A. MISSION AND AREAS OF FOCUS
Florida Center for Analytical Electron Microscopy (FCAEM) houses two of the most advanced instruments that are used in Scanning Electron Microscopy and Microanalysis. The mission of this Center is to support fundamental research in Geological and Material Sciences at all major research universities in Florida, including Florida International University (FIU), University of Florida (UF), University of South Florida (USF), Florida State University (FSU), and University of Miami (RSMAS).

B. ORGANIZATION, EXTERNAL TRENDS AND STRATEGIC DIRECTIONS

1. Organizational Issues
FCAEM was formally inaugurated in April, 2001 by President Maidique and Provost Rosenberg. Professor Gautam Sen serves as its Director. At this time it has only one other employee, Mr. Thomas Beasley, who is the Engineer for the electron microprobe. The Center is in the process of hiring an Engineer for the Scanning Electron Microscope.

2. Advisory Board Members
   a) List of members
   Professor Michael R. Perfit, Professor of Geochemistry, University of Florida
   Professor Vincent J.M. Salters, Professor of Geochemistry, Florida State University
   Professor Jeffrey G. Ryan, Associate Professor of Geochemistry, University of South Florida
   Professor Jacqueline Dixon, Associate Professor of Petrology & Geochemistry, Rosenstiel School for Marine and Atmospheric Sciences, University of Miami
   b) Enhanced Program
   Not Applicable

3. External Trends
   The instruments are cutting edge today and will remain as such for the next 5 years.

4. Strategic Directions and Areas of Emphasis
   At this point, remote operation of the instruments is being developed at the Center. If successful, the objective will be to develop relationships with other Universities in Central and South America and perhaps other continents so that researchers and students overseas can use our facilities without having to make trip to South Florida.

C. 2000-2001 ANNUAL ACCOMPLISHMENTS

The Center was approved on December 12, 2000. During the remainder of the year, the director was developing the center; therefore, no mayor accomplishment was achieved during 2000-2001

D. 2001-2002 ANNUAL GOALS
Note: FCAEM is a major analytical center that provides research support for students and faculty in all Florida Universities and beyond (University of Arizona, University of West Indies). This is a relatively unique center in Florida. Participants using this center have their individual research goals and outcomes. FCAEM gets full credit for such activity.

2001-2002 Goal 1: (Addresses University Goal II) The Center will promote research activities by students and faculty.
   Measurable Outcome:
   Students and faculty using the facilities of the Center will publish at least 8 papers, including thesis and dissertation.

2001-2002 Goal 2: (Addresses University Goal III) The Center will promote international research and educational activities.
   Measurable Outcome:
   Faculty and students for universities in other countries (LACC countries) will use the Center facilities to conduct research and must acknowledge the Center in any publications resulting from such activity.

2001-2002 Goal 3: (Addresses University Goal V) The Center will continue cutting edge research that is expected of Doctoral Research Extensive universities.
   Measurable Outcome:
   There is appropriate measurable outcome for this criterion.

2001-2002 Goal 4: (Addresses University Goal I, II and V) The Center will allow its users to generate grant funding.
   Measurable Outcome:
   At least 1 or more grants will result over the next two academic years.

E. EXECUTIVE SUMMARY (1-2 page Summary)

1. Major Activities - Prior Year

The Center was approved in December 12, 2000. The Probe and the SEM have been in heavy use at this point. However, there were many glitches that needed to be worked out. FCAEM is a unique center in Florida. Thus far, three M.S. theses were completed and a doctoral student published a major research paper.

2. Major Activities - Coming Year

This is a major Florida-wide research and analytical support center. Its activities will continue as such. Research papers, thesis and dissertations will result from such activities, thus enhancing the reputation of FIU.