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POWER OF OPPORTUNITY

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An Aflac Case Study: Moving a Security Program from Defense to Offense

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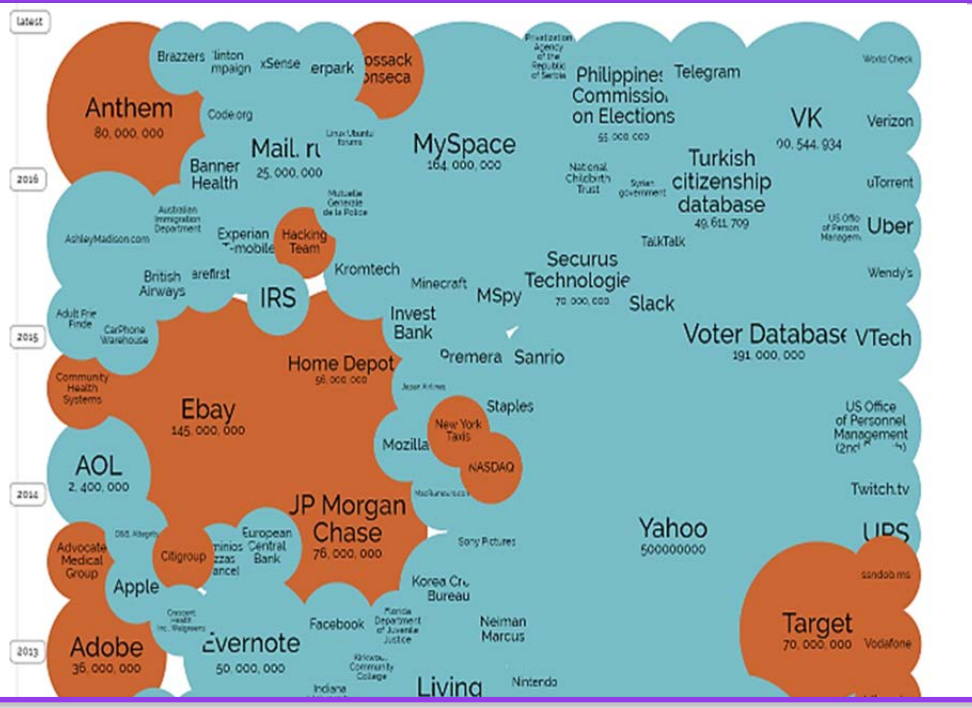
Threat Landscape

Selected losses > 30,000 records
(updated 10/15/16)



Security risks are growing at a faster pace than the industry can react or adapt to

How to Build a Good Offense

Intelligence

Leverage several types of sources

Analytics

Find a solution that best applies to your environment

Fight Far

Build more layers in between assets and threats

Staff

Security tools are important, but building and finding the right talent is also important

Intelligence

Internal

Analyze network traffic, log files, security appliances and even employee behavior

External

Open sources, organization memberships, vendors, government programs (DHS)

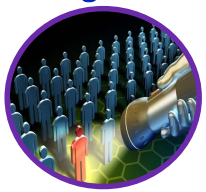
Dark Web

Monitoring the dark web helps companies see planned attacks against them or see stolen credentials

