



Best Practices in Securing OpenEdge Applications

Chad R. Thomson

Senior Principal Solutions Consultant

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Speaker Bio

- Over 20 years of industry experience favoring reality over formality
- Over 17 years in services focus with Progress Software
- Specializing in vendor-neutral, cross-platform application and service integration
- Passionate technology advocate



Agenda

- What: Data Security and Privacy
- Who: The Concerned Audience
- Where: Risks Are Everywhere
- How: Assessing, Planning and Protecting
- When: There is a right time to Protect your Data

Standard Disclaimer Warning

- *Security is a tremendously broad topic*
- *Spans Careers*
- *Get Your Interest Up*



What are you protecting?

Data Security & Privacy: What are you protecting?

- Data Security

- Data security refers to end-to-end data-privacy **processes** and **controls** that are applied to prevent **unauthorized** access to computers, databases, applications, and web servers. Data security also includes the data-integrity controls for detecting data corruption at all points

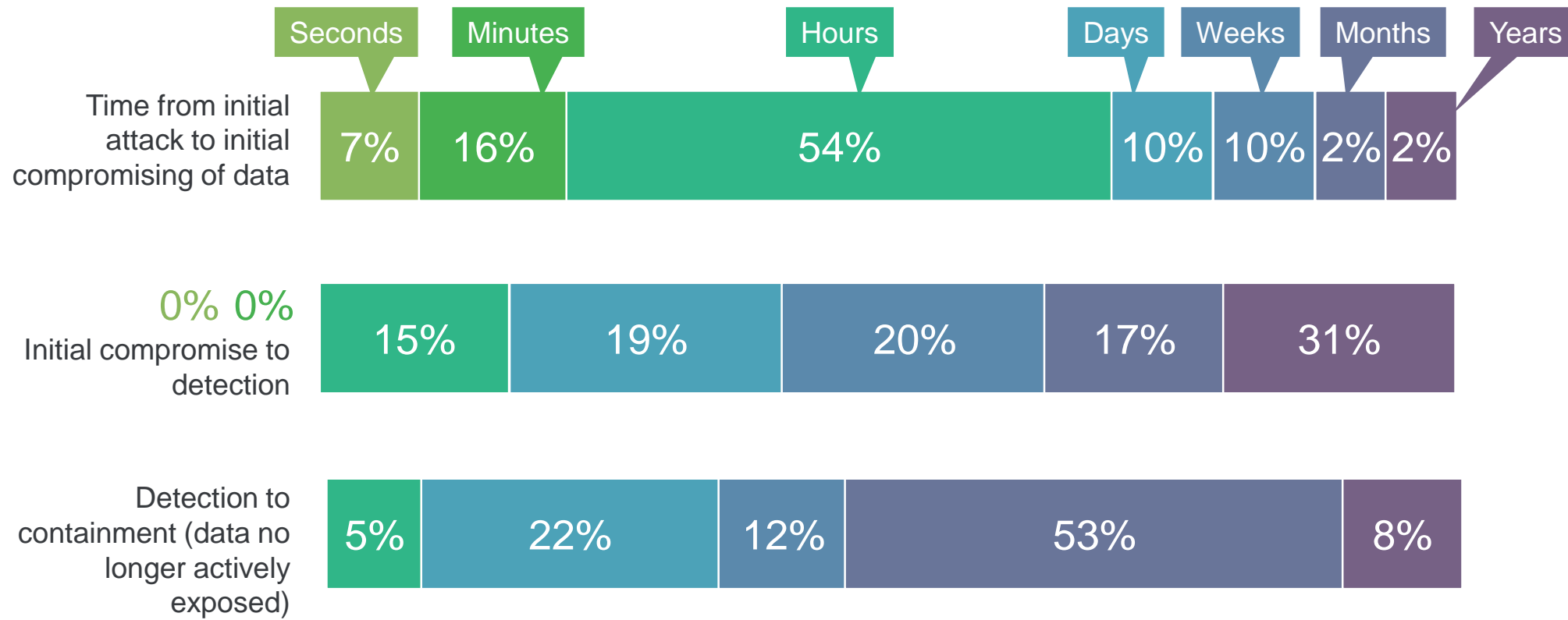
- User Privacy

- User privacy is the privacy and security level of **personal data available** on internet & intranet networks. It is a broad term that refers to a variety of factors, techniques and technologies used to protect sensitive and private data, communications, and preferences

***Data Security is the
foundation for User Privacy***

Data Security & Privacy: That's What We Know

Theft of intellectual property, unlike other kinds of data breaches, often goes years without being detected, as it did in nearly a third of the cases studied by WSJ.



