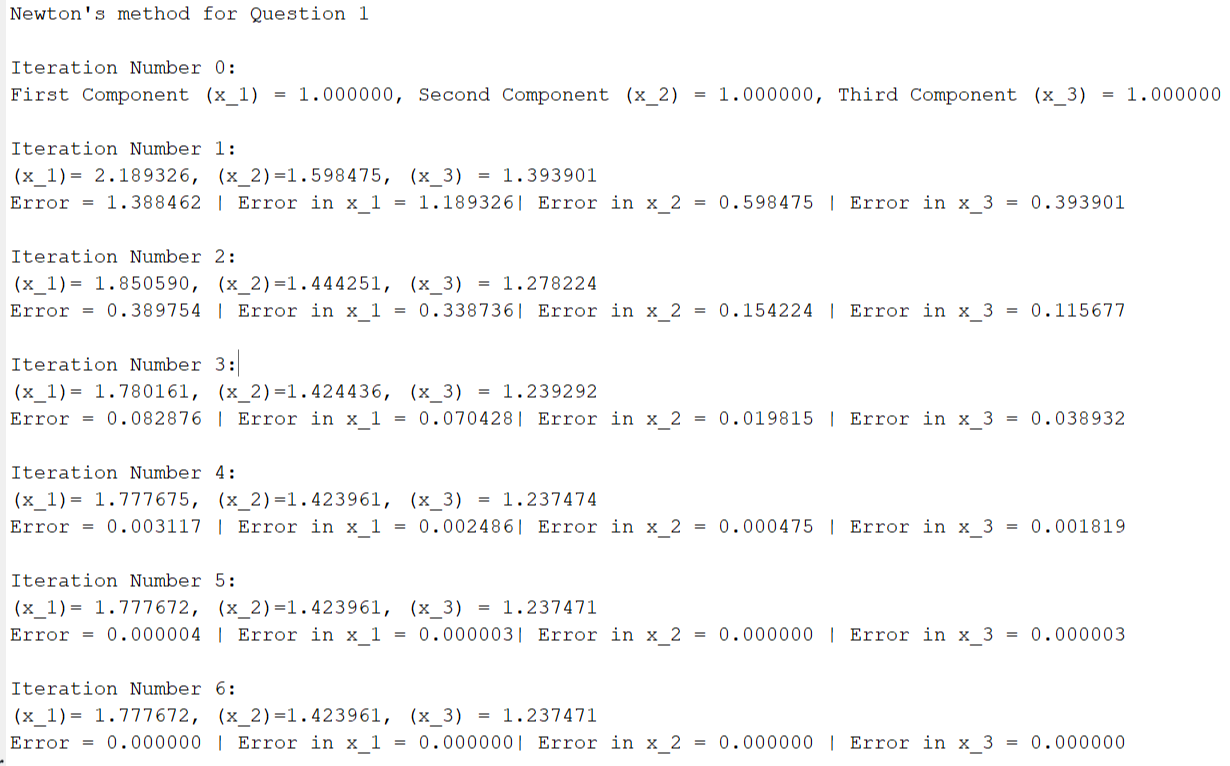
**Name –** Rasesh Srivastava

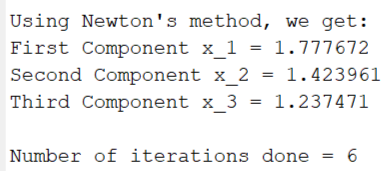
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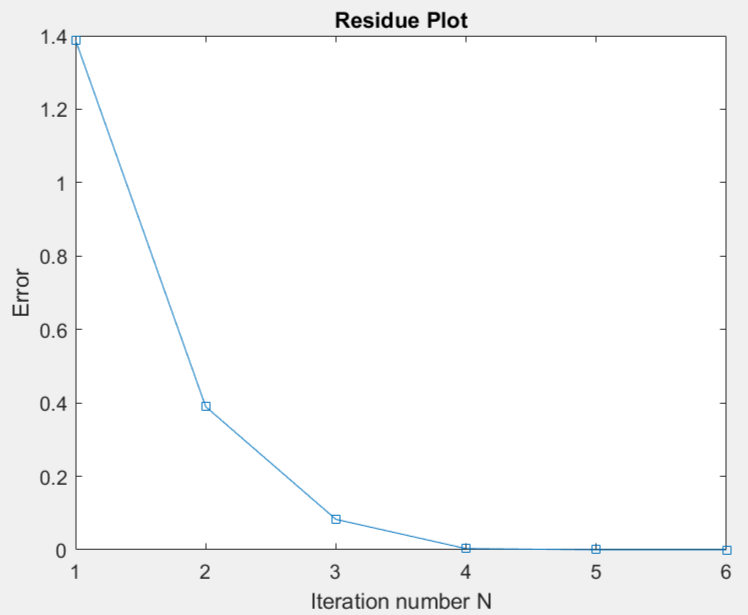
