OWASP Developer Guide

Presentation to Bristol (UK) Chapter

Who am I?

- C/C++ developer for 25 years
- Security engineer for over 10 years

Active in OWASP :

- Leader + contributor to OWASP Threat Dragon project
- Co-leader + contributor for OWASP Developer Guide project
- Co-Leader of Bristol (UK) OWASP Chapter

I am a developer, and I need help!

Have you ever said to yourself:

"I am a developer and I need a reference source to navigate the numerous projects and security activities that I really should be doing"

Quiz

How many official OWASP projects are there?

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There are (at least) 322

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Bonus question

Name the OWASP projects categories

Quiz

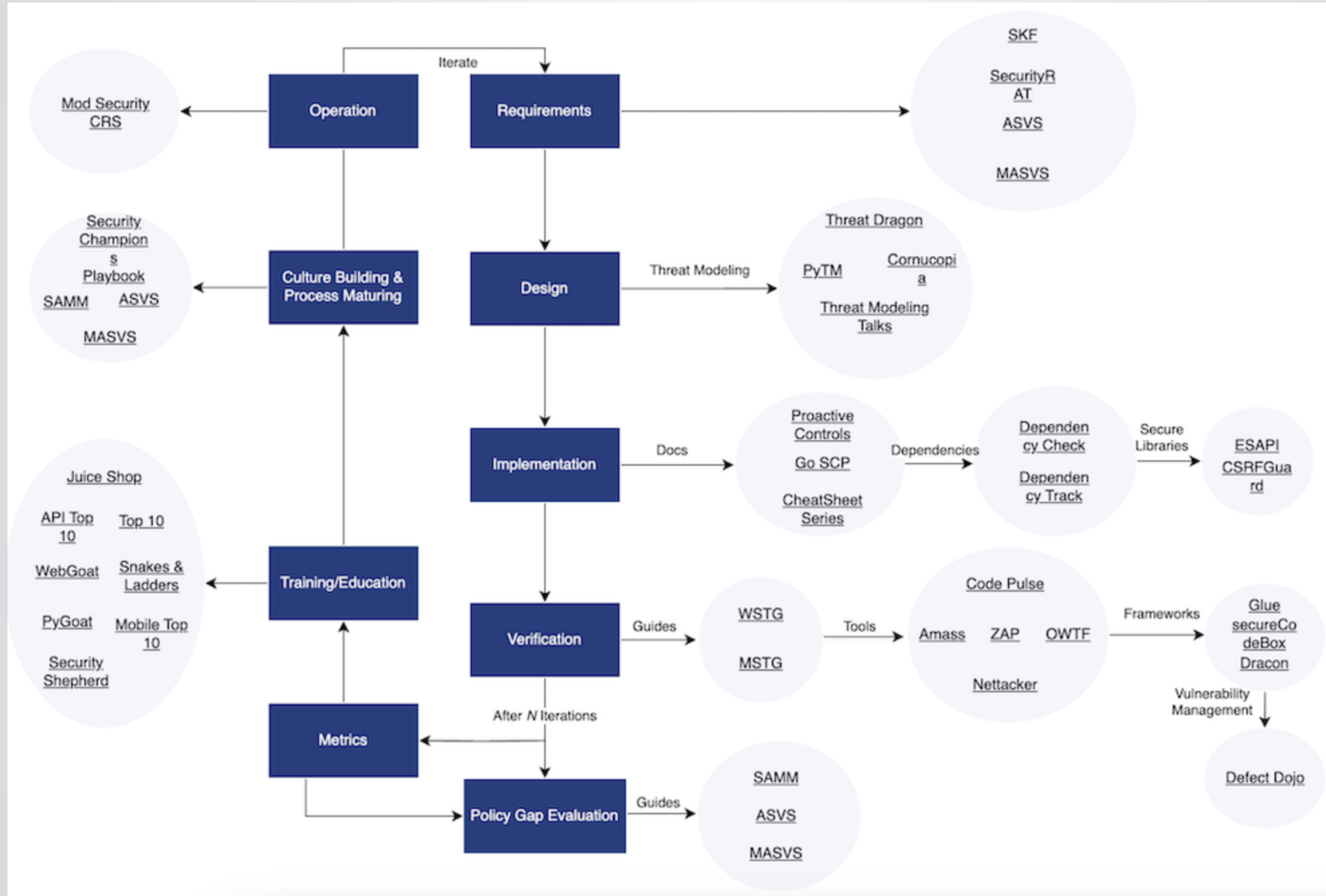How many official OWASP projects are there?

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Bonus question

Name the OWASP projects categories

1. Flagship : 15 projects

2. Production : 6 projects

3. Laboratory : 36 projects

4. Incubator : at least 265 and counting

The OWASP Project Wayfinder

What is in the Developer Guide?

What it does do :

- Enough theory to get you started, but no more

- Brief introduction to each project in the Wayfinder

  - What it does, why it is useful

  - Where to get it, how to run it

What is in the Developer Guide?