***Minutes to steal.
Days (years) to detect.
Far too long to fix.***



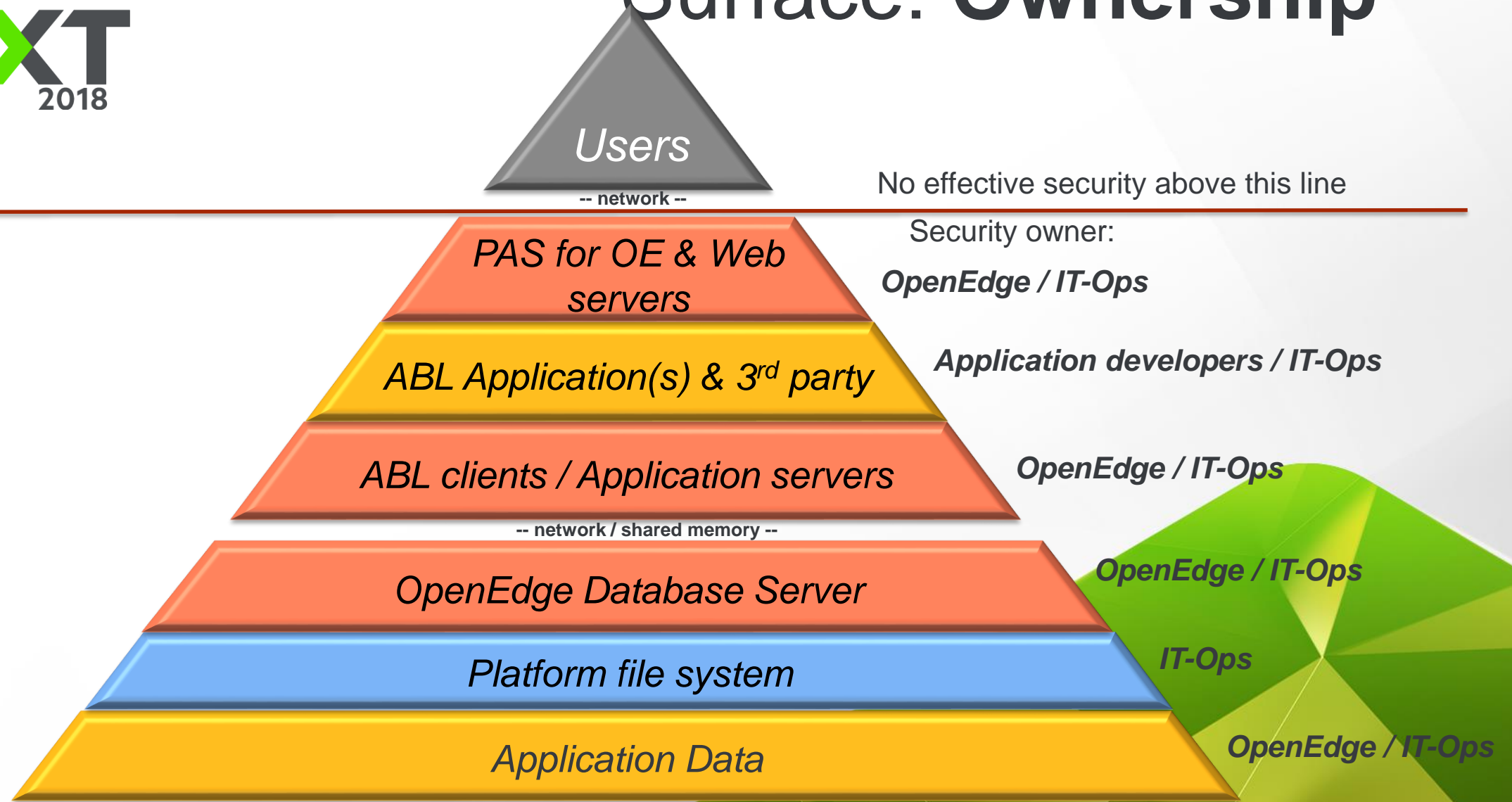
**Who is concerned with
security policies?**

“Don’t worry, we’re
safe.”