**Branch –** Mathematics and Computing

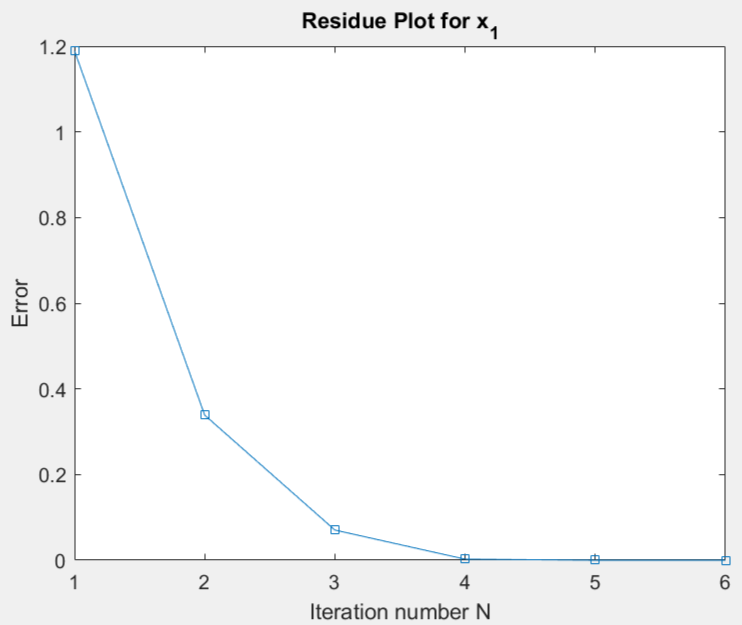
1. Initial Approximation x0 = (1,1,1)T

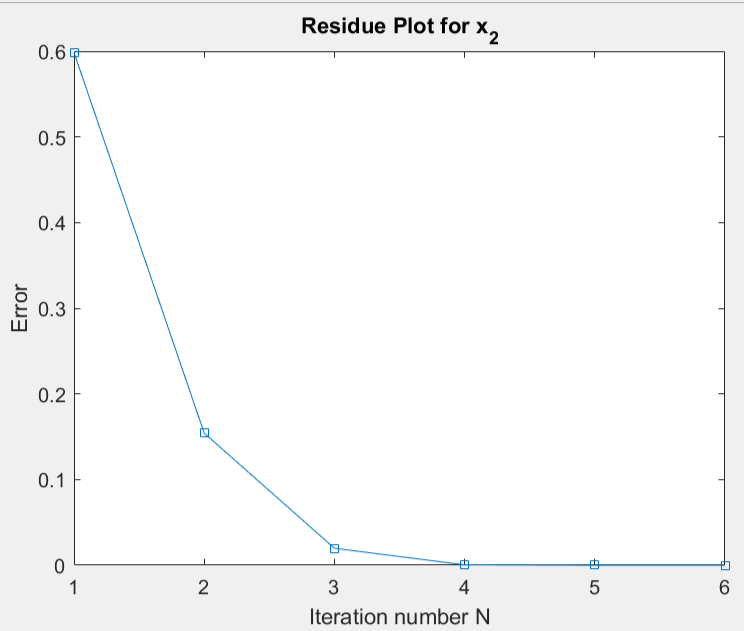
Carrying out 6 iterations of Newton’s Method

