

Building and Scaling a Statewide Educational Cyber Range

Real-World Data, AI/ML, and Hands-On Cybersecurity Education

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What is Cyber Range Poulsbo?

- Shared cybersecurity education ecosystem
- Combines technical infrastructure with human collaboration
- Scalable Hands-on learning, workforce, and research opportunities across Washington state

More Than a Technical Lab



As a **shared cybersecurity backbone and a human-centered ecosystem**, Cyber Range Poulsbo supports education, applied research, and cross-institution collaboration.



At our core, we provide secure, hands-on environments via cloud-based delivery and browser-based accessibility to facilitate learning without risk to live networks or sensitive data.



Services are provided at no cost to schools in Washington—K12, colleges, and universities—and select partner organizations.

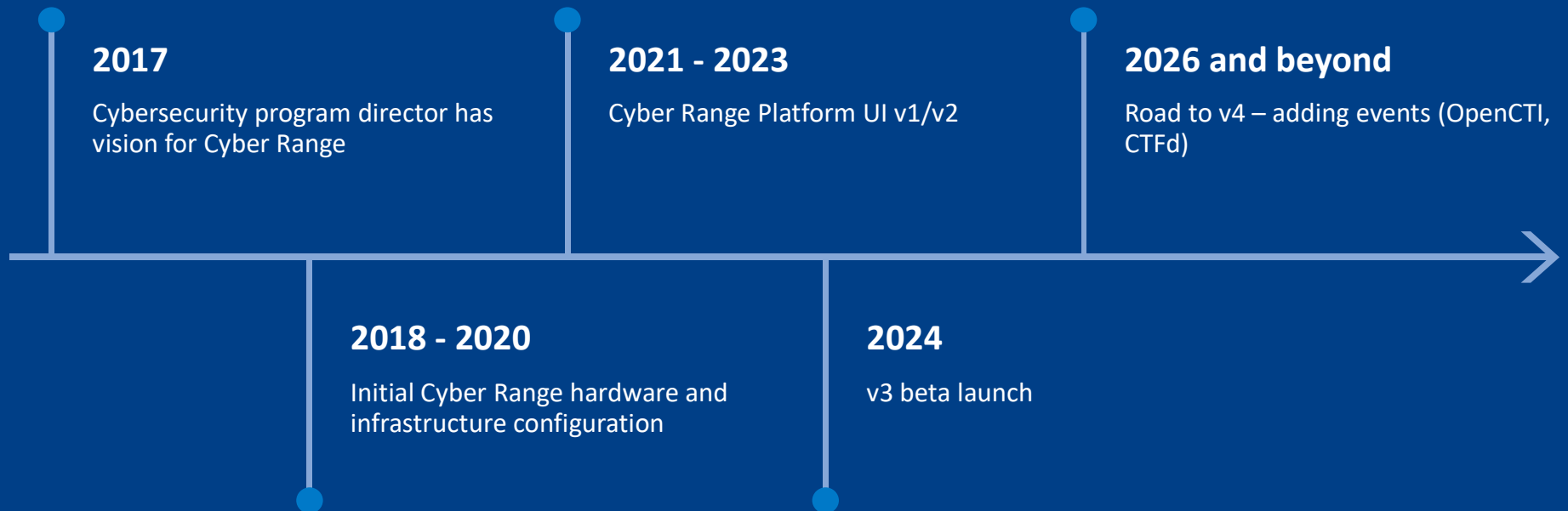


Our approach to system architecture and services is intentionally flexible, allowing for **many use cases, many institutions, and statewide impact**.

Cyber Range Services

Education	Lab Curricula Virtual Environments
Experiences	Specialized Stacks Live Data
Events	Group Training Team Challenges
Exchanges	Capstone Projects Research & Development

Timeline



Live Real-World Data

- Honeypots
 - Live honeypots capturing real attacks
- Public Infrastructure Security Cyber Education System (PISCES)
 - Large scale monitoring of real public secure network traffic
 - A live feed most students never get near
- Cyber threat intelligence feeds

Capstones: Bringing it together

- Place where industry and students converge
 - Proving ground - learn, train, build, deploy
 - Portfolio development
 - Research
 - Career pipeline

Proven and Ready to Scale

Layer 1: Infrastructure (The Foundation)

- Cost-engineered commodity compute & high-speed networking

Layer 2: Platform (The OS)

- Custom, multi-tenant, zero-licensing, identify & federation

Layer 3: Application (The Capability)