I put in a **hardware**
firewall -- we can’t be

Get Involved!
Get Buy-in!
Get Ownership!

OpenEdge ABL Application Attack Surface: Ownership

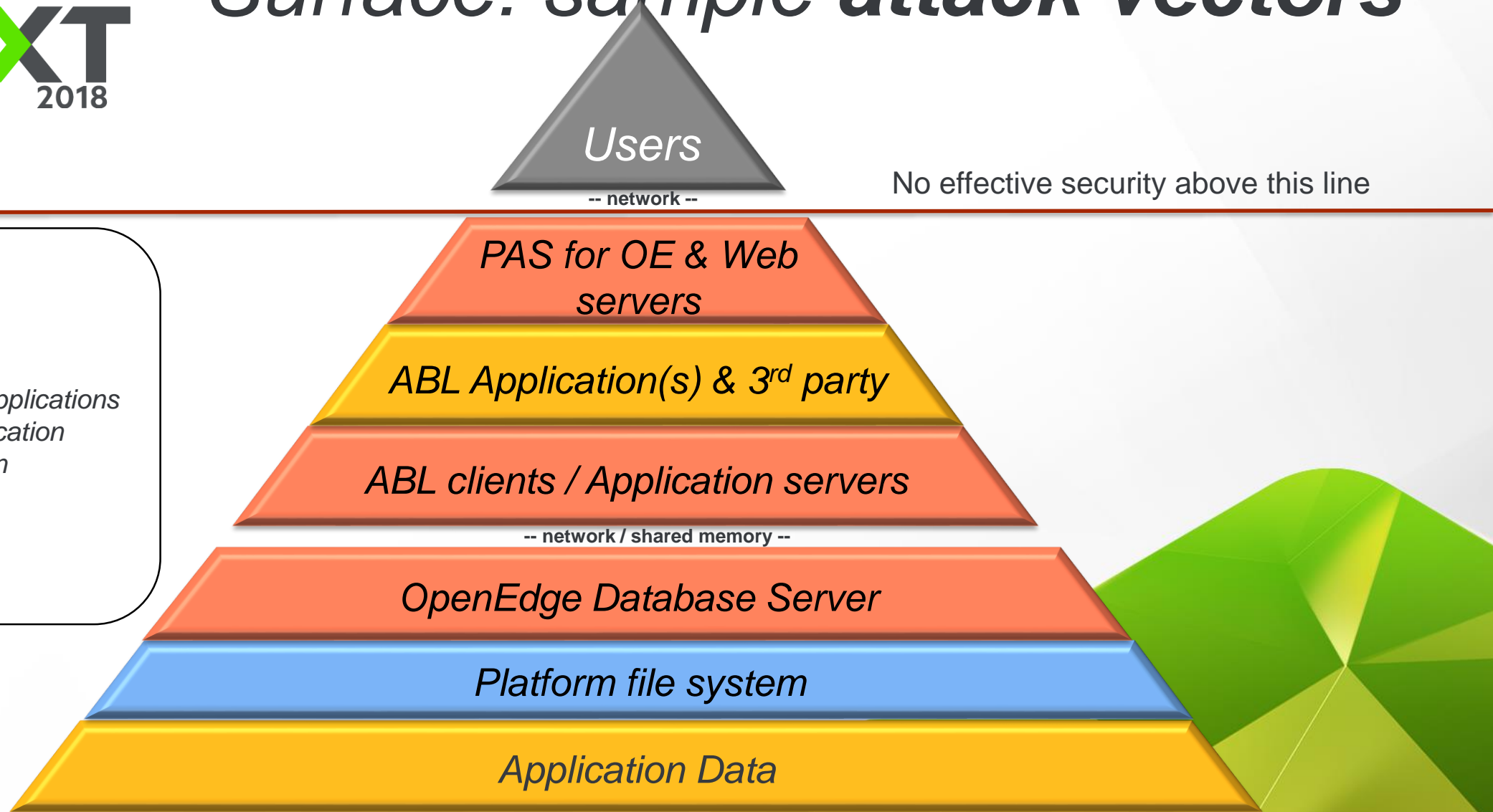


“Just



Where are your risks?