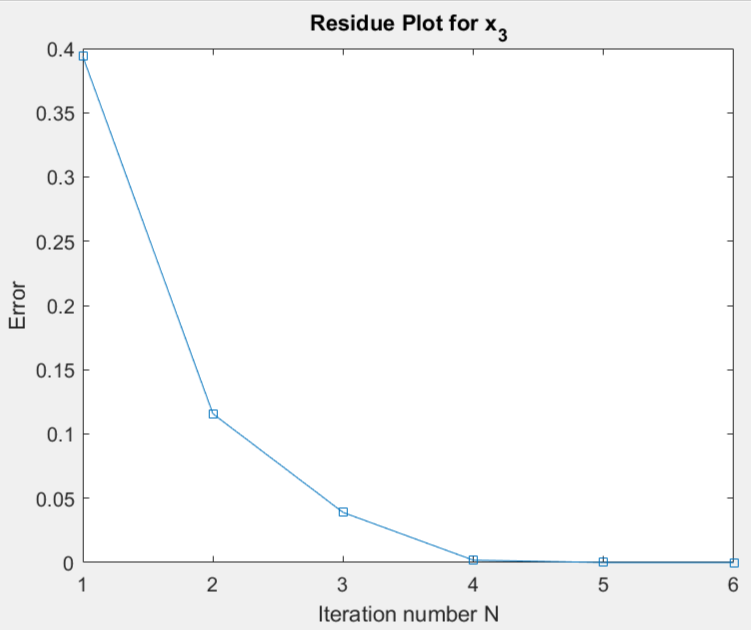






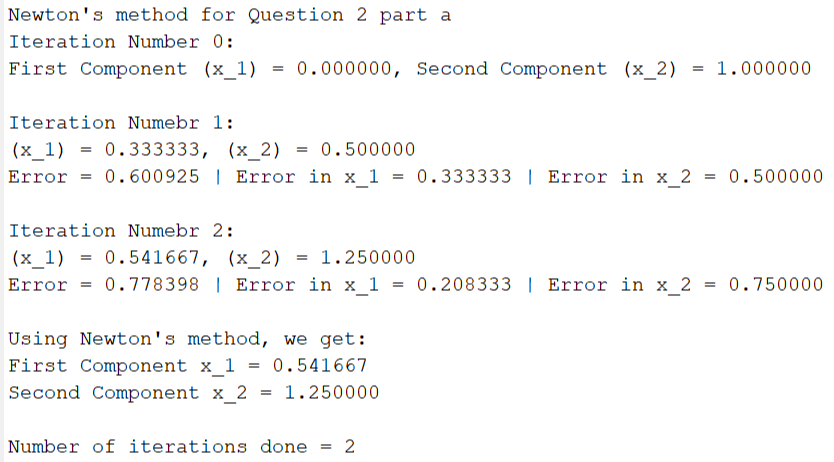


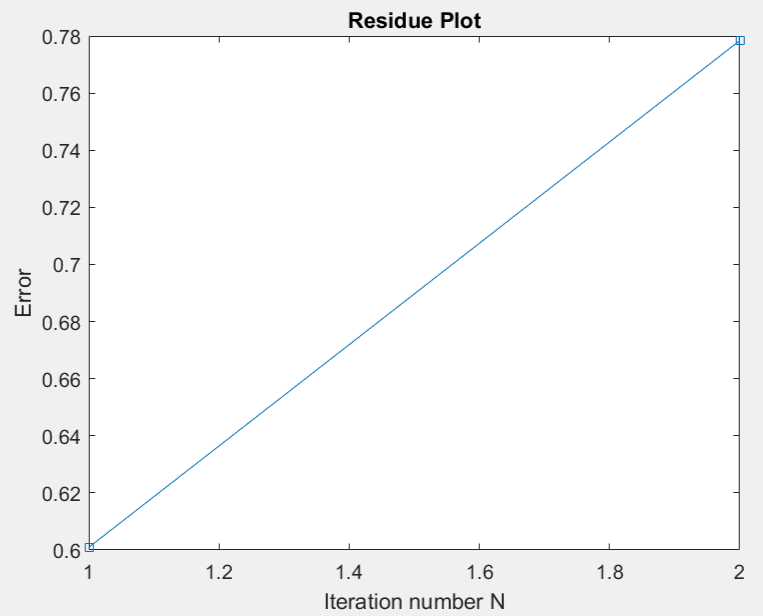


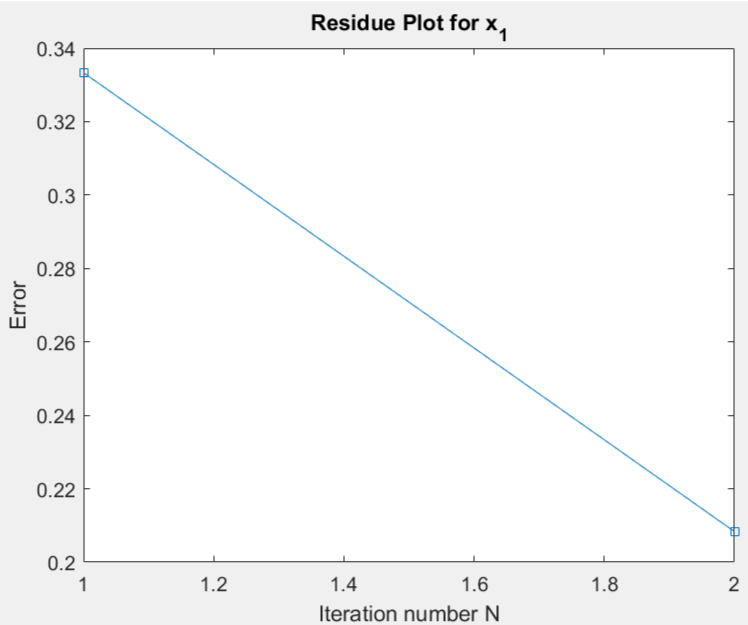


