

# Math 612 Math Physics Spring 2017

**MWF 8:00 – 9:00 AM in CHAP 104**

**Instructor:** Dr. Alexei Rybkin, CHAP 304B, 474-6002, e-mail: [arybkin@alaska.edu](mailto:arybkin@alaska.edu)

**Office Hours:** MWF 1 - 2 PM, and by appointment; CHAP 304B

**Prerequisites:** MATH 302 (ODEs), 314 (Linear Algebra), 421 (Applied Analysis) and 422 (Complex Analysis) or permission of instructor.

**Text:** Lecture notes and Mathematical Physics, by E. Butkov, Chapters 1 – 15.

## Course Description:

It is the first part of a two semester course continuing as Math/Phys 612 in the spring of 2013. In 611/612 we shall cover: functions of a complex variable, finite dimensional linear spaces, infinite dimensional spaces, generalized functions, linear ordinary differential equations of second order, special functions, Fourier series, Fourier transform, partial differential equations, Green's functions. Some other topics will be considered if time permits.

## Exams and presentation:

There will be two take home midterms and a take home final exam. Midterms will include all exercises from Lecture Notes plus some additional problems.

**Grades:** Are determined from:

- Two Midterms      **60%**
- Final                      **40%**

A Course grades are determined as follows (in interval notation):

<b>A+</b>	<b>(97,100]</b>	<b>B+</b>	<b>(87, 90)</b>	<b>C+</b>	<b>(77, 80)</b>
<b>A</b>	<b>(93, 97]</b>	<b>B</b>	<b>(83, 87]</b>	<b>C</b>	<b>(73, 77]</b>
<b>A-</b>	<b>[90, 93]</b>	<b>B-</b>	<b>[80, 83]</b>	<b>C-</b>	<b>[70, 73]</b>
<b>D+</b>	<b>(67, 70)</b>	<b>F</b>	<b>[0, 60)</b>		
<b>D</b>	<b>(63, 67]</b>				
<b>D-</b>	<b>[60, 63]</b>				

Borderline cases will be graded up or down based upon your overall performance (including attendance and class room participation).

**University and Department Policies:** Your work in this course is governed by the UAF Honor Code. Visit <http://www.dms.uaf.edu/dms/Policies.html> for the Department of Math and Statistics specific policies on incompletes, late withdrawals, and early final exams.

**Disabilities Services:** The Office of Disability Services implements the Americans with Disabilities Act (ADA). Please contact the Office of Disabilities Services (203 WHIT, 474-7043) to set up any necessary accommodations.

**Have a great semester and best of luck!!!**