OpenEdge ABL Application Attack Surface: sample attack vectors

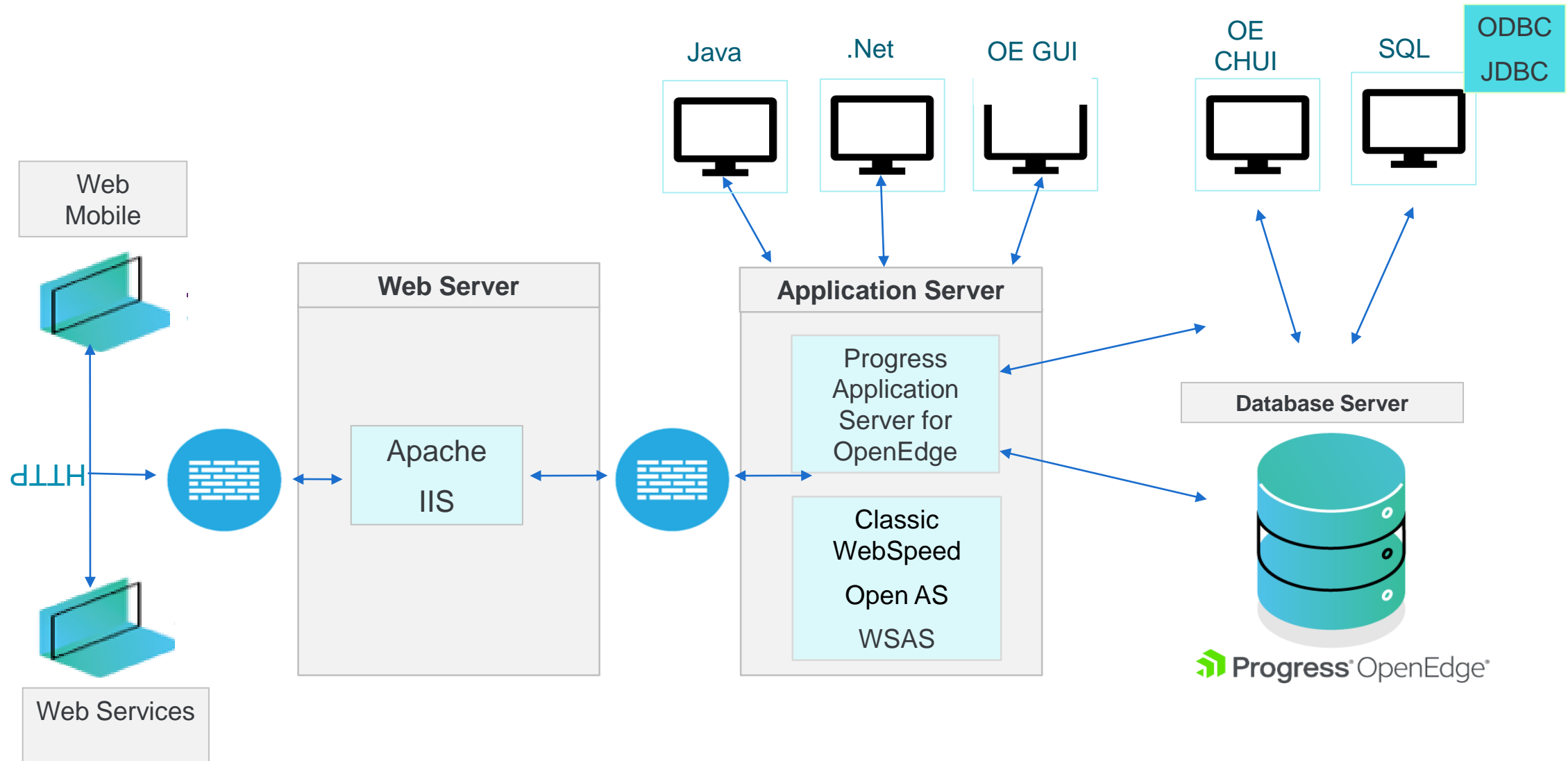


Legacy Vulnerabilities

- Applications designed or implemented without security as a priority
- Aging application or OS platform, policies
- Potentially no encryption of data at rest



Where ... is the data?