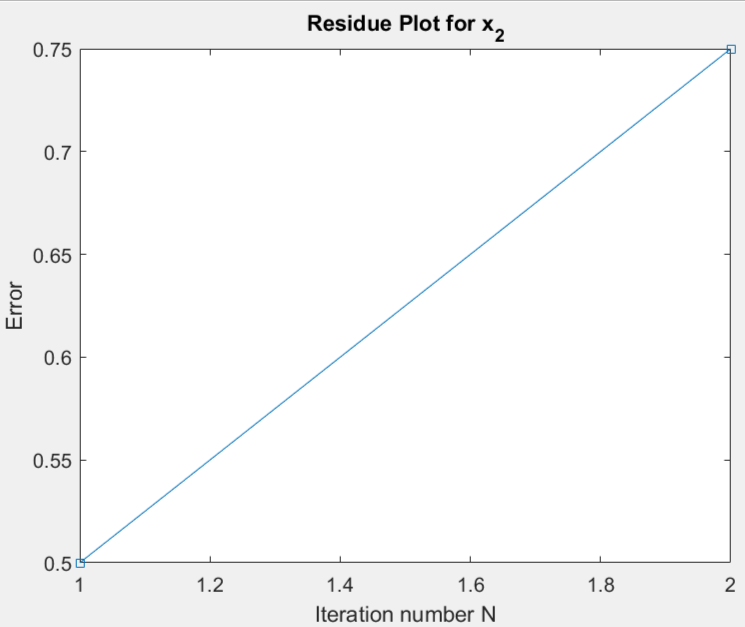
1. Initial Approximation x0 = (0,1)T

Performing 2 iterations of Newton’s Method

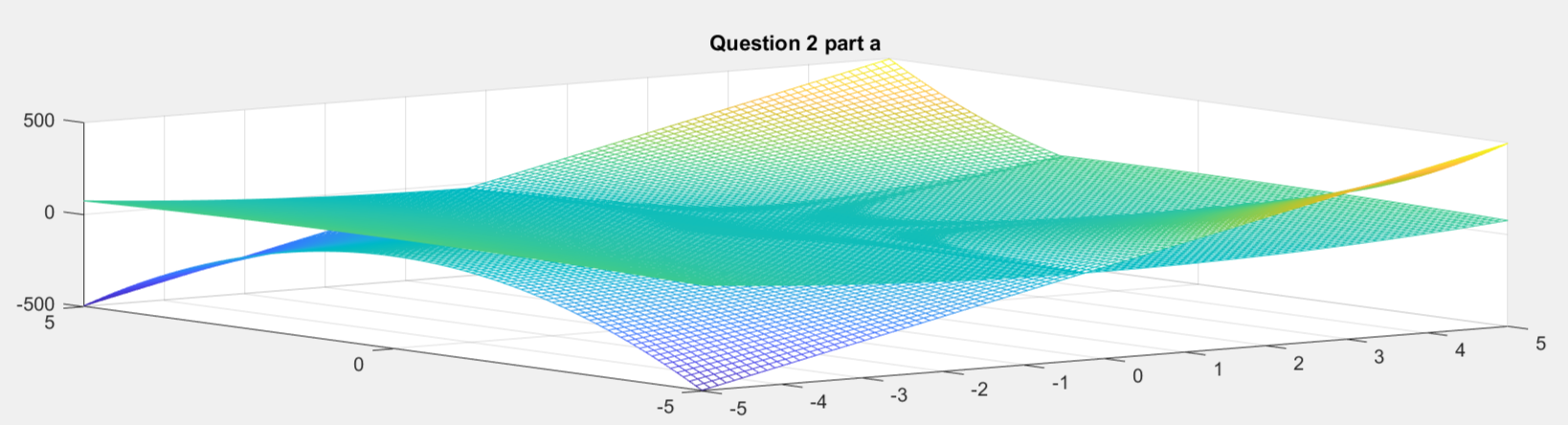








