

Exponent®
Engineering & Scientific Consulting

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Professional Profile

Senior cybersecurity and engineering leader with 25+ years of experience guiding national-level programs in identity management, smart card technology, cybersecurity, privacy engineering, and critical infrastructure protection. Trusted advisor to the U.S. Department of Defense (DoD), federal agencies, and global manufacturers on secure credentialing, mobile device security, ICAM (Identity, Credential, and Access Management), and digital identity ecosystems.

Cleared and certified at DoD IAM Level III, with extensive hands-on testing, systems analysis, and failure diagnostics expertise for complex secure technologies including FIPS 201-compliant systems, e-passports, IoT, RFID, mobile credentials, and derived authentication mechanisms. Recognized authority in implementing and interpreting ISO/IEC, ANSI, UL, ASTM, and DoD technical standards.

Founder and former general manager of Exponent China, establishing international operations and technical collaborations advancing secure identification, cryptographic device validation, and privacy compliance. Patented inventor (RFID shielding technology) and frequent conference speaker, panel chair, and expert witness on secure infrastructure and credential performance.

Core Competencies

- National Security & Critical Infrastructure Cybersecurity
- Identity Management (ICAM), Credentialing & Smart Card Systems
- Digital & Mobile Credential Architecture (FIPS 201, CAC, PIV, Derived Credentials)
- DoD & Federal Standards Compliance (ISO/IEC JTC 1 SC 17 / SC 27, ANSI, NIST, FIPS, GDPR, CCPA)
- Cryptography, Quantum-Resistant Security & Privacy Technologies
- Performance, Reliability & Failure Analysis for Secure Systems
- Risk Management Framework (RMF) & Cybersecurity Governance
- Expert Witness Testimony & Technical Report Authoring
- International Standards Leadership & Strategic Liaison Roles
- Multilingual Communication: English, French, Mandarin Chinese

Academic Credentials & Professional Honors

M.S., Aeronautical Engineering, Stanford University, 1996

B.S., Mechanical Engineering, Stanford University, 1995

Henry O. Fuchs Award for Excellence in Design, Stanford University, Department of Mechanical Engineering

Award for Excellence in Engineering Design, American Society for Engineering Education

Licenses and Certifications

Professional Engineer Mechanical, California, #31027

Advanced Card Education (ACE)

Certified Cyber Security Architect (CCSA)

Certified Smart Card Industry Professional (CSCIP)

Certified Smart Card Industry Professional for Government (CSCIP/G)

US Department of Defense 8140 Directive GIAC Certificate

GIAC Critical Controls Certification (GCCC)

GIAC Information Security Fundamentals Certified (GISF)

Professional Affiliations

Secure Technology Alliance (STA) Member

STA Identity Council Member

STA Access Control Council Member

International Committee for Information Technology Standards (INCITS) Committees:

CS1: Cyber Security Principal Member

B10: Cards and Security Devices for Personal Identification Principal Member

B10.11: Physical Characteristics and Test Methods Principal Member

B10.12: IC-Cards - Circuits, Interfaces and Protocols for Secure Devices Principal Member

B10.8 – Driver’s License/ID Cards Principal Member

ISO/IEC JTC 001/SC 17/AG 02 "Virtual ID and related technologies" Member

ISO/IEC JTC 001/SC 17/WG 01 "Physical characteristics and test methods for ID-cards" Member

ISO/IEC JTC 001/SC 17/WG 03 "Identification cards - Machine readable travel documents" Member

ISO/IEC JTC 001/SC 17/WG 04 "Generic interfaces and protocols for security devices" Member

ISO/IEC JTC 001/SC 17/WG 08 "Integrated circuit cards without contacts" Member

ISO/IEC JTC 001/SC 17/WG 10 "Motor vehicle driver license and related documents" Member

ISO/IEC JTC 001/SC 17/WG 11 "Application of biometrics to cards and personal identification" Member

ISO/IEC JTC 001/SC 27/WG 01 "Information security management systems" Member

ISO/IEC JTC 001/SC 27/WG 02 "Cryptography and security mechanisms" Member

ISO/IEC JTC 001/SC 27/WG 03 "Security evaluation, testing and specification" Member

ISO/IEC JTC 001/SC 27/WG 04 "Security controls and services" Member

ISO/IEC JTC 001/SC 27/WG 05 "Identity management and privacy technologies" MemberAmerican Society of Mechanical Engineer (ASME) Member

American Institute of Aeronautics and Astronautics (AIAA) Member

International Card Manufacturers Association (ICMA) Member

International Association of Privacy Professionals (IAPP) Member

Secure Document Alliance (SDA) Member

Languages

French (France)

Mandarin Chinese

Patents

US Patent No. 7,936,274: Shield for Radio Frequency ID Tag or Contactless Smart Card, issued May 3, 2011 (Shkolnikov Y, Du Y, McGoran B).

Publications

Mr. McGoran has authored or co-authored a large number of reports addressing reliability, interoperability, and performance of secure credentials and systems, smart cards, identity management and access control systems, processes, and equipment. Copies of non-confidential reports are available upon request. Mr. McGoran also routinely publishes articles or interviews in leading journals covering this technology. He has hosted panels and been a keynote speaker at Secure Technology Alliance Conferences, National and International Conferences such as TrusTech, and agencies and installations such as the Pentagon.