Problem Set 4

Numerical Analysis, MATH 3377/6577 Due Wednesday, November 6, 2024

Do the following problems from the text, *Numerical Analysis*, 10th edition, by Burden, Faires and Burden.

Each item is worth 10 points.

- 1. Section 4.1: 1a and 2b
- 2. Section 4.1: 3a and 4b
- 3. Section 4.1: 22, Use 3-point endpoint formulas at the end points and 3-point midpoint formulas elsewhere.
- 4. Section 4.2: 1b
- 5. Section 4.2: 5
- 6. Section 4.2: 11a,b
- 7. Section 4.3: 1b, 3b, 5b, 7b
- 8. Section 4.3: 22
- 9. Section 4.4: 1c, 3c, 5c
- 10. MATLAB Exercise:
 - a) Solve problem 17 of Section 4.4 using ALG041.

For Graduate Students:

- 11. Section 4.3: 26
- 12. Section 4.4: 21. Use ALG041.