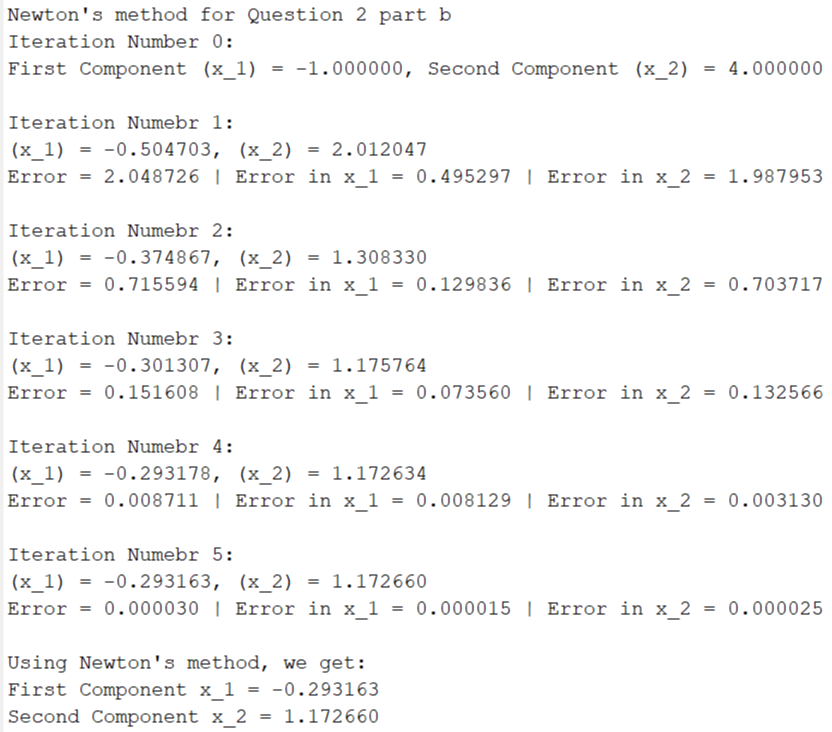
Function Plot

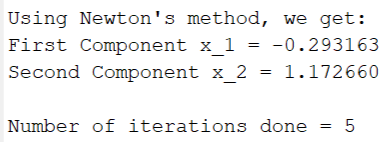


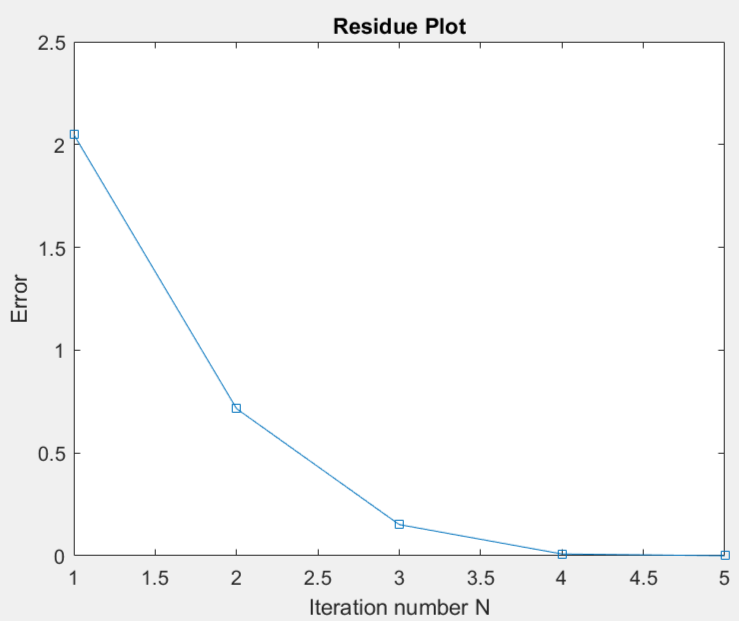