**How are you going to
protect your assets?**

**“When planning a defense, have
at least two plans; the first
plan **will always** fail.”**

- unknown

Plan, Plan, and Plan

ASSESS

Hire a **reputable** third-party for an unbiased security **assessment**.

Prepare for embarrassment – bad news from assessor is better than the **news channels**.

PROTECT

Design data security and **control** policies

Educate and empower all individuals that access the data in any way

Plan, Plug, Patch

DETECT

Monitor for intrusion and possible threats

Notify only key personnel

Include **internal** sources

Rules will evolve

Keep the history – even of **benign** activity

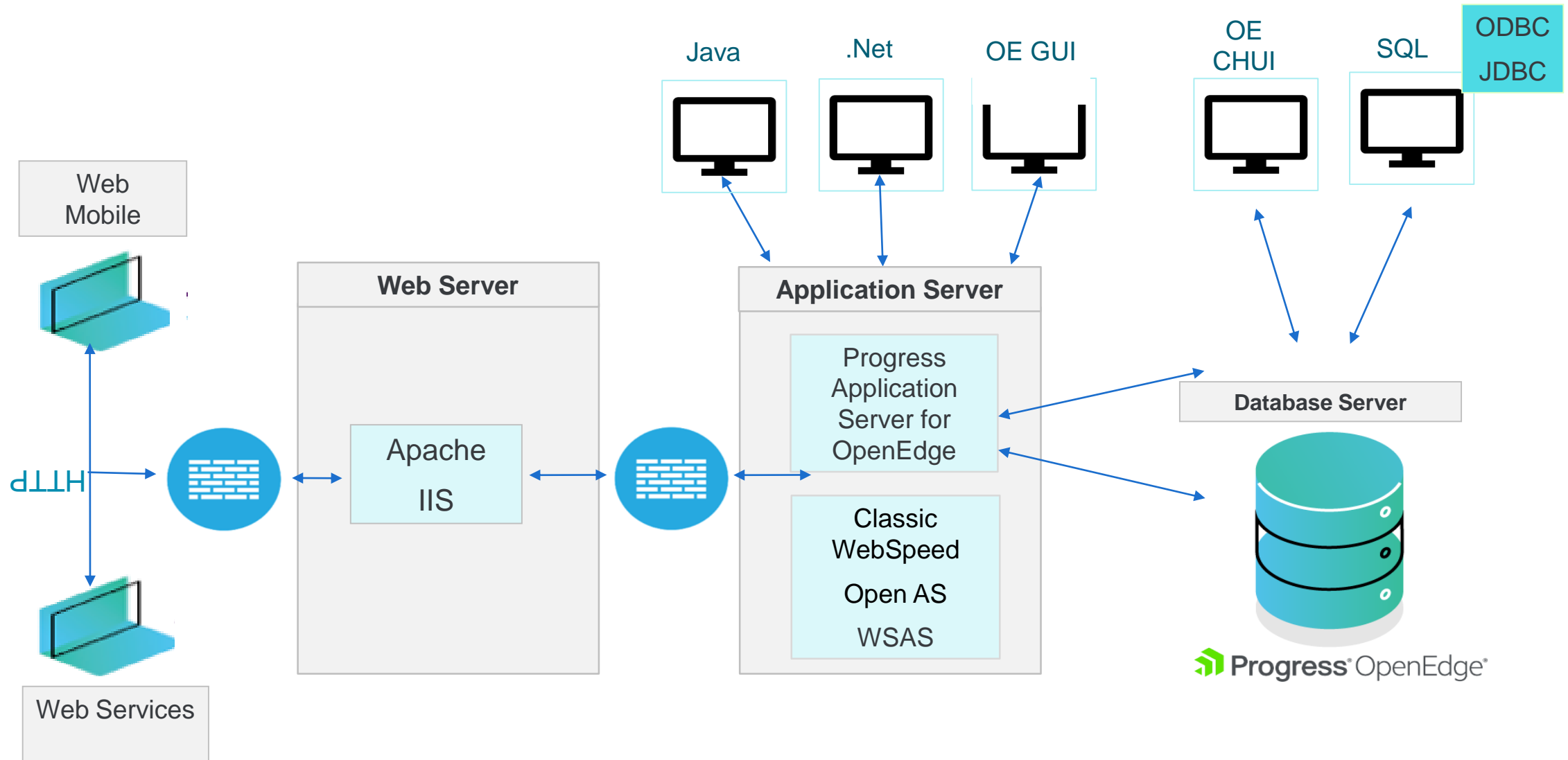
RESPOND

Do **NOT** Panic

Test your response plan

Fix, **Review**, Repeat

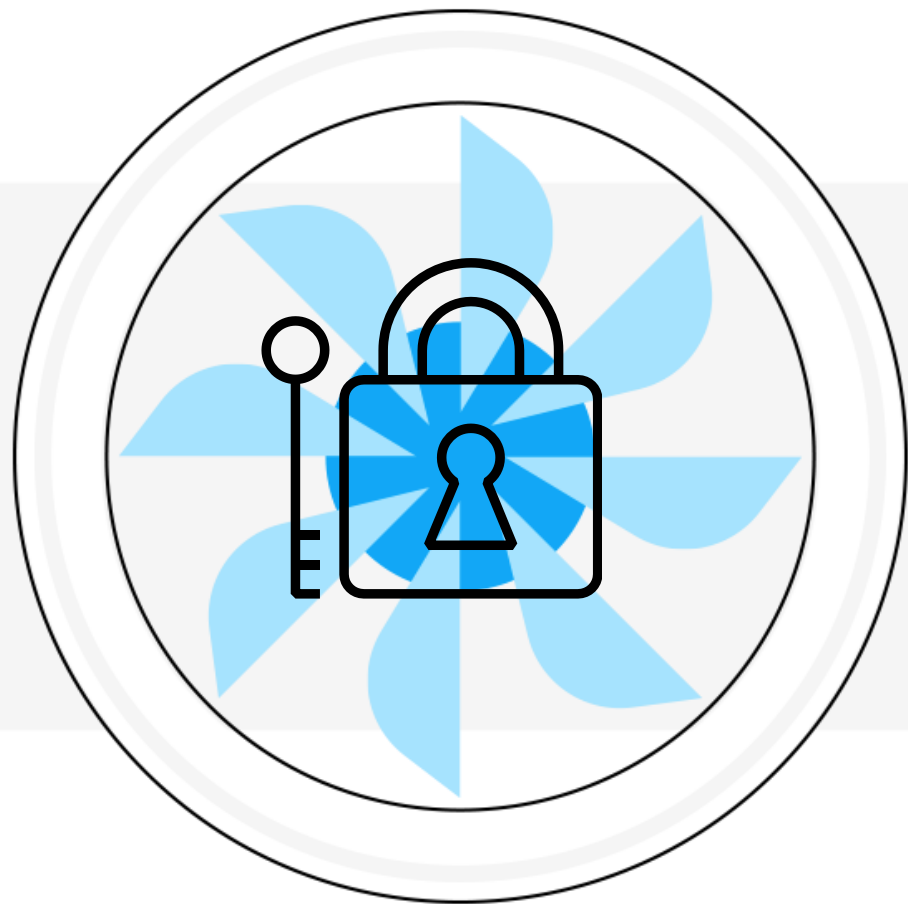
My data is ... where again?



OpenEdge Approach to Data Security & Privacy

- OpenEdge installs an **open** system and provides **opt-in** security controls (aka features).
- OpenEdge security controls expect to operate **in conjunction** with other layers
- Integration with third-party, standards-based **security controls** from other vendors
- The ABL should **NOT** implement it's own user and data security

