CAREER DEVELOPMENT AND HIRING TRENDS INTO THE 21ST CENTURY

The demand for Information Security professionals is continuing to grow. Yet, the next five years will bring further advances and shifts in paradigms and likely continued shortages of a skilled and trained labor force.

How do we address this shortage? I suggest we address it through continued training, continued education and continued awareness opportunities. We are moving into the digital age. Securing our information is vital to business, government and to every private citizen. To assure privacy there will be an ever increasing need for security professionals. There is a real shortage of knowledgeable and skilled security professionals.

To meet these challenges, companies must re-train their staff, both in realistic on-the-job situations and in simulations. Companies must keep pace with the fast paced evolution of IT and security. They must continually offer training opportunities in current, new and emerging technologies to keep up with the pace of change.

When hiring, companies are looking for exact matches to their staffing needs. At the same time, however, companies need to be flexible and understand that the availability of information security talent is scarce. This issue is being addressed in a few specific situations. Some companies are willing to hire individuals who may not exactly fit, but who are adaptable to change and open to continual learning. A common thread however is a strong educational background.

It has been suggested that a person with a degree is more apt to bring a strong foundation of understanding. Whereas a person without a degree may be an expert in a specific area, but not as flexible in transitioning to a new area because of the lack of business acumen.

Businesses and vendors are now partnering with educational institutions to build strong IT and security talent to meet the challenges of the 21st century. Academia is preparing graduates of fill Infosec shortages and meet the growing demand for information security specialists. Enrollment in certification classes is also increasing and in some instances, companies are also looking for the CISSP.

Companies are reviewing their bottom line and having a difficult time understanding why they must spend so much money on training and awareness when they see no tangible return on investment. As we have seen throughout the evolution of information security, no one can actually define what it is. That is still so today. Companies large and small know it is imperative that they protect their data. For example, credit cards now have photo images of the cardholder and passwords are needed to get onto most computers.

Security professionals need to effectively communicate what information security is and how it impacts the business. Many times consultants are called into organizations to address security products, security policy and most important security implementation.

The demand for security professionals continues to grow at an accelerated pace. Through continued education, training and awareness we will continue the journey to addressing the shortage of talent in the information security community.

Panelists

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As founder and President of Internet Resources, Marla Collier is a nationally recognized retained executive search consultant. Specializing in Information Security recruitment since 1987, she successfully identifies and recruits key infosec personnel for large Fortune 100 companies, product companies, startup organizations and government labs. She has an extensive understanding of the technology. Well known in the US infosec community she has addressed several conferences, conventions, and seminar audiences on the subject of professional team building and staff development.

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Mr. Inskeep has over 15 years of Information Security experience ranging from military communications through policy, security evaluation, trusted operating systems, secure applications including PCMCIA cards and smart cards, and Public Key Infrastructure implementation. After a variety of work at the National Security Agency, Mr. Inskeep joined NationsBank as it began merging with Bank of America. At Bank of America, Mr. Inskeep explores, develops, and documents security architecture across various bank projects. These projects include distributed secure applications, secure connections to legacy systems, and application architectures for demilitarized zones (DMZ) within the firewall system. His focus is on the bank's internal PKI implementation, and the bank's implementation of the Identrus PKI - an international banking effort to enable trusted electronic commerce world-wide.

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G. Mark Hardy is Director of the Professional Services Division at Secure Computing Corporation. Prior to his current position, he was the principal spokesman for AXENT Technologies, Inc., speaking at over 40 conferences, shows, and seminars last year. Mr. Hardy has worked in the information security industry since 1976, consulting to government, military, and commercial clients. His professional background includes information security planning and policy development, data encryption and authentication (including breaking commercial cryptographic algorithms), software development and strategic planning for electronic commerce, and writing commercial risk assessment software.

Mr. Hardy has served on three ANSI security committees (X12, X9F, and X9E9), writing security standards for electronic commerce and the financial industry. He has developed security plans for several U.S. military commands in the United States and Europe, and developed the communications security encryption requirements for a military satellite program. A popular speaker, he also writes about security issues, and is the primary author of the Information Security Handbook for Enterprise Computing and the Client/Server Security Handbook, and was a contributing author to Network Security Secrets.

Mr. Hardy holds degrees in Computer Science and Mathematics from Northwestern University, and earned his Executive MBA at Loyola College of Maryland.

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Ira Winkler, CISSP is considered one of the world's leading experts on Information Security, Information Warfare, investigating information related crimes, and Industrial Espionage. He is author of the book, Corporate Espionage, and the new bestseller, Through the Eyes of the Enemy. He is also President of the Internet Security Advisors Group. His clients include some of the largest companies and banks in the world. He is also a columnist for ZDTV with his column titled Spy Files.

He is a specialist in penetration testing, where he infiltrates companies, both technically and physically, to find and repair an organization's weaknesses. He has appeared on dozens of national, international, and local television and radio shows, including CNN, Good Morning America, CSPAN, MSNBC, and The G. Gordon Liddy Show, as an expert on information security and industrial espionage. Major publications have dubbed him, "A modern day James Bond" and one of the world's leading security experts. He also teaches for the Johns Hopkins University and the University of Maryland.

Previously, Mr. Winkler was with the National Security Agency and was the Director of Technology with the National Computer Security Association. He has also performed studies on Information Warfare for the Joint Chiefs of Staff. He is also on a pseudo-advisory group to the National Infrastructure Protection Center.

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Dr. Rayford Vaughn is currently a professor of computer science at Mississippi State University where he conducts research in the areas of Software Engineering and Information Security. Prior to joining the University, he completed a twenty-six year career in the Army where he commanded the Army's largest software development organization and created the Pentagon Single Agency Manager organization to centrally manage all Pentagon IT support. After retiring in June 1995, he accepted a position as Vice President of DISA Integration Services, EDS Government Systems where he was responsible for a wide variety of contracts and customer satisfaction.

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Jeremy Epstein is Principal Computer Scientist and Manager of the Network Security Integration group at NAI Labs, the advanced security research division of Network Associates. Jeremy's group develops prototypes and integrates COTS, GOTS, and research prototype security capabilities to provide improved resilience to attacks, primarily through layered defenses. Specific areas of interest include improved firewalls and guards. In previous lives, Jeremy was the project manager and chief engineer for government security evaluation of the NetWare and Assure products, chief engineer for a multi-level secure (MLS) windowing research prototype effort, and lead engineer for a multi-level secure (MLS) UNIX product. Along the way he's published two dozen conference papers, developed a reputation as a gadfly, and grown a really cool ponytail