

WAYNE KIRK SCHMIDT

Open to engagements in security, ML/AI, and platform engineering: fractional, advisory, or full-time.

PROFILE

Principal Technologist and security platform builder with 30+ years designing, building, and operating mission-critical systems at institutional scale, built with Security, DevOps and ML/AI as the core and foundation.

Built Production Perimeter, a patented ML-driven adaptive security enforcement platform acquired by Illumio. Built BEACON, a ML-driven compromise detection system reducing identification time by 97% across large fleets. Built ARK, a ML-driven dependency management platform across 60,000+ hosts, and perimeter engineering team lead at Morgan Stanley New York across 80+ institutional trading locations.

Hands-on background in zero-trust architecture, threat detection, distributed systems, and AI-driven security automation, combined with executive ownership of Tier-0 systems under adversarial and regulatory pressure.

Security Engineering · Zero-Trust Architecture · ML-Driven Threat Detection · Distributed Systems · Multi-Cloud Infrastructure · Auth & Identity · Platform Engineering · AI/ML in Production

EXECUTION	LEADERSHIP	ADVISORY
Distributed, low-latency, AI-enabled systems at scale. Hands-on depth across DevOps, ML/AI, and Security from 60K+ host fleets to ULL data platforms.	Engineering and operations ownership across Tier-0 systems and \$107M+ portfolios. Teams up to 30 engineers across global and regional operations.	Supported 60+ clients across 6 industries and 4 regions, allowing SME, MSSP, and Enterprise to navigate platform risk, security, operations, and transformation.

SIGNATURE OUTCOMES

REALIZED	GUIDED	DELIVERED
\$300M+ measured impact across products, services, and portfolios in AMER and APAC.	5 zero-to-one production-grade platforms across security, finance, and operations.	90+ initiatives in system stabilization, digital transformation, and operational excellence.

- Invented **Production Perimeter**, a ML-driven security platform deployed globally: patented IP later acquired by Illumio.
- Delivered **NXT RAW**, a ¼µs ultra-low latency market data platform generating **\$14M+** in revenue supporting multiple APAC markets.
- Led a **\$107M** market data portfolio over **7 APAC** markets, **30-person** team, **15 vendors**, consistent sub-millisecond performance.
- Built **ARK**, ML-driven dependency platform for **60,000+** hosts, reducing deployment risk by **97%**, speeding releases **17x**.
- Redesigned event management for US MSSP, reducing response from **20 minutes** to **10 seconds** at **1.5 million events** per minute.
- Delivered Jira/Power Automate AI workflows for a LATAM bank, cutting incident management from **2 person-weeks** to **15 minutes**.

Detailed Delivery Case Studies: casestudies.changeis.io

PROFESSIONAL EXPERIENCE

ChangeIS | **Founder & Principal Technologist** | **Tokyo, Japan** | **2013 – Present**
Independent advisory and engineering practice in ML/AI, DevOps, and security orchestration across finance, insurance, and technology globally.

- Built a Kafka-Logstash-Grafana observability platform for a US MSSP, reducing incident response time by **99.16%**.
- Deployed ML-driven log analysis platform reducing issue triage effort by **85%** and reducing MTTR by **3x**.
- Created ML-driven asset platform for global insurance firm, raising accuracy to **99.9%**, reducing reporting lag by **99.93%**.

Insight Innovation Fund | **Head of Product (Fractional / NED)** | **Tokyo, Japan** | **2024 – Present**
Patented **MORPHOS/9STACK®**, a distributed reasoning-based AI orchestration framework for private, adaptive, edge deployment. Directed product architecture and enterprise AI solutions, advising on go-to-market, partnerships, and M&A strategy.

Sumo Logic Japan, K.K. | **Senior Solution Engineer** | **Tokyo, Japan** | **2018 – 2022**
Built **10+** vendor integrations across security and DevOps, expanding platform addressability for enterprise clients. Developed automated monitoring tooling reducing deployment time by **82%**, adopted as the APAC reference tooling. Authored **40+** client solutions across DevOps and observability, supporting renewals and expansion revenue in Japan.

Tanium G.K. | Executive Director – Technical Account Management | Tokyo, Japan | 2015 – 2016

- Created **BEACON**, a ML-driven compromise threat detection system, reducing compromise identification time by **97%**.
- Built **BRAVO**, a ML-driven testing framework saving an estimated **\$1.8M** in engineering effort.
- Architected compliance reporting for **1,000+** Fuji Xerox printers via Tanium, shortening audit/reporting cycles from weeks to days.

