

# mouth MESSAGE

Published for the military and civilian personnel of Fort Monmouth, NJ

June 28, 1996

## Night Vision director retires after 38 years

Carla Maiden  
ESD, CECOM RDEC

On July 3, Dr. Rudolf G. Buser will retire as the Director of Night Vision and Electronic Sensors Directorate (NVESD), Communications-Electronics Command (CECOM), Research, Development and Engineering Center (CERDEC), Fort Belvoir, concluding a 38-year Federal career.

Buser has received numerous distinguished awards and recognition throughout his career. He has more than fifty publications and patents to his credit.

Throughout his career he has participated in helping to structure the Army investment in the electronics/laser/sensor area and served on many prestigious panels, both national and international.

Buser is a member of the American Physical Society, Institute of Electrical and Electronic Engineers (IEEE), and a Fellow of the Optical Society of America.

### Early history

Buser was born in Ludwigshafen, Germany on May 19, 1929. He received his doctorate in Natural Sciences from the University of Munich, Germany in 1957. His Masters and Bachelors degrees were also earned at Munich in 1954 and 1951, respectively.

Before coming to the United States, his experience consisted of a project leader position for advanced concepts for digital and analog computers at Siemens Corporation and an assistant professor in physics at the University of Munich.

Buser's civil service career began in 1958 as the Team Leader and Technical Area Chief at the Institute for Exploratory Research here.

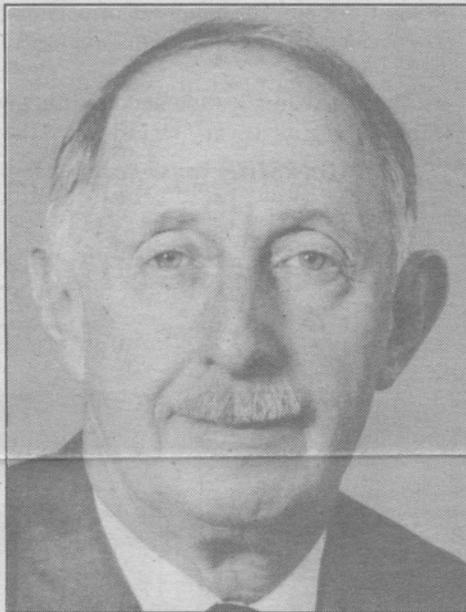
He used his expertise as a research physicist here until 1979 when Army laboratories restructured.

Buser then joined Night Vision and Electro-Optics at Fort Belvoir, Va. where he became the director of the Laser Division. The development of laser rangefinder/designator/trackers, laser radars, laser identification friend or foe, laser countermeasures, and laser aided surveillance and target acquisition systems flourished under his leadership.

### Special recognition

leader in this critical defense technology arena. The organization consistently realized an annual investment income exceeding \$300 million and has a 650 strong government work force.

The group is recognized throughout the national and international communities as leaders in all sensor related fields of endeavor including thermal imaging, image intensifiers, laser, radar, aided target recognition, camouflage, countermeasure, sensor fusion, platform protection sensors, sensor modeling, and systems/subsystems technologies.



Dr. Rudolf G. Buser

Buser's management and technical capability have brought NVESD to the forefront in research and development within the DoD industry, and academia, providing the sensor technology necessary to meet critical requirements of military, paramilitary and commercial markets.

His personal insight and leadership have led to major changes in methodologies for insertion of state-of-the-art technology to fielded systems. A new concept he created, entitled Second Generation Forward Looking Infrared Horizontal Technology Integration (FLIR HTI), entails the upgrade of advanced thermal imaging technology.

Second Generation FLIR HTI offers, for the first time, significant improvements in war fighting.

The savings using this approach is es-

into the next century.

Supporting the integration and optimization process within the CECOM community, he has taken the lead in the areas of Soldier Systems, Rapid Force Projection Initiative, and Image Compression/Transport for the CERDEC.

Recent transitions of technology under his purview will enable the Army/DoD to maintain its world leadership in sensor fields.

His commitment to the "Ultimate User", the soldier, pervades the organization. He provides key technical guidance to customers and personally directs program activities in the acquisition process.

He has established technical liaison positions within key Army Battle labs and field units to allow the user the opportunity for hands-on work with the directorate's technology products to provide the necessary feedback for systems improvements to meet critical user requirements.

The most significant endorsement of Buser's contribution to the Army mission came out of the accolades received during the Desert Storm operations.

The advantage of the systems developed by NVESD was the most dramatic during the war.

The role Buser has established for NVESD as a partner with industry in technology, adjudicator of technologies, and successful transitioner of technology to the Armed Forces and civilian world is a model for the DoD laboratory of the future.

He has served as the Army representative to the Electronics and Sensors Technology of the DoD Laboratory Infrastructure Capabilities Study. His ideas and political savvy were significant contributors to the tri-service position and data packaging for the non-government panel.

As a result, the product delivered was lauded by the receiving non-government panel and will play a significant role in the streamlining of DoD electronics and sensors programs.

He continues to reach out to world communities through cooperative agreements of information exchange and technology transfer.

"Spin-on and Spin Off" technology demonstrations which were held during November, 1994 at the First Army Dual Use

quisition systems flourished under his leadership

## Special recognition

In 1983, Buser received the meritorious Civilian Service Award for his contributions to the Intelligence and Security Command in the field of electro-optics.

He accepted the position of associate director for Science and Technology at Night Vision in 1984 and continued his career there as director beginning in 1988. His most recent accomplishments include the Superior Accomplishment Incentive Award in 1994 and the Infrared Information Symposium's Lifetime Achievement Award for Meritorious Service to the Military Laser Community in 1995.

## Accomplishments

As director of NVESD, Buser has forged path for his organization as the world

Second Generation PLER III Officers, for the first time, significant improvements in war fighting.

The savings using this approach is estimated at \$820 million.

This approach is now being pursued by the Army for Aviation Platform Application as well.

## Advancements

Under his leadership as director, NVESD, Buser has completed major Army Advanced Technology Demonstrations (ATD) for sensor fusion, passive air defense, close-in manportable mine detection and radar deception and jamming.

He currently has the lead for six ATDs, one DoD Advanced Concepts Technology Demonstration (ACTD) as well as supporting several other key ATDs/ACTDs. These technology demonstrations provide the basis for technology integration for U.S. forces

fer.

"Spin-on and Spin Off" technology demonstrations which were held during November, 1994 at the First Army Dual Use Exposition at Fort Belvoir, Va. provided the first look at the significant opportunities in sensor technology has to the commercial markets and the opportunities "Commercial Off the Shelf" products have within military sensor efforts.

He has taken the sensor technology to the individual states to support key activities associated with a "Smart America" and is currently working with New Jersey to transfer technology to enhance their transportation, education and medical infrastructure and with Virginia, utilizing NVESD technology.

Given the current DoD budget constraints, Buser has established a new way of conducting Research and Development.★