1. Initial Approximation x0 = (-1,4)T

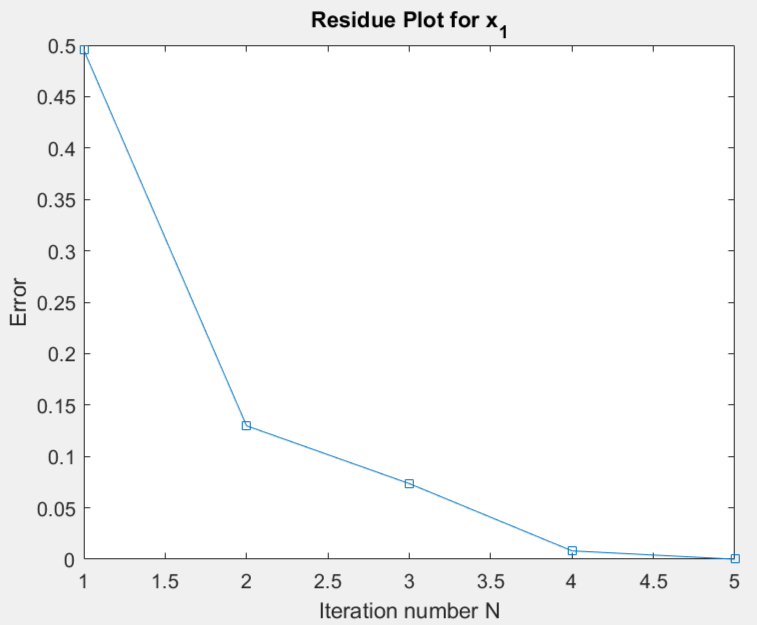
Here, x is taken to be x1 and y is taken to be x2. So, x is equivalent to x1 and y is equivalent to x2