Smart Technology Partners | Chief Technology Officer (Fractional) | Japan | 2013 – 2016

- Designed a green energy cloud architecture using refurbished hardware, delivering sustainable infrastructure for 10+ clients.
- Delivered Digital Transformation proposals for regional government clients across Fukushima and Kumamoto prefectures.
- Developed cloud solutions across logistics, genetic data processing, and data center security.

Nomura Securities | Executive Director – Asia Head of Market Data / Global Head of Market Data Engineering | Tokyo, Japan | 2009 – 2013

- Managed a **\$107M** portfolio over **7 APAC** markets, **30-person** team, and **15 global vendors** supporting trading and retail functions.
- Delivered **NXT RAW**, a ¼µs ML-driven TSE data platform generating **\$14M+** in revenue.
- Built a DevOps automation framework reducing engineering effort by **70%** across a **\$25M** project portfolio.

Morgan Stanley Securities Japan | Vice President – Infrastructure Architect, Asia-Pacific | Tokyo, Japan | 2003 – 2009

- Designed **ARK**, ML-driven dependency management supporting hosts, reducing deployment risk by **97%** and releases by **17x**.
- Delivered **Production Perimeter**, a patented self-learning ML firewall preventing hundreds of millions USD in potential trading losses.
- Rebuilt Asia Equities QA and Integration Testing Environment, resolving systemic regional stability issues, increasing reliability to **99.93%**

Morgan Stanley | Vice President – Perimeter Security Engineering | New York, New York | 1998 – 2003

- Built **AEGIS**, cross-platform security and configuration management across 80+ institutional trading locations.
- Built **ARGUS**, a firewall lifecycle automation suite coordinating global plant builds and reducing misconfiguration risk.
- Led the firm's Y2K global security infrastructure refresh, replacing at-risk legacy systems across global operations.

EARLY CAREER: BOSTON & NEW YORK

Systems and infrastructure roles establishing technical foundations in networking, distributed systems, and enterprise platforms:

- GTE Internetworking Systems: automated provisioning across **500+** servers, improving restore performance by **20x**.
- Wildfire Communications: led 4-person sysadmin team, automating Windows NT provisioning from **7 hours** to **20 minutes**.
- Pencom / Collective Technologies: architected Tivoli-based software deployment platform for a **5,000**-laptop fleet.
- Salomon Brothers: fixed income trading support, delivered **15x** reduction in risk calculation time, **\$1.3M** procurement savings.

PRODUCTS & PATENTS

MORPHOS/9STACK®	Reasoning-based AI orchestration; private, adaptive, edge-ready, with memory, context, and bounded ethics.
Production Perimeter®	ML-driven adaptive firewall; self-learning security enforcement across LAN, MAN, WAN. Acquired by Illumio.
NXT RAW® / NXT	Ultra-low latency market data delivery; sub-¼ microsecond signal delivery at institutional scale.
BEACON®	ML-driven threat detection system; 97% reduction in compromise identification time across endpoint fleets.

Additional patents and products in event management, operational orchestration, security automation, and distributed systems architecture.

SELECTED TECHNICAL SKILLS

DevOps / Automation	Python, Bash, PowerShell, Ansible, Terraform, Puppet, Chef, Kubernetes, Docker, VMware, Jenkins, GitHub Actions, GitLab CI, AWS, GCP, Azure, OpenStack, Kafka, RabbitMQ, Tibco, Splunk, Sumo Logic, Elastic Stack, Grafana, Prometheus, Nagios
ML / AI Systems	scikit-learn, XGBoost, LightGBM, TensorFlow, PyTorch, LangChain, spacy, NumPy, Pandas, Reasoning architecture design, Adaptive workflow systems, Low-latency ML inference, Edge & federated deployment, MORPHOS/9STACK® (patented), Matplotlib, Plotly, Dash
Security / Resilience	Tanium, CrowdStrike, Auth0, Recorded Future, Zeek, eBPF, Zero-trust architecture, NIST 800, ISO 27000, COBIT, SOX, ISO 31000, Checkpoint, Cisco, Arista, Palo Alto, ML-driven threat detection, Compliance & audit automation, Wireshark, Rkhunter

Additional Capabilities: waynekirkschmidt.me/technical

EDUCATION & LANGUAGES

Ohio State University — B.S. Physics (dual study: Physics & Fine Arts)

Adjunct Professor, Continuing Education — New York University · Programming, Networking, and Security

English: Native Japanese: Professional working proficiency · JLPT N3 · N2 in progress