- Virtual Internet, PISCES, Honeypot Stack

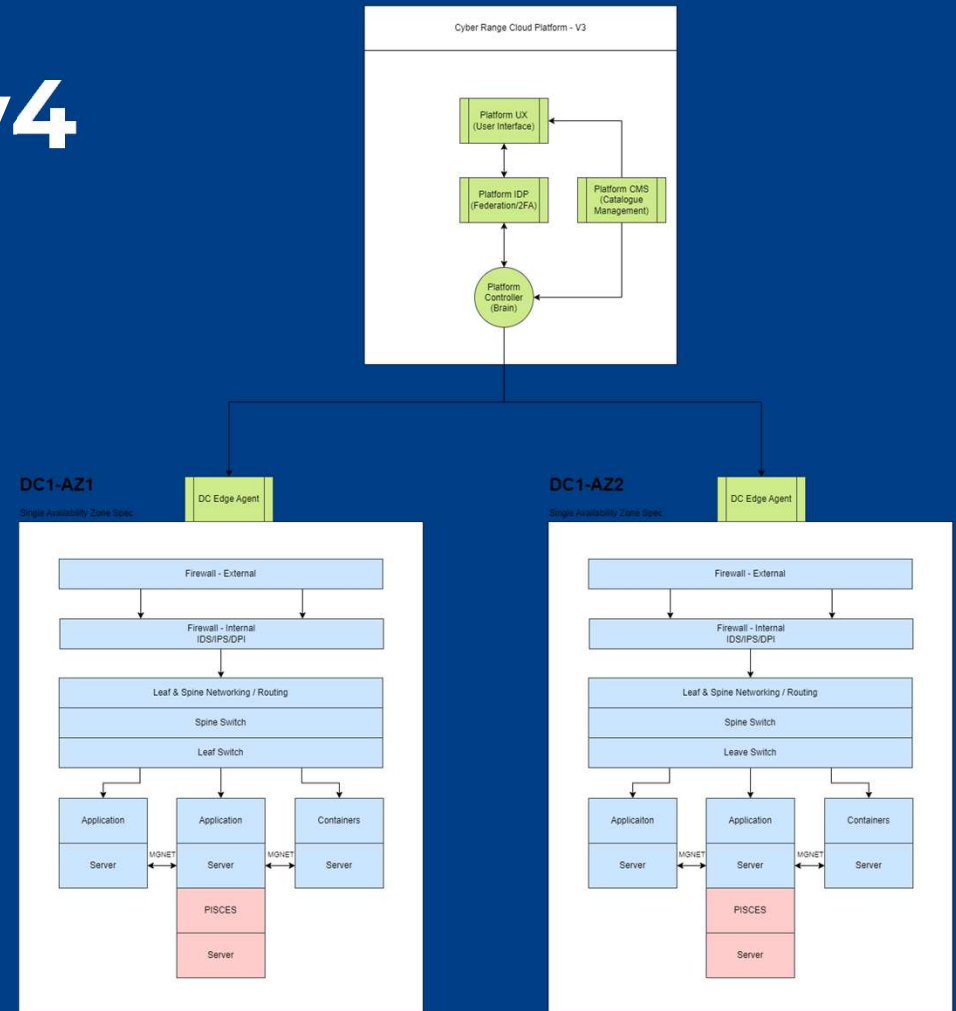
Opt-in AI Data Lake for next-generation research

Where the Data Meets AI/ML

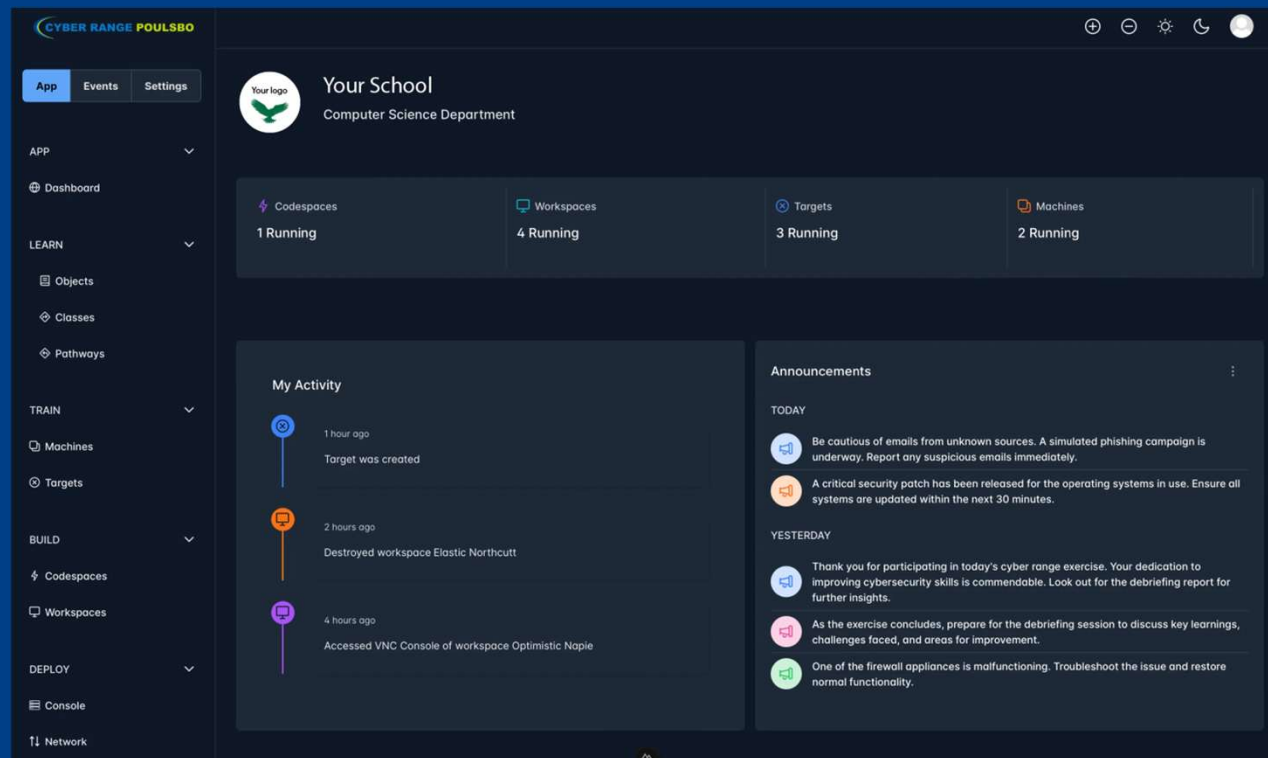
- AI Data Lake
 - The honeypot and network data pooled and ready to query. A real place to train and test models against.
- Local Inference Engine
 - Self hosted, open-source models running on the range.

The Cyber Range has the data and the compute. Bring an idea and build something!

The Next Node: v4



Demo



Thanks!

Questions?

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