Presents an
Information Sciences and Technology Seminar

"Actionable Intelligence and Alerting in Massive Information Environments"

by

William E. Binney and J. Kirk Wiebe
National Security Agency

Friday, November 9, 2007

11:15 AM – 12:15 PM

113 IST (Cybertorium)

Abstract

The volume, variety, and velocity of data pose major challenges for the successful analysis of information where the business goal is to interdict the actions of a foe intent on either stealing information from, or conducting an attack on, an unsuspecting target.

Effective responses to these obstacles lie in the application of strategies, techniques, and discipline that work together to make it possible to produce actionable (tactical) intelligence based on an in-depth, strategic examination of the behaviors of suspected Entities-of-Interest (EOIs) and Communities-Of-Interest (COIs), as observed in data and other sources of information.

About Mr. Binney

Since 2001, Mr. Binney has been a consultant on analysis and analytic techniques to various agencies of the US government intelligence community - NSA, CIA, NRO and Customs and Border Protection in the Department of Homeland Security. From 1970 to 2001, Mr. Binney was an employee of the NSA. As an NSA employee, Mr. Binney held numerous positions: Technical Director of the World Geopolitical and Military Analysis, Operations Directorate analysis skill field leader, member of the NSA Senior Technical Review Panel, Chair of the Technical Advisory Panel to the Foreign Relations Council, co-founder of the Automation Research Center, an Agency Representative to the National Technology Alliance Executive Board, and Technical Director of the Office of Russia as well as the leading analyst for warning for over 20 years.

Over the years, Mr. Binney applied mathematical discipline to collection, analysis and reporting. In the process, he was able to structure analysis and transform it into a definable discipline, making it possible to code and automatically execute the functions without human intervention from the point of collection to the end report. The successful automation of analysis formed the foundation for prototype developments in the Automation Research Center; demonstrated how to handle massive amounts of data effectively and relate results to military and other customers; and, formed the basis for organizing an international coalition of countries to develop and share technology advances.

About Mr. Wiebe

Although born in Chicago, Illinois, Kirk grew up in northern Indiana, near the shores of Lake Michigan. After spending four years that included tours of duty in Turkey and Japan with the intelligence arm of the United States Air Force during the period 1963 – 1967, Kirk attended Indiana University, receiving a B.A. degree in Russian Studies in 1969, and a Masters (also Russian) in 1974. Kirk then headed east to work for the National Security Agency (NSA), retiring from that Institution in October of 2001. While at NSA, he spent most of his career as a language analyst and as an intelligence analyst working on issues having national-level importance.

Among his achievements during his 32+ years at NSA, he led a team of analysts that received the National Meritorious Unit Citation from the Director of the Central Intelligence Agency, and he was awarded the Meritorious Civilian Service Award, the NSA's second highest honor. During his career, Kirk also held positions with NSA's Human Resources organization, its Information Technology organization, and he worked with other analysts, programmers, and computer scientists engaged in prototyping innovative capabilities in the area of managing and processing massive data for successful analysis.

After retiring from NSA, Kirk joined two colleagues in the formation of a small consulting business focused on helping U.S. government agencies with data management and analysis issues. His most recent work was with the U.S. Customs and Border Patrol (CBP) of the Department of Homeland Security where he performed analysis of CBP data, completed a business process analysis of the CBP analytic process, and submitted recommendations regarding CBP IT-based modernization efforts.

Kirk is married, has two daughters, two Pembroke Welsh Corgis, and lives in rural Carroll County Maryland, about 16 miles due south of the Gettysburg battlefield. His hobbies include landscaping and gardening, Amateur Radio (licensed as K9IQB since 1956), building computers, exploring the Internet, rhythm guitar, studying the Battle of Gettysburg, and traveling whenever he can.