

John McGarity joined the Rice University Space Science Department in November 1966 to assist in the environmental testing of the Rice Owl Satellites. He helped develop and then operated an energetic particle calibration facility which characterized several sounding rocket sensors as well as the SSJ4 flown on the DMSP satellites and the TED (Total Energy Detector) flown on the NOAA POES satellites. In 1984 he joined the Emmanuel College Space Physics Division in Boston, Massachusetts and began the development of several instruments to characterize Space Weather. In 1987 he joined Amptek, Inc. of Bedford Massachusetts as the Director of Research. He guided the design and construction of the DMSP SSJ5 electrostatic analyzer, the SPREE (Shuttle Potential Return Electron Experiment) as part of a tethered satellite program, CEASE (Compact Environmental Anomaly Sensor Experiment), HEPS (High Energy Proton Sensor) on the DSX Satellite. He also developed the Amptektron (MD-501 and MD-502) which are simple continuous dynode electron multipliers used as beam monitors in many laboratories. He was part of the team that developed the Cool-X, a tiny x-ray emitter that was awarded the R&D-100 recognition. In 2006 he joined Assurance Technology Corporation in Carlisle, MA as a senior scientist. He is the principal investigator for the MPS-LO (Magnetospheric Plasma Sensor – Low energy) which is one instrument of the SEISS suite on the next series of GOES weather satellites. He is currently working with the Air Force on several next generation instruments.