What it does *not* do :

- No topic in detail, lists further reading for that
- No project in detail, refer to the documentation for that

Requirements

Software security requirements are important to get right

- Overview of requirements

- Descriptions of tools, notably

  - ASVS

  - MAS

  - SKF

Design

Software design and architecture requires wide ranging skills and tools

OWASP tools for threat modeling:

- PyTM

- Threat Dragon

- Cornucopia

Implementation

Many tools and guides

- Dependencies
  - For example CycloneDX

- Libraries
  - For example Secure Headers

- Documentation
  - For example Cheat sheet series
  - Top 10 Proactive Controls

Verification

Wide range of tools and documentation

- Guides, such as WSTG

- Tools such as ZAP and Amass

- Frameworks such as Dracon

- Vulnerability Management using DefectDojo

Metrics

Nothing on metrics

- Some introduction, that is all

- No projects or tools :/

- Obviously a gap :)

Training and Education

OWASP provides a wide range of tools

- Secure Coding Dojo
- SKF
- Juice Shop
- Web Goat
- PyGoat
- Security Shepherd

- Samuari WTF
- OWASP Top 10
- Mobile Top 10
- API Top 10
- Wrong Secrets
- Snakes & Ladders

Culture Building and Process Maturing

A good culture is beneficial in many ways and processes need constant refinement

- Security Champions

- SAMM

- ASVS

- MAS

Operations

- A very wide subject

- OWASP restricts itself to WAFs

  – Coraza

  – ModSecurity

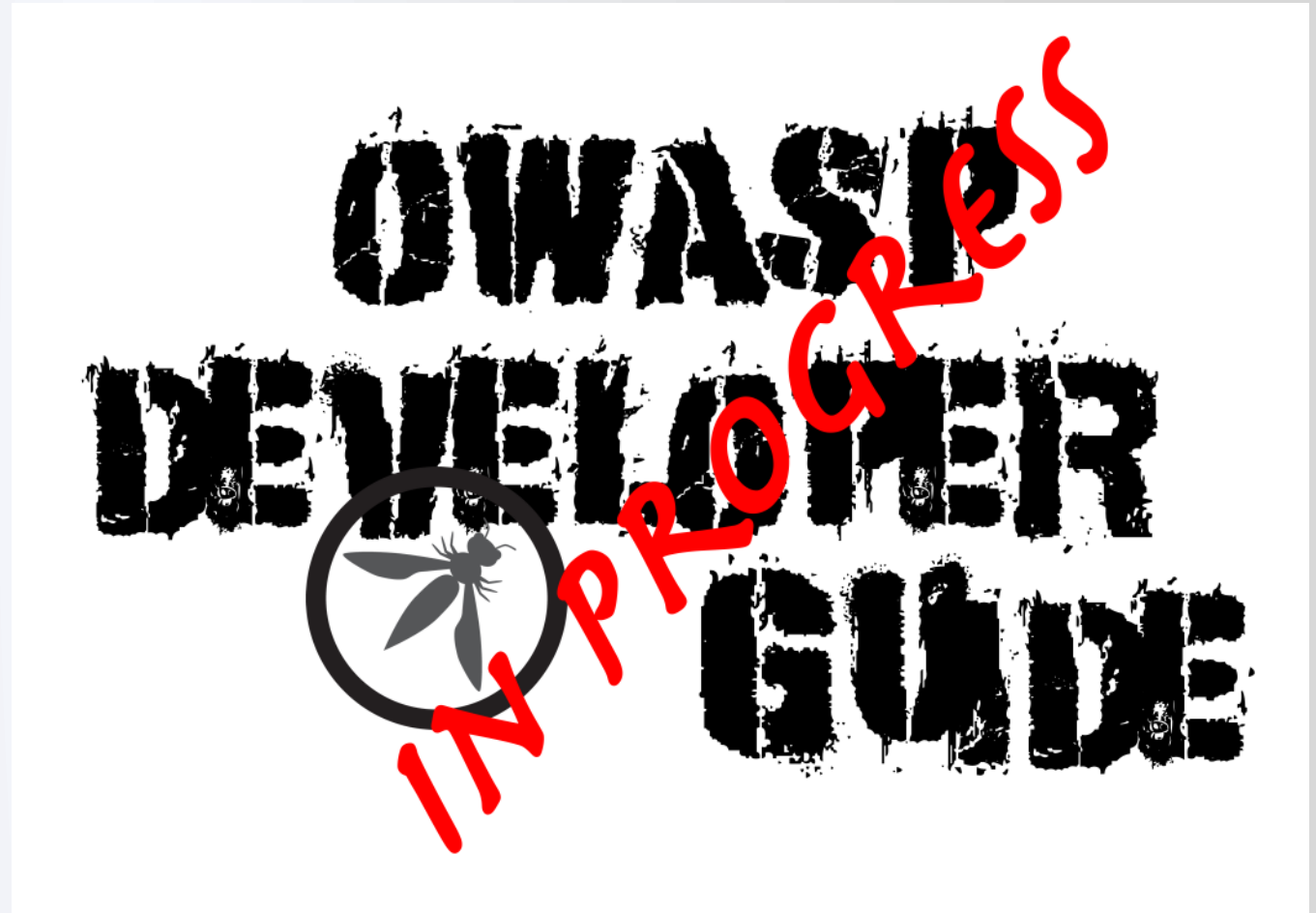 – Core Rule Set for ModSecurity

Gap Analysis

OK, maybe not everyone's favourite,
but there is:

- Bug Logging Tool

- Guides:
    - ASVS
    - MAS
    - SAMM

Contribute

- largely complete

- Describes projects / tools:

  - What is it?

  - Why is it useful?

  - Where to get it

  - How to run it

Time for a demo ?