Tougaloo College
MAT426 - Advanced Calculus
END-EXAM - Spring, 2025

Duration :

Name : .....

ID Number : .....

Instructions to Candidates

- Calculators are **NOT** allowed.
- This paper consists of fill questions.
- Answer all questions.
- All questions carry marks as indicated for each question or part thereof.
- All drawings or sketches, if any, should be produced clearly.
- Assume reasonable values for any data not given with the question paper. Clearly state any assumptions.

1. Prove that if F is closed and K is compact, then $F \cap K$ is compact.

Solution: Proof of the Corollary page 38.

2. Prove that if E is an infinite subset of a compact set K, then E has a limit point in K.

Solution: Proof of theorem 2.37 page 38.