Report 2: Interpolation and systems of equations - No. NM 5

Ahmed Helali Numerical Mathematics

May 17, 2022

Comments

I would like in this short PDF to point out certain things in the Matlab files in order to make things clearer. **First off**, I have divided *Task 2* into three files; Task_2_1, Task_2_2, Task_2_3. Each file contains the code for the respective task.

Secondly, I have used a function provided on the internet. The Link is https://de.mathworks.com/matlabcentral/fileexchange/11783-randorthmat. The file name is RandOrtMat.m, the function it contains is called RandOrtMat it tales a number n as an input, and produces an nxn Orthogonal Matrix as an output. I use this function for the task 2.1.

Finally, since Matlab recognizes functions by their respective file name and not by the functions name, kindly find below a table displaying each file name with its respective function.

File Name	Function
task2_1	QR Decomposition

The rest of the comments can be found in the Matlab files.