

Acadia University
Department of Mathematics and Statistics

Topics from Advanced Calculus
(MATH 2023)

Assignment 3
Due April 3rd 2002

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March 15, 2002

Note: Problems are taken from Schaum's outline on Differential Equations (Second Edition) by Richard Bronson. Each student must hand in his own paper, but team work is allowed. You have to give complete solutions. There may be problems on the final that go beyond these sections depending on the time available to us in class to cover advanced topics.

6 Applications of First-Order Differential Equations

Do problems 6.71 and 6.61. You may need to review the theory (p. 43-45) and check examples 6.11 and 6.22.

7 Linear Differential Equations

Do problems 7.36, 7.45, and 7.48.

8 Second-Order Linear Homogeneous Differential Equations

Do problems 8.17, 8.24, and 8.38.

9 n^{th} order Linear Homogeneous Equations

Do problems 9.16 and 9.32.

10 The Method of Undetermined Coefficients

Do problems 10.44, 10.46, and 10.49.