President's Report AESS BoG Spring Meeting

Monterey, CA April 29, 2004

This is my first report to the Board of G006Fvernors as President of the Aerospace and Electronic Systems Society (AESS).

Overall Tenure Goals and Priorities

For my term as president I would like to focus on several areas.

Firstly, I want to assure the continuance of AESS current activities and commitments and to have our products and services delivered with excellence and financial acumen. I will refer to this as our "Daily Management" responsibilities of AESS. Among these are AESS conferences, publications, standards and relationships to IEEE corporate and non-IEEE organizations.

Secondly, I want to focus on adding new products and services to AESS operations. These will be of two types: a) strategically planned based upon the BoG strategy developed over the past 7 years and b) opportunistic that come AESS' way and fit our goals.

Thirdly, I want to focus on improving the way AESS as a whole operates. This will include the processes we use and our relationships among the key AESS entities including but not limited to:

-AESS Board of Governors -AESS Conferences -AESS Publications -AESS Panels and Committees -AESS Chapters and Members

Three key areas of focus are to a) greatly increased two-way communication and shared goals, vision and implementation among these entities, b) enabling people to become more proactive in implementing and steering all AESS goals, and c) to focus on best practices and lessons learned that can be institutionalized from one like above entity to another.

Implementation Actions Taken

I. Daily Management

Daily management of AESS affairs will continue under the leadership of the existing AESS vice presidents. AESS has been well-tuned for several years to perform well the management of our current products and services including especially publications and conferences. This will continue.

2004 AESS Audit

A key task for year 2004 is an audit of AESS. This is done every 5 years by IEEE of each society. It involves a report and oversight of our operations and functions both to assure society performances and IEEE standards as well as uncover best practices that can be spread among all IEEE societies. I have asked Jim Leonard to lead this activity and Jim will report on this in his EVP Report. All society VPs will be involved with this.

Board of Governors Executive Leadership Team

In January 2004 a new AESS ELT or Executive Leadership was created to maintain AESS leadership lessons learned and knowledge, increased the diversity of advice affecting AESS decisions, distribute the leadership workload and assure greater AESS leadership continuity. The team consists of the four AESS Presidents: the senior and junior past presidents, executive vice president/president elect and led by the current president. Currently, this team is staff by Paul Kostek, Russ Lefevre, Jim Leonard and led by Paul Gartz. The team in part or whole has met several times in the past few months electronically and in person to discuss the overall goals laid out above the the means to achieve them.

II. New AESS Products and Services

Per our AESS Strategy developed over the past 7 years, AESS could add new products and services to fulfill our commitment to AESS members, our charter and meet to meet the emerging world needs in our field. We have discussed that we are well positioned to enter several areas. The two chosen for near term implementation are Education and Large-scale Systems and Integration.

Education and Training

Per our strategy and supported recently by the All Society Survey, AESS (and IEEE) members want more opportunities for education and training. As the work place "contract" between organization and engineering employee has shifted from mutual commitment to a more dynamic employment model engineers recognize the need to keep themselves current in their skills. Russ Lefevre in his tenure created a new position of AESS VP-Education. This will be continued and strengthened.

I have asked Jose Bolanos to temporarily lead this activity and build on a plan Scott Goldstein and his team created. Jose has already created much opportunity with IEEE corporate on IEEE tutorials, which he will report. Jose will also become our AESS Ombudsman for change and will work with a number of AESS officers and IEEE entities to convene "Working Together Teams" for implementation.

Large-scale Systems and Integration Panel

As we have watched out field evolve from sensors to more active processing of the information sensed to larger and larger scale system built around the information sensed, the real-time electronics in which we deal have become a greater element in all systems, their function, their costs and their utility. Today, in many domains, so called "Systems-of-Systems" (SoS) often using "Network-Centric Operations" (NCO) concepts have emerged or increased in priority focus both on the defense and civil sides of the governments and affect vast commercial markets. AESS has planned for this and even begun to address this in some of our conferences and publications (e.g., the DASC's evolution into ATM and joint publications with INCOSE on large-scale Systems Integration in the AESS Journal). Our goal is to formalize this and strengthen our structural organization to proactively respond to this.

A focal area for this is the Large-scale Systems and Systems Engineering Panel. I have created for Assistant Panel Committee Chair positions to lead us. The chairs include: Transportation SoS's, Security SoS's, Earth Observation SoS's all three of which cross-matrixed with a Systems Engineering Processes, Methods and Tools area. The former three will develop (and continue) to address the products and services needs of the three domains and the latter will provide the "how to".

The Transportation SoS will be led by Paul Kostek and will include oversight of the DASC conference. Paul has great experience at all levels of surface and air transportation and top leadership positions in AESS, ITSC and IEEE.

The Security SoS will be led by Bob Rassa. Bob brings tremendous experience with the whole defense community, NDIA leadership and AESS leadership. Security will be taken to include traditional defense, homeland security and intelligence services. A new potential conference in Defense and Security SoS's has been discussed with Bob.

The chairs for the Earth Observation SoS and Processes are still being sought.

Advisory Committee to NOAA

NOAA (the US National Oceanic and Atmospheric Administration) has embarked on a set of long term changes to use SoS and NCO approaches as well as global partnerships to improve earth observation and stakeholder benefits from the process observations (weather, climate, ocean state, etc. predictions). An IEEE Committee was begun to advise NOAA. The key participant societies are Geosciences and Remote Sensing, Ocean Engineering and AESS. I have asked Bob Trebits to be our AESS rep. Bob will report on the status.

III. Improving Best Practices

This is always a useful activity for an organizational entity...and often difficult as change always is. This will be sought through the participation of the VPs both to discover potential area and implement them. Several areas suggested are listed below.

People, Communication and Chapters

AESS is a vast organization of thousands of members and chapters all over the world. Very few have any contact with or knowledge of the AESS BoG, who we are or what we do. To many AESS and IEEE leadership look like a large bureaucracy to which they have no access...up or down. This offers us potential to improve. Each chapter in each state or country has local market knowledge of the industrial, academic and governmental activities in which its chapter participants work. Our plan is to engage these chapters and members in a two-way dialog with the AESS BoG. We will want to discover their needs and provide our strategy and seek their help.

Iram Weinstein began initial exploration of this opportunity. More will continue as we get organized.

Distinguished Lecturers

DLs are one of the services AESS provides. I have asked Jim Huddle, VP-Techncial, to develop a selection criteria. DLs can be a source of tutorials for Education and we would like to consider expanding and advertising our DLs. Jim will provide an initial report.

Single Source of AESS Data

We use multiple sources of data for AESS reference. I have asked Bob Trebits, VP-Administration, to examine this entire area and recommend and implement a single source of AESS Data such as all AESS leaders, positions and responsibilities and have this downloadable from the web for anyone.

Personal

Due to medical conditions, I will be on medical Leave of Absence. Jim Leonard will assume daily management responsibilities for AESS, but I will be available.

Submitted,

Paul E. Gartz President, AESS