

**Math. 611      Mathematical Physics      Fall 2007**

**Class meets:** TR 11:30 am – 1 pm NSCI 207

**Instructor:** Sergei Avdonin, Chapman 304A, phone: 474 5023, e-mail: ffsaa@uaf.edu, webpage: <http://www.dms.uaf.edu/avdonin>

**Office Hours:** MWF 10:30 – 12

**Text:** Butkov, “Mathematical Physics”, Addison–Wesley Publishing Co.

**Topics to be covered:** functions of a complex variable, finite dimensional linear spaces, infinite dimensional spaces, generalized functions, linear differential equations, special functions, Fourier series, Fourier transform, Laplace transform, partial differential equations, Green’s functions, elements of scattering theory, elements of perturbation theory, variational methods (if time permits).

**Examinations and Grading:** There will be weekly homework assignments, several in-class quizzes, presumably after each topic (chapter) and a take-home final exam (due at noon, Tuesday, December 18). A limited number of student classroom presentations will be offered. A successful presentation will improve your final grade. The final grade will be assigned based upon your overall performance.

**Policies and makeup exams:** DMS has reasonable policies on incompletes, late withdrawals, and early final examinations, etc; see <http://www.dms.uaf.edu/dms/Policies.html>.

You are covered by the UAF Honor Code. I will work with the Office of Disabilities Services (203 WHIT, 474-7043) to provide reasonable accommodation to students with disabilities.

Have a great semester and best of luck!