Analytics

Information/Data

Threat Intelligence Platform



Corporate Infrastructure

Security Infrastructure

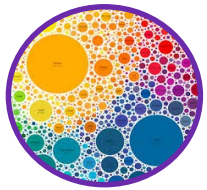
Network Infrastructure

Systems and Applications

Op Intelligence Platform

Big Data Analysis

Confidence Rating



Visualization

Output

High Confidence Action

Automated Alerts

Low Confidence Action

Enrichment into other alerts

Confidence Scores

High Confidence Score

Domain that is well-known to be malicious

Higher confidence scores set off automated event alerts

Low Confidence Score

Logging in to network incorrectly multiple times

Lower confidence scores go through an enrichment process and other alerts

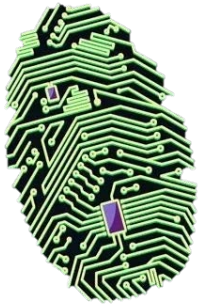
Analytics Tool Results

2,042,000

Connections have been blocked with fewer than 12 false positives

90

Average number of threat actor campaigns maintained



>5M

Average number of IoC's maintained

5

Member team effectively manage 5M pieces of threat intel data

Capabilities

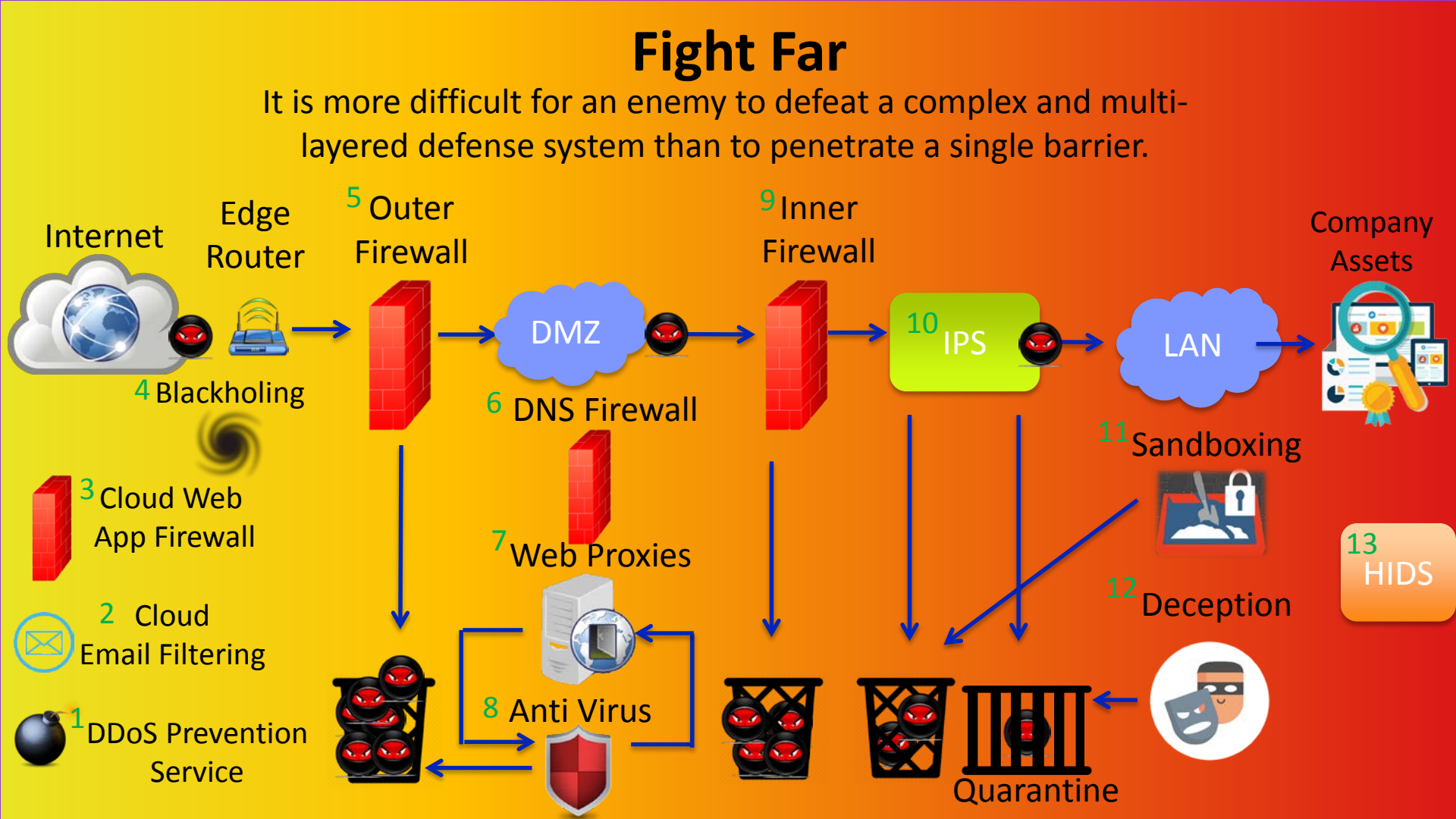
DNS Firewall: Performing automated checks against aggregated list of dangerous domains to “sinkhole” or block the connection attempts associated with malware.

Blackholing: A technique in which an internet service provider (ISP) dumps packets coming from a certain domain or address.

DDoS Service: Prevention of attacks that attempt to exhaust the resources available to a network, application or service so genuine users cannot gain access.

Fight Far

It is more difficult for an enemy to defeat a complex and multi-layered defense system than to penetrate a single barrier.



Staff Challenges

Threats and vulnerabilities constantly changing

Gartner's prediction about the Internet of Things is that we'll have 25 billion connected devices globally by 2020 – each bringing new security challenges.[1]

The cybersecurity skills gap is real

This is unlikely to change in the near future, as it is predicted that 1.5 million jobs will be unfilled by 2020.[2]

1. Gartner-25 billion connected devices press release. 2. 2015 Global Information Security Workforce Study, Frost & Sullivan

Seek Unconventional Perspective

Military/Veterans

- Experience (SOC, security administration, monitoring)
- Aptitude and focus

Data Scientists

- Ability to make correlations and predictions
- Analytical skills to spot trends and patterns

Invest into the Future

Grow from within

- Look within your own IT staff
- Years of experience of systems and operations can be groomed into a security professional

Use local opportunities

- Work with technical and vocational programs in your area
- Establish internship programs and participate in capstone opportunities
- Aflac's internship and apprenticeship program gives exposure and experience

Be Pre-emptive

Intelligence

Review, add and diversify your intelligence sources

Analytics

Find a solution that not only produces intelligence but takes action with the intelligence

Fight Far

Review your current security capabilities and build in additional layers to create distance

Staff

Think outside the box by changing your hiring strategies and invest in local schools/programs