SCHOOL ON TIME SERIES ANALYSIS
A One-Day Data Analysis School
Saturday, June 26, 1993
NIST Auditorium, Boulder, CO
Coordinator: Jeff Forbes

Sponsored by the CEDAR Workshop
and In Conjunction with
The GEM Workshop (June 28-July 1, 1993)

Tutorial lectures will be given on analyses of data time series from a practitioner's point of view. Time limitations preclude an exhaustive treatment of this extensive subject; however, for those without formal training in digital signal processing who are (or plan to be) engaged in analyses of data time series (perhaps using commercially-available software packages), this course will provide insight into the power and pitfalls of several popular methodologies. A common geophysical data set will be analyzed by all speakers to illustrate various points.

Time	Topic	Speaker
8:30	I. Introduction to the Fourier Transform -Fourier series -Continuous transform -Discrete transform -Autocorrelation functions and power spectra -Windowing	Prof. R. Clark U. New Hampshire
10:00	Break	
10:30	II. Error Analysis and Other Topics -Periodogram -Confidence and significance limits -Cross-correlation and cross-spectra	Prof. S. Avery U. Colorado
12:00	Lunch	
1:30	III. Filtering -Types of filters -Problems and pitfalls (ringing, phase distortion, etc.) -Complex demodulation -Sliding FFT	Prof. R. Vincent U. Adelaide
3:00	Break	
3:30	IV. Nonstationary Time Series -One or more of these topics: CNRS/LMD Wavelets Multispectral analysis	Dr. F. Vial
5:00	Panel Discussion	
5:30	Adjourn	