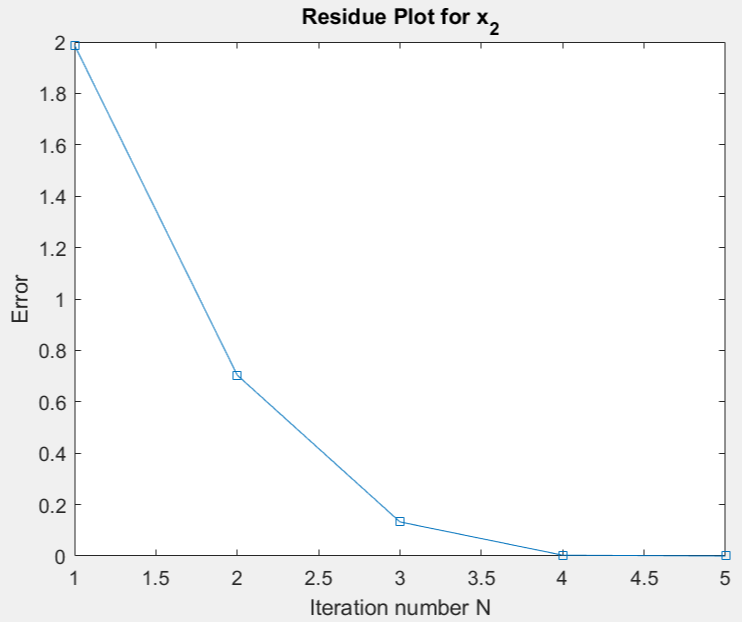
Performing 5 iterations of Newton’s Method



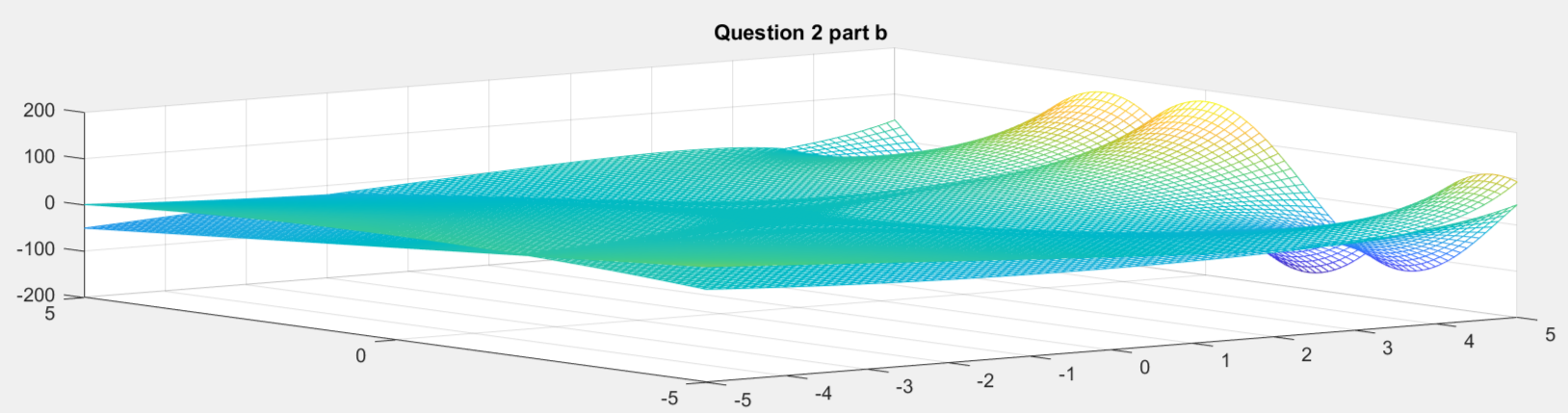








Function Plot



1. Initial Approximation x0 = (0,0,0)T

