

SUBMITTED BY

NON-DESIRED

Trial Course

New Course

4. To be CROSS LISTED

no

Plves. (Date):

Cou

(Requires approval from department and deans involved. Add initials at end of form and such signatures.)

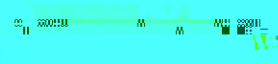
any core course compressed to less than 56 weeks

must be approved by the Academic Council

COURSE FOR

to require

Electrical



...se follows a different scheme each an...  
...variable credit, what is the maximum number of credit...  
...CREDITS...  
...the course can be variable

### 12. CREDITING SYSTEM

LETTER:

in the co



# ATTACH COMPLETE SYLLABUS (as part of this application)

Describe the student support services such as tutoring, legal aid, or regional, appropriate for the course.

## 17. Disability Services

The Office of Disability Services will determine if you are eligible for accommodations. Disabilities include (ADA) and insured that UAF students have the right to use campus and course materials.

## Prerequisites: Graduate course in Electrical Engineering or equivalent

### Course Description:

This course will present the basic techniques for solving

power system problems using numerical methods. The course will cover the following topics: power system modeling, load flow analysis, fault analysis, stability analysis, and optimal power flow. The course will be taught using a combination of lectures, discussions, and computer simulations. The course is intended for graduate students in electrical engineering who are interested in power system analysis.

nonlinear equations  
Eig value

homework is not accepted.

Course Outline:.

1. Eigenvalue Problems.

C. Self-adjoint Linear Eigenvalue Problems

D. Hermitian

2. Ordinary Differential Equations and Variational Methods

A. Taylor Methods

B. Runge-Kutta Methods

C. Multistep Methods

D. Laboratory

Hyperbolic PDE.

Equation - Elliptic PDE.

1.6 - Elliptic PDE

II. Heat Conduction - Parabolic PDE

iii. Wave equation

iii. Poisson's Equation

B. Finite Element Method

reasonable accommodation for students with disabilities...