

# Cyber-Security Presentation

## February 18, 2016

Objective is to Communicate UKIA Cyber-Security:

1. Definition
2. Risks
3. Services
4. Coverage
5. Program



# Definition

## ❑ Cyber-Security

- Evaluate the effectiveness of **policies, practices** and **technologies** utilized to protect the University of Kentucky's Information Systems infrastructure.

  - Logical Security
  - Physical Security
  - Disaster Recovery

  
- Verify the compliance to applicable **regulations**.
  - Data Security
  - Privacy
  - Risk Management

# Risks

## Internal

### Applications

- Appropriateness of Roles and Privileges
- Security Logging and Monitoring

### Employees (IT or Administrator)

- Elevated Access
- Disgruntled

### Passwords

- Weak
- Non-expiring

### Mobile Devices

- Loss / Theft
- Employee-owned Devices

### Database / Network / Servers

- Firewall
- Data Classification and Segmentation

## External

### Third Party / Contractors

- Confidentiality Agreements
- Adequate Security

### Hacking

- Network Penetration Attacks
- SQL Injection Attacks

### Social Engineering

- Phishing (emails and websites)
- Information Gathering (social media)

### Malware

- Email Attachments
- Websites Embedded with Malicious Software

### Cloud

- Confidentiality Agreements
- Data Segmentation

# UKIA Services



# UKIA IT Audit Services

UKIA Service	UKIA IT Service	Risks Mitigated
(1) Assessments	Assessments	Application Evaluation and System Vulnerability
(2) Comprehensive Audits	Comprehensive Audits	Business Application Review and Data Security
(3) Consultations	Advisories / Consultations	Process Vulnerability and Risk Management
(4) Continuous Auditing	Data Analytics	Elevated System Privileges
(5) Information Technology	Application Controls	Unauthorized Access
	General Controls	Susceptibility to Intrusion and Disaster Recovery
	Regulatory Compliance	Noncompliance
(6) Presentations	Training / Seminars	Knowledge and Awareness

# UKIA Coverage

## Enterprise Divisions

- UK HealthCare
- Campus
- Affiliates
- UK Administration (Includes Athletics)
- Academic Units
- Finance and Administration

# Cyber-Security Program

## ❑ Procedural Execution

- Units / Departments
- Data Centers

## ❑ Monitoring

- Information Technology
- Not just an IT Function

## ❑ Auditing

- Internal Audit
- Collaboration



To Support UK in its pursuit of excellence by providing advisory and assurance guidance to champion reasonable assurance regarding the achievement of management objectives.