

Friday, October 31, 2008
12:40 p.m. – 1:30 p.m.
Room 126
Engineering & Architecture Building

All are invited to attend
Pizza will be provided

Electrical and Computer Engineering Seminar*

Earth-Moon-Earth Communication – Amateur Radio Techno-Sport

Dr. Allen Katz, Ph. D.

Professor, The College of New Jersey

Abstract

Radio signals were first bounced off the moon by the US Army in 1946. Today the challenge of communicating by bouncing radio signals off of the moon, also known as EME for Earth-Moon-Earth, has become a popular techno-sport. Private individuals from over the Earth compete to see who can communicate with the most stations, from the most countries, at the highest frequency, and with the smallest amount of power. This talk will discuss the history, the technology, and try to answer the question of why people bounce radio signals off the moon.

Brief Biography

Dr. Allen Katz has been a licensed Radio Amateur since he was a teenager with interest primarily in the UHF/microwave frequencies and Moonbounce. He has been editor/publisher of the “432 and Up EME Newsletter for more than 30 years, before that he edited the VHF column for CQ magazine. He is a professor of Electrical Engineering at The College of New Jersey. He has more than 25 years of experience in the microwave and satellite industries. He holds 16 patents and has written hundreds of technical publications. He is founder and President of Linearizer Technology, Inc. He has received the ARRL Technical Merit Award, the ASEE's Western Electric Fund Outstanding Engineering Educator Award, the CSVHF Society's John Chambers Award, an IEEE Centennial Medal, the GE ASD Technical Excellence Award, three IEEE Region I Achievement Awards, the Martin Marietta Astro Inventor of the year award, an IEEE Third Millennium Medal, and the William Randolph Lovelace II Award for outstanding contributions to space science and technology from the American Astronautical Society. He is a Fellow of IEEE and a past Distinguished Lecturer for the Microwave Theory and Techniques (MTT) Society of the IEEE. He is a member of the Eta Kappa Nu, Tau Beta Pi and Phi Kappa Phi Honor Societies.

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