OpenEdge Technologies



OpenEdge Authentication Gateway



OpenEdge Auditing



Progress Application Server for
OpenEdge



Client Principal Object



OpenEdge Change Data Capture



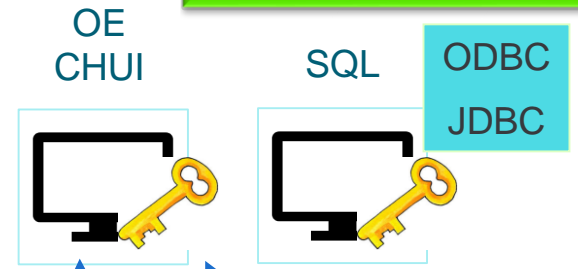
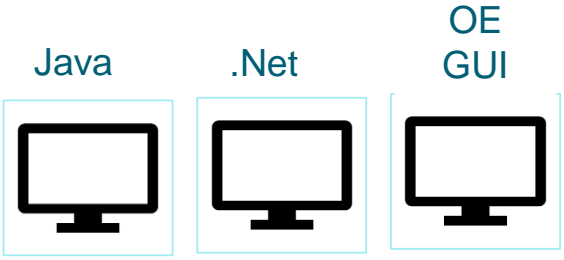
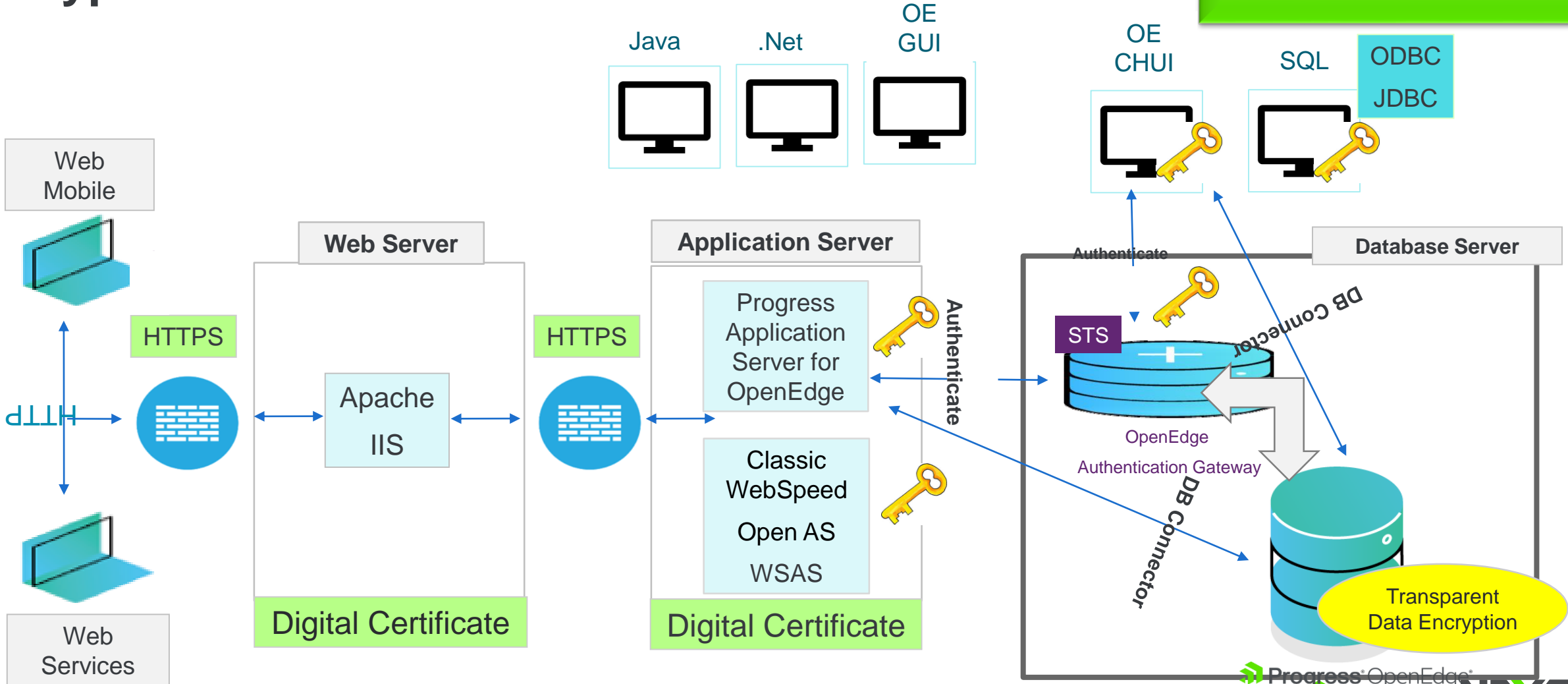
OpenEdge Management



OpenEdge Transparent Data Encryption

Protect the Data: Authentication vs. Authorization Encryption and Validation

Protect



“If you’re not **paranoid**,
you haven’t been
paying attention.”

– *may have been me*

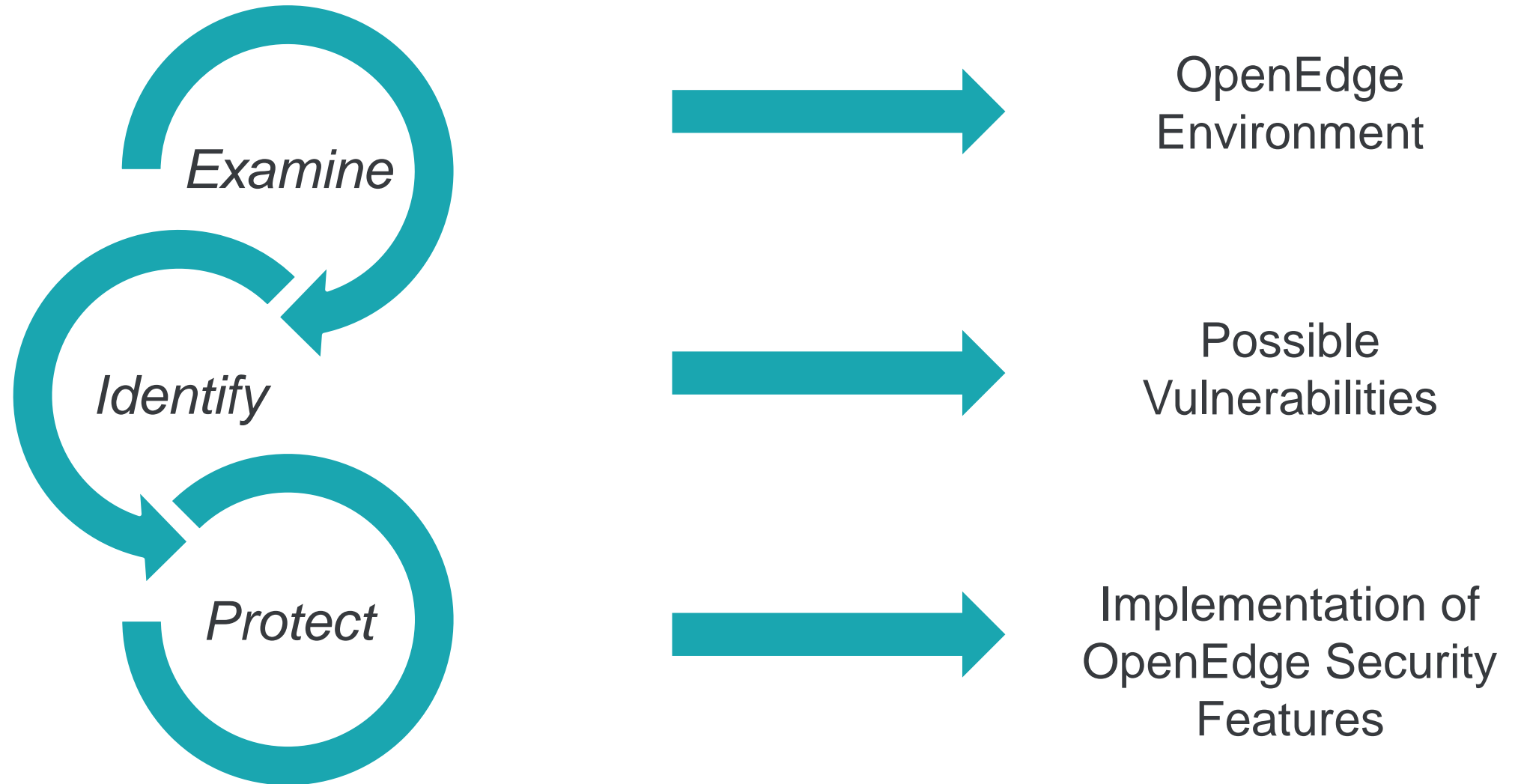


**When should you do all of
this?**

Do it **yesterday!**

You are **late** already!

OpenEdge Security Health Check: Help from friends



Thank You!

Chad R. Thomson

 chthomso@progress.com

 [@progress](#)

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You might also like to attend

Address the Requirements of GDPR

Tanya O'Connor, Sr. Mgr, Product Marketing
Connor Patten, Principal Sales Engineer

Marina III, June 1, 13:00



